

# Maternity and Newborn Care in Utah Hospitals: Quality and Charges, 2005-2007

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Released January, 2009

## **Introduction**

**The main purpose of this report** is to help patients compare Utah hospitals in maternity and newborn care based on quality, charges and patient safety. If you are planning to have a baby here in Utah, you may find this report helpful when considering where to give birth. Health care facilities can vary, sometimes quite a bit, in terms of quality of care, patient charges and patient safety.

To learn important information, see “Maternity and Newborn Resources” later in this report.

### **Did you know?**

- Utah has the highest birth rate in the country
- Boy babies have outnumbered girl babies for the past 60 years
- More babies are born on Tuesday than any other day of the week

For financial help to preparing for pregnancy, Utah’s Baby Your Baby program has the answers you are looking for. Visit their Website at <http://www.babyyourbaby.org> or call toll-free 1-800-826-9662.

## **Hospital Utilization Rates**

See the tables in this report for information comparing Utah’s hospitals on the following delivery indicators:

- ✓ First-Time Cesarean (C-Section)
- ✓ Vaginal Birth After C-Section (VBAC)

Read more about methods and measures used for the hospital utilization section in this report in Methods and Measures.

More information about quality indicators can be found at the Agency for Healthcare Research and Quality (AHRQ) web site (<http://www.ahrq.gov>).

## **Hospital Charges**

See the tables in this report for information on comparing Utah’s hospitals for the following charge indicators:

- ✓ Normal Newborn
- ✓ Vaginal Delivery
- ✓ Vaginal Delivery With Sterilization and/or Dilation and Curettage (D&C)
- ✓ Cesarean Delivery

Your charges may be higher or lower than the average charges shown in the above tables. It is important to remember that “charge” is not the same as “total cost” or “total payment” to the hospital.

**Note:** Many factors will affect the cost of your hospital stay. Read more in the “About the Report” section later in this report. You can also find more information about these factors at the Utah PricePoint web site (<http://www.utpricepoint.org>).

## Hospital Patient Safety

See the tables in this report for information comparing Utah’s hospitals on the following indicators:

- ✓ Obstetric Injuries With Instruments, Vaginal Delivery With Severe Tears
- ✓ Obstetric Injuries Without Instruments, Vaginal Delivery With Severe Tears
- ✓ Birth Injuries, Injury to Newborn

A particular hospital’s percentage of injuries depends on its mothers’ and newborns’ medical history and how ill its mothers and newborns are. You should consult your health care professional for help in understanding the best delivery options for you and your baby.

Many factors affect a hospital’s performance on injury measures. Read the online report for more information.

Read more about methods and measures used in this report in Methods and Measures.

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**Please be aware that information in this report is neither intended nor implied to be a substitute for professional medical advice. Always ask questions and seek the advice of your physician or other qualified health provider prior to starting any new treatment.**

## Key Findings

### **How did Utah’s quality of maternity and newborn care in hospitals compare with the nation from 2005 through 2007?**

#### **Patient Safety Indicators**

Utah overall (as a state) had lower rates than expected on three patient safety indicators, compared to similar mothers and newborns in the U.S. Measures and rates are in parentheses. Specifically, Utah overall had lower than expected rates for

- 248 (0.2%) of 258,929 newborns experienced newborn injuries (PSI 17) in 2005 through 2007.
- 2976 (2.6%) of 37,959 mothers experienced severe tears during vaginal delivery without instruments (PSI 19) in 2007.
- 550 (14.0%) of 3,915 mothers experienced severe tears during vaginal delivery with instruments (PSI 18), in 2007.

25 of the 39 Utah hospitals at which 30 or more babies were born had a lower rate than expected for injuries to the newborn in 2005 through 2007 compared to similar babies nationwide. The remaining 14 hospitals had about the same rate of newborn injuries as expected. Of these 14 hospitals, five had no reported newborn injuries.

The definition of this indicator changed in late 2003. Prior to October 2003, “head molding” might have been included in the indicator. “Newborn head molding” is an abnormal head shape that occurs from pressure on the baby’s head during delivery. This is not a serious condition and the baby’s head often returns to its normal shape in a few days. The change in definition resulted in a decrease in reported injuries to newborns starting in 2004.

20 of the 38 Utah hospitals at which 30 or more mothers had a vaginal delivery **without** instruments had a lower rate of severe tears than expected in 2007 compared to similar mothers nationwide. The remaining 18 hospitals had about the same rate of these injuries as expected.

Nine of the 25 Utah hospitals at which 30 or more mothers had a vaginal delivery **with** instruments had a lower rate of severe tears than expected in 2007 compared to similar mothers nationwide. The 16 remaining hospitals had about the same rate as expected.

**Note:** Many factors can affect in-hospital injuries at a particular hospital. Read more in [About the Data](#).

### Utilization Indicators in 2007

- 4,413 (10.4%) of 42,373 deliveries in Utah hospitals were first-time Cesarean deliveries (IQI 33).
- 1,192 (16.7%) of 7,120 women with a previous Cesarean delivery had vaginal births (IQI 34).

**Note:** Many factors can affect in-hospital procedures at a particular hospital, such as the health of the mother and baby, or the availability of hospital specialists and facilities. Currently, the health care community does not have an agreed-upon benchmark for the optional rates for first-time Cesarean and VBAC deliveries.

### How did hospital charges differ among Utah hospitals in 2007?

Average hospital charges for the maternity and newborn cases in this report differed widely. For those at the [minor/moderate severity of illness level](#), average hospital charges ranged from:

- \$1,000 to \$2,207 among 39 Utah hospitals that reported charges for **newborns with a birth weight over 2499 grams (about 5.5 pounds)** (APR-DRG 640).
- \$4,792 to \$8,089 among 39 Utah hospitals that reported charges for **vaginal delivery** (APR-DRG 560).
- \$4,418 to \$10,770 among 39 Utah hospitals that reported charges for **vaginal delivery with dilation and curettage (D&C) and/or sterilization** (APR-DRG 541).

- \$ 5,697 to \$13,963 among 39 Utah hospitals that reported charges for **Cesarean delivery** (APR-DRG 540).

As expected, average hospital charges for maternity and newborn cases where the severity of illness level was major/extreme were higher than cases where the severity of illness level was minor/moderate.

**Note that many factors will affect hospital charge.** Read more in [About the Report](#).

## **About the Report**

Please note this report is not intended to be anyone's sole source of information about hospital quality or charges in Utah. Rather, it is designed to provide helpful information that can play an important role in choosing a hospital, along with other sources including doctor recommendations.

### **Why are you producing this report?**

- [Senate Bill 132](#) (2005) requires the [Health Data Committee](#) (HDC) and its staff to publish reader-friendly reports comparing Utah's hospitals based on nationally-recognized measures for quality, charges and patient safety.
- The HDC and [Utah Department of Health](#) are committed to providing useful health care information for all people in Utah. Providers can use these reports to improve the quality of care they give to their patients.

### **Why is this report important to me?**

Hospitals can vary, sometimes quite a bit, in terms of quality of care and patient charges. Consumers are encouraged to use the information in this report to ask questions of their doctor or health care professional, hospital or insurance representative. Let them know you plan to take an active role in your health care decisions.

### **Who else helped shape this report?**

- [Utah citizens](#) continually review our consumer reports to make sure they are understandable and easy to read. Since 2005, several focus groups have been held in both rural and urban locations. Public input helps us create user-friendly reports for people who are not medical experts yet need useful health care information.
- [Utah Transparency Advisory Panel](#) (formerly called "SB 132 Task Force") is an HDC advisory group represented by consumers, payers, hospitals, quality organizations and public health. Panel members have advised staff about methods and measures to use in the reports as well as reporting priorities.

- Health care facilities reviewed their data and overall report content before public release. For more information, see the “About the Data” section in this report.
- Statistical experts assisted in selecting the appropriate method for comparing hospital performance.
- Leading physicians and health educators reviewed medical information in the report where applicable.

## **What are consumers saying about these reports?**

Feedback has been received from a variety of sources including our MyHealthCare website, consumer focus groups and newspaper articles. Below are some examples:

- “We have needed these reports for a long time”
- “Now we are more empowered and have tools to compare.”
- “This will help us to ask questions when we see our doctor.”
- “The consumer reports help people make better choices about their health care. People can use them as a basis for questions to ask their doctors.”
- “They [the reports] are not definitive—the end all in choosing one physician or hospital over another—but rather a valuable point of departure for people anticipating specific health care encounters.”
- “The more a person knows about the cost and quality of care, the more likely they are to receive the care they need and deserve.”

## **About the Data**

### **Where do the data come from?**

Most of the data in this report come from health care hospital claim records. Utah hospitals are required by law to submit a standard set of information about each inpatient who spends at least 24 hours in the hospital to the Office of Health Care Statistics, Utah Department of Health, for the Utah Hospital Discharge Database. The Agency for Healthcare Research and Quality (AHRQ), a federal agency in charge of quality of care, provided national information. For further information visit the AHRQ website <http://www.ahrq.gov/>

## **Have the data been verified by others?**

Yes. Utah hospitals review the data for accuracy during a review period of at least 30 days while the report is being developed. They also review the completed report before it is released. Hospitals may submit comments to be posted online as part of the report.

## **Why use these indicators/measures?**

SB 132 mandates that the comparison reports use nationally recognized quality standards. A federal agency charged with overseeing health care quality, the Agency for Healthcare Research and Quality (AHRQ), developed the Inpatient Quality Indicators (IQIs). The IQIs allow comparison among Utah hospitals with similar patients nationwide. This report shows two IQIs for deliveries. For more information on the AHRQ IQIs, see <[http://www.qualityindicators.ahrq.gov/iqi\\_overview.htm](http://www.qualityindicators.ahrq.gov/iqi_overview.htm)>.

The measure for average charge is an All Patient Refined Diagnosis Related Group (APR-DRG) for similar, though not identical, conditions and procedures among inpatients. For this reason, the number of patients for the APR-DRG and the IQI is not the same.

The Agency for Healthcare Research and Quality (AHRQ) also developed the Inpatient Quality Indicators (PSIs). The PSIs allow comparison among Utah hospitals with similar patients nationwide. This report shows three PSIs, two for maternal injuries during delivery and one for newborn injuries. For more information on the AHRQ PSIs, see <[http://www.qualityindicators.ahrq.gov/psi\\_overview.htm](http://www.qualityindicators.ahrq.gov/psi_overview.htm)>.

## **What are the limitations of quality comparisons in the report?**

Many factors affect a hospital's performance on quality measures. Such factors include the hospital's size, its number of maternity and newborn cases, available specialists, teaching status and especially the medical history of the hospital's mothers and newborns and how ill those mothers and newborns are. Hospitals that treat high-risk (very ill) mothers and newborns may have higher percentages of Cesarean deliveries than hospitals that transfer these cases. Quality indicators adjust for how ill each hospital's mothers and newborns are, but the adjustment may not capture the full complexity of the patient's condition. The Utah Hospital Discharge Database includes up to nine diagnoses and up to six procedures for each patient. Some mothers and newborns have additional diagnoses and procedures that are not included in this database. As a result, the measures of inpatient illness may not be complete. See Glossary and Technical Document.

## **What are the limitations of the charge comparisons in the report?**

The average charge shown in this report differs from "costs," "reimbursement," "price" and "payment." Different payers have different arrangements with each hospital for payment. Many factors will affect the cost of your hospital stay, including whether you have health insurance, the type of insurance and the billing procedures at the hospital. This report excludes outlier (unusually high) charge cases and length of stay cases from the calculation of average charge for inpatients. It does not exclude outlier charge for outpatients (see Glossary and Technical Document). While APR-DRGs do

consider levels for each inpatient's severity of illness, these levels may not completely reflect the complexity of the inpatient's condition. The indicators used in this report do not distinguish between patients expected to recover and patients with do-not-resuscitate (DNR) orders or patients receiving palliative care (comfort care).

### **What are the limitations of injury (safety) comparisons in the report?**

Many factors affect a hospital's performance on injury (safety) measures. Such factors include the hospital's size, its number of maternity and newborn cases, available specialists, teaching status and especially the medical history of the hospital's mothers and newborns and how ill those mothers and newborns are. Hospitals that treat high-risk (very ill) mothers and newborns may have higher percentages of injuries than hospitals that transfer these cases. Quality indicators adjust for how ill each hospital's mothers and newborns are, but the adjustment may not capture the full complexity of the patient's condition. The Utah Hospital Discharge Database includes up to nine diagnoses and up to six procedures for each patient. Some mothers and newborns have additional diagnoses and procedures that are not included in this database. As a result, the measures of inpatient illness may not be complete. See [Glossary](#) and [Technical Document](#).

## Hospitals in Utah

County Name	Hospital Name	Location City, State, Zip	Phone Number
Beaver	Beaver Valley Hospital	Beaver, UT 84713	(435) 438-7100
Beaver	Milford Valley Memorial Hospital	Milford, UT 84751	(435) 387-2411
Box Elder	Bear River Valley Hospital	Tremonton, UT 84337	(435) 257-7441
Box Elder	Brigham City Community Hospital	Brigham City, UT 84302	(435) 734-9471
Cache	Cache Valley Specialty Hospital	North Logan, UT 84341	(435) 713-9700
Cache	Logan Regional Hospital	Logan, UT 84341	(435) 716-1000
Carbon	Castleview Hospital	Price, UT 84501	(435) 637-4800
Davis	Davis Hospital & Medical Center	Layton, UT 84041	(801) 807-1000
Davis	Lakeview Hospital	Bountiful, UT 84010	(801) 299-2200
Duchesne	Uintah Basin Medical Center	Roosevelt, UT 84066	(435) 722-4691
Garfield	Garfield Memorial Hospital	Panguitch, UT 84759	(435) 676-8811
Grand	Allen Memorial Hospital	Moab, UT 84532	(435) 259-7191
Iron	Valley View Medical Center	Cedar City, UT 84720	(435) 868-5000
Juab	Central Valley Medical Center	Nephi, UT 84648	(435) 623-3000
Kane	Kane County Hospital	Kanab, UT 84741	(435) 644-5811
Millard	Delta Community Medical Center	Delta, UT 84624	(435) 864-5591
Millard	Fillmore Community Medical Center	Fillmore, UT 84631	(435) 743-5591
Salt Lake	Alta View Hospital	Sandy, UT 84094	(801) 501-2600
Salt Lake	Intermountain Medical Center	Murray, UT 84157	(801)-507-7000
Salt Lake	Jordan Valley Medical Center	West Jordan, UT 84088	(801) 561-8888
Salt Lake	LDS Hospital	Salt Lake City, UT 84143	(801) 408-1100
Salt Lake	The Orthopedic Specialty Hospital	Salt Lake City, UT 84107	(801) 314-4100

## Hospitals in Utah (continued)

County Name	Hospital Name	Location City, State, Zip	Phone Number
Salt Lake	Pioneer Valley Hospital	West Valley City, UT 84120	(801) 964-3100
Salt Lake	Primary Children's Medical Center	Salt Lake City, UT 84113	(801) 662-1000
Salt Lake	Salt Lake Regional Medical Center	Salt Lake City, UT 84102	(801) 350-4111
Salt Lake	St. Mark's Hospital	Salt Lake City, UT 84124	(801) 268-7111
Salt Lake	University Health Care/University Hospital	Salt Lake City, UT 84132	(801) 581-2121
Salt Lake	Veteran's Administration Medical Center	Salt Lake City, UT 84148	(801) 582-1565
San Juan	San Juan Hospital	Monticello, UT 84535	(435) 587-2116
Sanpete	Gunnison Valley Hospital	Gunnison, UT 84634	(435) 528-7246
Sanpete	Sanpete Valley Hospital	Mount Pleasant, UT 84647	(435) 462-2441
Sevier	Sevier Valley Medical Center	Richfield, UT 84701	(435) 893-4100
Tooele	Mountain West Medical Center	Tooele, UT 84074	(435) 843-3600
Uintah	Ashley Regional Medical Center	Vernal, UT 84078	(435) 789-3342
Utah	American Fork Hospital	American Fork, UT 84003	(801) 855-3300
Utah	Mountain View Hospital	Payson, UT 84651	(801) 465-7000
Utah	Orem Community Hospital	Orem, UT 84057	(801) 224-4080
Utah	Timpanogos Regional Hospital	Orem, UT 84057	(801) 714-6000
Utah	Utah Valley Regional Medical Center	Provo, UT 84603	(801) 357-7850
Wasatch	Heber Valley Medical Center	Heber City, UT 84032	(435) 654-2500
Washington	Dixie Regional Medical Center	St. George, UT 84790	(435) 251-1000
Weber	McKay-Dee Hospital	Ogden, UT 84403	(801) 387-2800
Weber	Ogden Regional Medical Center	Ogden, UT 84405	(801) 479-2111

## **Become an Informed Health Care Consumer**

Choosing a hospital that is right for you or a family member might be one of the most important decisions you'll ever make. You can improve your care and the care of your loved ones by taking an active role in your treatment. Remember to ask questions and always consider yourself a partner in your care and treatment.

The following websites contain materials that will help patients choose wisely when making medical decisions:

### **Questions are the Answer: Get More Involved in Your Health Care**

**<http://www.ahrq.gov/questionsaretheanswer/index.html>**

### **Guide to Health Quality: How to Know It When You See It**

**<http://www.ahrq.gov/consumer/guidetoq/>**

### **Be an Active Health Care Consumer**

**<http://www.ahrq.gov/path/beactive.htm>**

### **Navigating the Health Care System**

**<http://www.ahrq.gov/consumer/cc.htm>**

## **Why use these indicators/measures?**

### **AHRQ Inpatient Quality Indicators**

The Agency for Healthcare Research and Quality (AHRQ), a federal agency charged with overseeing quality of care, developed the Inpatient Quality Indicators (IQIs). The IQIs allow comparison among Utah inpatients and similar inpatients nationwide based on the State Inpatient Databases 2005, the most recently available database, through the expected rate. These databases represent about 90% of all inpatients in the U.S. from participating states in 2005. The Healthcare Cost and Utilization Project (HCUP) collects these data every year.

The AHRQ IQIs are nationally recognized indicators and are used in this report in compliance with the mandates of Senate Bill 132, the Health Care Consumer's Report Bill, which was passed in 2005.

### **APR-DRGs**

Measures for average hospital charge are All Patient Refined Diagnosis Related Groups (APR-DRGs) for similar, though not identical, kinds of maternity and newborn care in this report's quality of care section. APR-DRG software, widely used in health care research, organizes about 20,000 clinical diagnoses and procedures into about 300 groups. Read this report's Technical Document to learn more.

Each APR-DRG has four levels for severity of illness. This report shows average hospital charge for minor and moderate severity of illness levels combined and average hospital charge for major and extreme severity of illness levels combined. This report uses APR-DRG version 20.0, because the Agency for Healthcare Research and Quality (AHRQ) uses it for expected rate in the Inpatient Quality Indicators (IQIs).

Please note that other Utah Department of Health reports that include average charge information use APR-DRG Version 15.0 for data from 2004 and earlier.

Also be aware that the number of patients in each IQI may not be the same as the number of patients for a similarly named APR-DRG. First, the APR-DRGs are hierarchical, mutually exclusive groups of conditions and procedures. A patient's APR-DRG reflects that patient's most resource-intensive condition and/or procedure. Second, each IQI has patient exclusion and inclusion criteria that may not be the same as those for a similar APR-DRG. Third, most IQIs are based on three years of data because the annual number of deaths per indicator is often small. For more information, see this report's [Technical Document](#).

## Maternity and Newborn Resources for Consumers

If you would like to learn more about maternity and newborn care, below is a list of reputable state and national Websites that you may find helpful.

For more information, including a list of sites in Utah that provide low cost or sliding scale prenatal care, please call the Utah Department of Health's [Baby Your Baby](#) program at 1-800-826-9662.

**American Academy of Pediatrics** - offers a wide range of helpful information for parents including how and where to find a pediatrician, safety and injury facts, and immunization tips.

**American College of Obstetricians and Gynecologists** - is a national medical organization representing over 52,000 members who provide health care for women. ACOG develops standards of care during pregnancy including recommendations about prenatal screening for possible genetic conditions.

**HealthInsight** – is the Quality Improvement Organization (QIO) for both Utah and Nevada. View easy-to-read rankings of Utah hospitals for heart attack, heart failure, pneumonia and surgical infection prevention.

**March of Dimes** - Whether you're pregnant, thinking about getting pregnant or parenting a newborn, you're bound to have questions. Find the answers you're looking for here.

**National Women's Health Information Center** - touts itself as "the most reliable and current information resource on women's health today." Site users are reminded that getting informed is the first step in keeping yourself and your baby healthy. Sponsored by the federal agency, U.S. Department of Health and Human Services.

**Utah Department of Health, Pregnancy Risk Line** - a free, private, and easy-to-use telephone information service that answers questions about medicines, drugs, chemicals, and other environmental exposures that can potentially harm an embryo, fetus, or infant.

**Utah Department of Health, Reproductive Health Program** - provides consumer resources designed to educate women, families, health care providers, and the community about reproductive health issues.

## **General Terms Used in This Report**

**Actual death percentage:** the actual number of deaths per 100 patients with a certain condition or procedure. Actual death percentage does not adjust for the hospital's case mix. Other name: observed death rate per 100 patients. Some measures exclude transfer patients.

**Actual Rate:** The actual rate is the number of events that occurred for every 100 patients for some indicators and for every 1,000 patients for other indicators. Some measures exclude transfer patients. This rate is not risk-adjusted.

**Agency for Healthcare Research and Quality (AHRQ):** a federal agency that develops indicators of patient safety and quality of care and engages in other related activities.

**Allergic reaction:** swollen glands, trouble breathing and other body reactions that can be life threatening.

**APR-DRG:** stands for All Patient Refined Diagnosis Related Group, software widely used in health services research. The APR-DRG software organizes about 20,000 clinical diagnoses and procedures into about 300 groups. Each APR-DRG has four levels for severity of illness. This report combines the Minor and Moderate levels and combines the Major and Extreme levels for the average hospital charge tables. This report uses APR-DRG version 20.0. Read more at [http://solutions.3m.com/wps/portal/3M/en\\_US/3MHIS/HealthInformationSystems/products-services/product-list/apr-drg-classification](http://solutions.3m.com/wps/portal/3M/en_US/3MHIS/HealthInformationSystems/products-services/product-list/apr-drg-classification).

**Average charge:** the average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs. The charge may differ from actual payment that the hospital receives. For this report high outlier charges were excluded from each hospital's average charge. A high outlier (unusually high) charge is over 2.5 standard deviations higher than the state mean for each of four subclasses of severity of illness per APR-DRG.

**Expected death percentage:** the number of deaths expected per 100 patients with a certain condition or procedure based on similar patients nationwide in the Healthcare Cost and Utilization Project (HCUP) State Inpatient Databases for 2005. Expected death percentage adjusts for the hospital's case mix (patients' age, gender and how ill the patients are). Some measures exclude transfer patients. Read more at [www.qualityindicators.ahrq.gov/downloads/iqi/iqi\\_guide\\_v31.pdf](http://www.qualityindicators.ahrq.gov/downloads/iqi/iqi_guide_v31.pdf).

**Expected Rate:** the number of patients expected for every 100 patients for some indicators and for every 1,000 patients for other indicators with a certain condition or procedure based on similar patients nationwide in the Healthcare Cost and Utilization Project (HCUP) State Inpatient Databases for 2005. Expected rate adjusts for the hospital's case mix (patients' age, gender and how ill the patients are). Some measures exclude transfer patients. Read more at [www.qualityindicators.ahrq.gov/downloads/iqi/iqi\\_guide\\_v31.pdf](http://www.qualityindicators.ahrq.gov/downloads/iqi/iqi_guide_v31.pdf).

**Facility or facilities:** hospitals that treat outpatients and inpatients and hospitals and ambulatory surgery centers that treat outpatients.

**Inpatient:** spends at least 24 hours in the hospital.

**Inpatient Quality Indicators (IQI):** were developed by the Agency for Healthcare Research and Quality (AHRQ), a federal agency, to be used on inpatient hospital discharge data. AHRQ IQI definitions and methods were used to calculate the actual and expected deaths rates conditions and procedures in this report. AHRQ IQI limitations include possible differences in hospital coding practices and possible inadequacy of the risk adjustment method for expected death percentage. In some reports AHRQ IQIs and APR-DRGs in Utah Hospital Comparison reports are similar but not identical, so the number of patients may not be the same. See the report specific Technical Document. Read more at [www.qualityindicators.ahrq.gov/downloads/iqi/iqi\\_guide\\_v31.pdf](http://www.qualityindicators.ahrq.gov/downloads/iqi/iqi_guide_v31.pdf).

**Outlier charge:** a charge by a specified hospital that is more than 2.5 standard deviations higher than the state average by APR-DRG and severity of illness level. This report excludes outlier charge cases. For more information see the report specific Technical Document.

**Outpatient:** usually spends less than 24 hours in the facility (hospital or freestanding ambulatory surgery center). Many outpatients have surgery and leave the facility the same day. Others have surgery and leave the next day. A few others may stay longer for observation. Some hospitals consider these patients to be outpatients.

**Patient Safety Indicators (PSIs):** Patient safety is quality improvement of health care to reduce medical injuries (e.g., injuries to patients in a health care setting such as a hospital). The Agency for Healthcare Research and Quality (AHRQ), a federal agency, has developed a set of indicators of patient safety based on the inpatient hospital discharge data. Although hospital discharge data do have some limitations, research shows that PSIs may serve as proxies for patient safety-related performance. Read more at [www.qualityindicators.ahrq.gov/](http://www.qualityindicators.ahrq.gov/).

**Severity of illness:** Utah Hospital Comparison reports use two levels of illness based on the APR-DRG's four subclasses for severity of illness (SOI): Minor/Moderate and Major/Severe. For more information see the report specific Technical Document.

**Star rating system:** Utah Hospital Comparison reports use star rating based on a test of statistical significance, the exact 95% confidence interval. For the Heart Surgeries and Conditions Report and the Hip and Knee Surgeries and Conditions Report, this test shows whether the difference between a hospital's actual death percentage and expected death percentage is real (statistically significant,  $p < 0.05$ ) or just due to chance. We calculated the upper and lower exact 95% confidence interval limits for

each hospital's actual death rate for each indicator. If the expected death percentage is between the lower and higher limits for the actual death percentage, then we are 95% confident that the actual death rate and the expected death rate are essentially the same. If the higher limit for the actual death percentage is lower than the expected death percentage, then we are 95% confident that the actual death percentage is really lower than the expected death rate. If the lower limit for the actual death percentage is higher than the expected death percentage, then we are 95% confident that the actual death rate is really higher than the expected death rate. For more information see the report specific Technical Document.

**State Inpatient Databases (SID):** a national sample that represents about 90% of all inpatients from 37 participating states in 2005. The Healthcare Cost and Utilization Project (HCUP) collects these data every year. For this report, the percentage of expected deaths for the quality indicators is adjusted using the SID 2005. Read more at [www.hcup.ahrq.gov](http://www.hcup.ahrq.gov).

**Statistically significant difference:** the star ratings in the AHRQ IQI tables use exact 95% confidence intervals to show whether differences are statistically significant ( $p < 0.05$ ). For more information see the report specific Technical Document.

**Utah overall:** for each specified condition or procedure and (if applicable) severity of illness group (Minor/Moderate or Major/Extreme), all adult cases treated at all Utah hospitals, except some specialty hospitals such as Primary Children's Medical Center. The exceptions are measures for newborns, which, of course, include only newborns for Utah overall. Utah overall average charge is the sum of all reported hospital charges billed to all patients treated at Utah hospitals divided by the number of Utah overall cases except the Veterans Administration. The AHRQ IQI tables include only Utah residents. The APR-DRGs tables include Utah resident and non-resident patients.

Indicator terms, such as expected rate, are based on Agency for Healthcare Research and Quality technical specifications documents.

## **Maternity and Newborn Terms Used in This Report**

**Birth injury:** injuries that happen to the newborn during birth. Birth injuries could include a local infection, broken collar bone or a head injury. Most birth injuries are minor and heal without complications, but in rare cases some serious injuries can cause permanent harm or death. If an injured newborn is transferred to another hospital, that injury may be counted toward the receiving hospital's injury rate.

Some of the injuries that are included in "Birth Injuries – Injury to Newborn" (PSI 17) are not preventable. For instance, some instances of eye damage are complications of a long or difficult labor. Injuries included in this category can also be unspecified. If the practitioner describes an injury that does not have a code, or does not specify what the injury was, it will also be included in this category.

The definition of this indicator changed in late 2003. Prior to October 2003, “head molding” might have been included in the indicator. “Newborn head molding” is an abnormal head shape that occurs from pressure on the baby’s head during delivery. This is not a serious condition and the baby’s head often returns to its normal shape in a few days. For the definition of the birth injury indicator used, see the Technical Document in the maternity and newborn report.

**Cesarean delivery, cesarean section:** a procedure in which the newborn is delivered through a surgical cut in the mother’s abdomen. It can be a lifesaving procedure for mothers and babies when a vaginal delivery is not possible. For example, cesarean delivery can be effective when the baby is in distress or in the wrong position for birth. There is concern, however, that more cesarean deliveries are being performed than are medically necessary, which increases health care costs and puts the mother at higher risk for complications, and involves a longer recovery time. For the definition of the indicators used, see the Technical Document in the maternity and newborn report.

**Dilation and Curettage (D&C):** a procedure that is sometimes used to control unusually high amounts of bleeding after a delivery. In this procedure, the cervix (the opening to the uterus) is dilated (opened up) in order to remove any tissue that should have been delivered (e.g., the placenta). This is done using a curette (a loop, ring or scoop) or suction device.

**First-time Cesarean Delivery:** a cesarean performed for a woman who has never had a cesarean delivery before. For some women, once they have had a cesarean delivery, they will need to have another one with their next baby. If the number of first-time cesarean deliveries is reduced, fewer women will need to have additional cesareans. This can result in lower health care costs and lower risk of complications. For this indicator, women with certain conditions (for example, women having twins) were excluded. For the definition of the indicator used, see the Technical Document in the maternity and newborn report.

**Instruments [Used in Delivery]:** medical instruments that help to get the baby out of the birth canal. Forceps and vacuum extractors are two instruments that are used to gently grasp or pull the baby’s head to help in delivery. There are some increased risks of injury to the mother or the baby when using instruments during a delivery, but they are typically used only when there is difficulty in getting the baby delivered. For the definition of the indicators used, see the Technical Document in the maternity and newborn report.

**Normal Newborns (APR-DRG 640, Version 20.0):** babies in this category were born at full term (37 weeks of pregnancy or more, birth weight greater than 2499 grams or about 5.5 pounds). Most, but not all of these babies, do not have any significant health problems. This category accounts for approximately 85% of Utah newborns. Normal newborns stay in the hospital for two days on average. Charges for a normal newborn include only those that are for the baby after he or she is born and none of the charges for the mother or the delivery. However, some hospitals offer a single charge for a mother and her newborn. For the definition of the indicators used, see the Technical Document in the maternity and newborn report.

**Obstetric Injuries:** lacerations, or tears, in the tissue of the vagina (birth canal), perineum (the tissue between the vagina and the rectum) and rectum (the anal opening) during a vaginal delivery. These tears are classified by different degrees depending on how serious they are. Lacerations classified as 3rd or 4th degree are tracked as patient safety indicators because they can cause long-term

# First-Time Cesarean Delivery (IQI 33)

2007

Hospital	Patients (Denominator)	Actual Rate
<b>Utah Overall</b>	<b>42,373</b>	<b>10.4%</b>
Allen Memorial Hospital	74	18.9%
Alta View Hospital	1,871	7.2%
American Fork Hospital	2,526	8.6%
Ashley Valley Hospital	328	11.3%
Bear River Valley	86	8.1%
Beaver Valley Hospital	78	15.4%
Brigham City Community	290	7.9%
Castleview Hospital	325	8.3%
Central Valley Hospital	115	16.5%
Cottonwood Hospital	2,759	11.8%
Davis Hospital	1,811	10.6%
Delta Community	91	7.7%
Dixie Regional	2,145	4.6%
Fillmore Community	46	2.2%
Gunnison Valley Hospital	115	15.7%
Heber Valley Hospital	206	11.2%
Intermountain Medical Care	736	13.6%
Jordan Valley Hospital	2,160	7.9%
Kane County Hospital	70	21.4%
LDS Hospital	3,230	9.4%
Lakeview Hospital	375	9.3%
Logan Regional	2,059	8.8%
McKay-Dee Hospital	2,981	10.4%

Continued on Next Page

[See additional hospitals that treated at least one patient but less than 30 patients.](#)

[Learn more information about first-time cesarean sections.](#)

[View Data Limitations.](#)

**Actual rate:** percentage of patients who had their first Cesarean delivery in this hospital.

# First-Time Cesarean Delivery (IQI 33)

2007

- CONTINUED -

Hospital	Patients (Denominator)	Actual Rate
<b>Utah Overall</b>	<b>42,373</b>	<b>10.4%</b>
Mountain View Hospital	696	7.2%
Mountain West Hospital	461	10.0%
Ogden Regional	2,054	12.4%
Orem Community	1,089	9.7%
Pioneer Valley Hospital	881	13.3%
Salt Lake Regional	970	9.6%
San Juan Hospital	112	15.2%
Sanpete Valley Hospital	121	16.5%
Sevier Valley Hospital	216	8.8%
St. Mark's Hospital	2,822	18.9%
Timpanogos Regional	1,316	9.1%
Uintah Basin Hospital	458	17.9%
University Health Care	2,323	15.4%
Utah Valley Regional	3,561	7.8%
Valley View Hospital	790	5.7%

[See additional hospitals that treated at least one patient but less than 30 patients.](#)

[Learn more information about first-time cesarean sections](#)

[View Data Limitations.](#)

**Actual rate:** percentage of patients who had their first Cesarean delivery in this hospital.

# Vaginal Delivery After Cesarean (IQI 34)

2007

Hospital	Patients (Denominator)	Actual Rate
<b>Utah Overall</b>	<b>7,120</b>	<b>16.7%</b>
Alta View Hospital	293	13.0%
American Fork Hospital	447	26.8%
Ashley Valley Hospital	61	24.6%
Brigham City Community	39	12.8%
Castleview Hospital	57	0.0%
Cottonwood Hospital	454	15.2%
Davis Hospital	353	11.9%
Dixie Regional	325	22.2%
Gunnison Valley Hospital	32	6.3%
Heber Valley Hospital	38	0.0%
Intermountain Medical Care	113	21.2%
Jordan Valley Hospital	343	7.3%
LDS Hospital	556	28.8%
Lakeview Hospital	50	0.0%
Logan Regional	310	18.1%
McKay-Dee Hospital	568	8.6%
Mountain View Hospital	124	16.1%
Mountain West Hospital	66	3.0%
Ogden Regional	333	12.0%
Orem Community	150	17.3%
Pioneer Valley Hospital	182	8.8%
Salt Lake Regional	101	10.9%
Sevier Valley Hospital	30	0.0%
St. Mark's Hospital	523	13.8%
Timpanogos Regional	196	15.3%
Uintah Basin Hospital	80	11.3%
University Health Care	473	24.7%
Utah Valley Regional	606	21.0%
Valley View Hospital	102	37.3%

[See additional hospitals that treated at least one patient but less than 30 patients.](#)

[Read about suggested guidelines for having a VBAC.](#)

[View Data Limitations.](#)

**Actual rate:** percentage of patients who had a vaginal delivery after a previous Cesarean delivery in this hospital.

## Normal Newborn (APR-DRG 640)

### Average Hospital Charges, Utah, 2007

	Level of Illness			
	Minor/Moderate		Major/Extreme	
Hospital	Patients	Average Charge	Patients	<u>Average Charge</u>
<b>Utah Overall</b>	<b>46,691</b>	<b>\$1,712</b>	<b>1,575</b>	<b>\$5,571</b>
Allen Memorial Hospital	69	\$1,169	<5	\$918
Alta View Hospital	2,044	\$1,872	114	\$3,427
American Fork Hospital	2,751	\$1,946	165	\$5,468
Ashley Regional Medical Center	372	\$1,141	22	\$3,247
Bear River Valley Hospital	91	\$1,254	<5	\$1,219
Beaver Valley Hospital	97	\$1,417	0	\$0
Brigham City Community Hospital	322	\$1,357	6	\$2,011
Castleview Hospital	334	\$1,779	29	\$4,490
Central Valley Medical Center-CAH	118	\$1,696	<5	\$3,761
Cottonwood Hospital	3,079	\$1,988	113	\$3,395
Davis Hospital & Medical Center	2,188	\$1,515	24	\$7,235
Delta Community Medical Center-CAH	109	\$1,668	<5	\$1,570
Dixie Regional Medical Center	2,366	\$1,715	56	\$5,945
Fillmore Community Medical Center-CAH	53	\$1,669	<5	\$4,497
Garfield Memorial Hospital	32	\$1,255	0	\$0

**Continued on Next Page**

#### Table Legend

< 5 = 1 to 4 patients

#### State average hospital length of stay

Minor/Moderate is 3.2 days

Major/Extreme is 5.2 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

## Normal Newborn (APR-DRG 640)

Average Hospital Charges, Utah, 2007

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	<u>Average Charge</u>
<b>Utah Overall</b>	<b>46,691</b>	<b>\$1,712</b>	<b>1,575</b>	<b>\$5,571</b>
Gunnison Valley Hospital-CAH	159	\$1,000	0	\$0
Heber Valley Medical Center-CAH	244	\$1,002	0	\$0
Intermountain Medical Care	799	\$1,531	36	\$4,292
Jordan Valley Medical Center	2,252	\$2,127	100	\$5,635
Kane County Hospital	77	\$1,183	0	\$0
Lakeview Hospital	399	\$1,967	22	\$6,369
LDS Hospital	3,597	\$1,570	108	\$5,663
Logan Regional Hospital	2,299	\$1,378	90	\$7,355
McKay-Dee Hospital	3,382	\$1,504	138	\$8,013
Mountain View Hospital	758	\$1,785	33	\$4,636
Mountain West Medical Center	501	\$2,141	15	\$3,692
Ogden Regional Medical Center	2,257	\$1,284	25	\$6,536

**Continued on Next Page**

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 3.2 days

Major/Extreme is 5.2 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

## Normal Newborn (APR-DRG 640)

Average Hospital Charges, Utah, 2007

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	<u>Average Charge</u>
<b>Utah Overall</b>	<b>46,691</b>	<b>\$1,712</b>	<b>1,575</b>	<b>\$5,571</b>
Orem Community Hospital	1,175	\$1,870	30	\$5,922
Pioneer Valley Hospital	992	\$2,007	25	\$6,700
Salt Lake Regional Medical Center	1,053	\$1,427	6	\$9,431
San Juan Hospital	147	\$1,482	<5	\$2,784
Sanpete Valley Hospital-CAH	120	\$1,827	5	\$3,298
Sevier Valley Medical Center	257	\$1,523	<5	\$1,857
St. Mark's Hospital	3,033	\$2,059	125	\$7,174
Timpanogos Regional Hospital	1,342	\$2,207	50	\$6,164
Uintah Basin Medical Center	569	\$1,163	5	\$3,176
University Health Care	2,408	\$1,369	90	\$4,230
Utah Valley Regional Medical Center	3,942	\$1,890	121	\$5,585
Valley View Medical Center	904	\$1,433	9	\$4,703

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 3.2 days

Major/Extreme is 5.2 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

# Vaginal Delivery (APR-DRG 560)

## Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	Average Charge
<b>Utah Overall</b>	<b>37,798</b>	<b>\$4,792</b>	<b>1,243</b>	<b>\$8,089</b>
Allen Memorial Hospital	57	\$4,228	7	\$6,211
Alta View Hospital	1,739	\$4,099	27	\$5,238
American Fork Hospital	2,449	\$4,241	43	\$6,234
Ashley Regional Medical Center	300	\$4,157	10	\$6,941
Bear River Valley Hospital	79	\$4,176	<5	\$8,726
Beaver Valley Hospital	65	\$3,234	<5	\$4,390
Brigham City Community Hospital	241	\$4,167	7	\$6,982
Castleview Hospital	279	\$4,392	<5	\$5,331
Central Valley Medical Center-CAH	87	\$4,739	<5	\$7,074
Cottonwood Hospital	2,525	\$4,093	48	\$5,522
Davis Hospital & Medical Center	1,587	\$6,785	46	\$9,009
Delta Community Medical Center-CAH	78	\$4,840	0	\$0
Dixie Regional Medical Center	2,138	\$3,661	70	\$6,178
Fillmore Community Medical Center-CAH	42	\$4,914	<5	\$7,922
Garfield Memorial Hospital	20	\$3,827	0	\$0

Continued on Next Page

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 1.8 days

Major/Extreme is 2.6 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

# Vaginal Delivery (APR-DRG 560)

Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	Average Charge
<b>Utah Overall</b>	<b>37,798</b>	<b>\$4,792</b>	<b>1,243</b>	<b>\$8,089</b>
Gunnison Valley Hospital-CAH	96	\$3,033	0	\$0
Heber Valley Medical Center-CAH	172	\$3,662	<5	\$4,520
Intermountain Medical Care	663	\$5,092	33	\$8,033
Jordan Valley Medical Center	1,876	\$6,495	42	\$8,178
Kane County Hospital	52	\$3,230	0	\$0
Lakeview Hospital	340	\$4,860	<5	\$5,125
LDS Hospital	2,916	\$5,051	213	\$9,443
Logan Regional Hospital	1,894	\$3,821	51	\$6,024
McKay-Dee Hospital	2,734	\$4,308	72	\$7,176
Mountain View Hospital	633	\$5,290	15	\$7,485
Mountain West Medical Center	305	\$5,272	10	\$12,554
Ogden Regional Medical Center	1,785	\$4,948	15	\$9,304

Continued on Next Page

## Table Legend

< 5 = 1 to 4 patients

## State average hospital length of stay

Minor/Moderate is 1.8 days

Major/Extreme is 2.6 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

# Vaginal Delivery (APR-DRG 560)

Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	Average Charge
<b>Utah Overall</b>	<b>37,798</b>	<b>\$4,792</b>	<b>1,243</b>	<b>\$8,089</b>
Orem Community Hospital	1,002	\$4,583	25	\$5,619
Pioneer Valley Hospital	672	\$6,347	35	\$8,116
Salt Lake Regional Medical Center	861	\$5,301	7	\$6,082
San Juan Hospital	85	\$4,831	5	\$7,376
Sanpete Valley Hospital-CAH	95	\$4,700	0	\$0
Sevier Valley Medical Center	189	\$3,807	<5	\$4,267
St. Mark's Hospital	2,275	\$5,672	71	\$9,100
Timpanogos Regional Hospital	1,109	\$5,755	24	\$9,978
Uintah Basin Medical Center	326	\$3,833	27	\$4,881
University Health Care	1,874	\$5,714	217	\$10,116
Utah Valley Regional Medical Center	3,380	\$4,324	73	\$7,841
Valley View Medical Center	778	\$3,416	29	\$4,875

## Table Legend

< 5 = 1 to 4 patients

## State average hospital length of stay

Minor/Moderate is 1.8 days

Major/Extreme is 2.6 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

# Vaginal Delivery With Sterilization or Dilation and Curettage

(APR-DRG 541)

## Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	Average Charge
<b>Utah Overall</b>	<b>948</b>	<b>\$6,641</b>	<b>41</b>	<b>\$14,832</b>
Allen Memorial Hospital	<5	\$10,158	0	\$0
Alta View Hospital	32	\$5,119	<5	\$13,446
American Fork Hospital	51	\$4,990	<5	\$7,044
Ashley Regional Medical Center	9	\$8,209	0	\$0
Bear River Valley Hospital	<5	\$5,643	0	\$0
Beaver Valley Hospital	<5	\$5,452	0	\$0
Brigham City Community Hospital	16	\$7,080	0	\$0
Castleview Hospital	13	\$7,469	<5	\$9,138
Central Valley Medical Center-CAH	5	\$7,023	0	\$0
Cottonwood Hospital	27	\$5,009	<5	\$6,286
Davis Hospital & Medical Center	42	\$8,857	0	\$0
Delta Community Medical Center-CAH	6	\$6,253	0	\$0
Dixie Regional Medical Center	42	\$5,049	<5	\$9,485
Fillmore Community Medical Center-CAH	<5	\$6,532	0	\$0
Garfield Memorial Hospital	<5	\$5,612	0	\$0

**Continued on Next Page**

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 1.9 days

Major/Extreme is 3.9 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

# Vaginal Delivery With Sterilization or Dilation and Curettage

(APR-DRG 541)

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	Average Charge
<b>Utah Overall</b>	<b>948</b>	<b>\$6,641</b>	<b>41</b>	<b>\$14,832</b>
Gunnison Valley Hospital-CAH	5	\$4,418	0	\$0
Heber Valley Medical Center-CAH	5	\$6,088	0	\$0
Intermountain Medical Care	5	\$6,666	<5	\$8,583
Jordan Valley Medical Center	61	\$8,789	0	\$0
Kane County Hospital	<5	\$7,650	0	\$0
Lakeview Hospital	22	\$6,469	<5	\$4,327
LDS Hospital	82	\$6,033	9	\$34,005
Logan Regional Hospital	60	\$4,639	<5	\$4,976
McKay-Dee Hospital	79	\$5,475	0	\$0
Mountain View Hospital	17	\$7,097	<5	\$7,091
Mountain West Medical Center	10	\$10,770	0	\$0
Ogden Regional Medical Center	26	\$7,571	0	\$0
Orem Community Hospital	14	\$6,016	0	\$0
Pioneer Valley Hospital	25	\$8,889	<5	\$9,434
Salt Lake Regional Medical Center	28	\$8,399	0	\$0

Continued on Next Page

## Table Legend

< 5 = 1 to 4 patients

## State average hospital length of stay

Minor/Moderate is 1.9 days

Major/Extreme is 3.9 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

## Vaginal Delivery With Sterilization or Dilation and Curettage

(APR-DRG 541)

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	Average Charge
<b>Utah Overall</b>	<b>948</b>	<b>\$6,641</b>	<b>41</b>	<b>\$14,832</b>
San Juan Hospital	<5	\$8,824	0	\$0
Sanpete Valley Hospital-CAH	<5	\$6,039	0	\$0
Sevier Valley Medical Center	7	\$5,678	0	\$0
St. Mark's Hospital	48	\$8,729	0	\$0
Timpanogos Regional Hospital	26	\$8,149	<5	\$12,345
Uintah Basin Medical Center	28	\$5,237	<5	\$6,957
University Health Care	73	\$8,066	9	\$10,784
Utah Valley Regional Medical Center	56	\$4,975	<5	\$11,756
Valley View Medical Center	7	\$5,279	<5	\$6,918

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 1.9 days

Major/Extreme is 3.9 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

## Cesarean Delivery (APR-DRG 540)

### Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	<u>Average Charge</u>
<b>Utah Overall</b>	<b>11,252</b>	<b>\$8,243</b>	<b>824</b>	<b>\$14,552</b>
Allen Memorial Hospital	21	\$10,378	<5	\$9,958
Alta View Hospital	443	\$6,419	8	\$10,136
American Fork Hospital	627	\$7,255	18	\$8,930
Ashley Regional Medical Center	92	\$8,426	<5	\$24,273
Bear River Valley Hospital	19	\$6,229	0	\$0
Beaver Valley Hospital	33	\$6,130	<5	\$9,776
Brigham City Community Hospital	60	\$8,179	0	\$0
Castleview Hospital	93	\$7,882	<5	\$9,747
Central Valley Medical Center-CAH	32	\$8,436	<5	\$16,871
Cottonwood Hospital	813	\$6,897	35	\$9,293
Davis Hospital & Medical Center	563	\$9,040	28	\$12,324
Delta Community Medical Center-CAH	29	\$6,652	0	\$0
Dixie Regional Medical Center	418	\$6,848	41	\$12,855
Fillmore Community Medical Center-CAH	11	\$6,584	0	\$0
Garfield Memorial Hospital	11	\$8,134	0	\$0

**Continued on Next Page**

#### Table Legend

< 5 = 1 to 4 patients

#### State average hospital length of stay

Minor/Moderate is 3.2 days

Major/Extreme is 5.2 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

## Cesarean Delivery (APR-DRG 540)

Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

- CONTINUED -

Hospital	Level of Illness			
	Minor/Moderate		Major/Extreme	
	Patients	Average Charge	Patients	<u>Average Charge</u>
<b>Utah Overall</b>	<b>11,252</b>	<b>\$8,243</b>	<b>824</b>	<b>\$14,552</b>
Gunnison Valley Hospital-CAH	52	\$5,697	0	\$0
Heber Valley Medical Center-CAH	66	\$7,200	<5	\$6,898
Intermountain Medical Care	197	\$8,807	28	\$15,433
Jordan Valley Medical Center	478	\$12,271	18	\$18,861
Kane County Hospital	23	\$9,259	0	\$0
Lakeview Hospital	98	\$7,790	<5	\$11,466
LDS Hospital	742	\$8,905	129	\$17,221
Logan Regional Hospital	498	\$6,167	18	\$8,476
McKay-Dee Hospital	912	\$6,996	69	\$13,048
Mountain View Hospital	163	\$8,615	6	\$9,628
Mountain West Medical Center	53	\$13,963	<5	\$30,751
Ogden Regional Medical Center	581	\$10,848	23	\$15,429

**Continued on Next Page**

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 3.2 days

Major/Extreme is 5.2 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more complex treatment.

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

## Cesarean Delivery (APR-DRG 540)

Average Hospital Charges for Adults 18 Years and Older, Utah, 2007

- CONTINUED -

	Level of Illness			
	Minor/Moderate		Major/Extreme	
Hospital	Patients	Average Charge	Patients	<u>Average Charge</u>
<b>Utah Overall</b>	<b>11,252</b>	<b>\$8,243</b>	<b>824</b>	<b>\$14,552</b>
Orem Community Hospital	250	\$8,330	12	\$13,474
Pioneer Valley Hospital	291	\$11,385	9	\$18,075
Salt Lake Regional Medical Center	195	\$9,955	9	\$10,582
San Juan Hospital	33	\$11,717	<5	\$8,524
Sanpete Valley Hospital-CAH	35	\$8,541	<5	\$25,319
Sevier Valley Medical Center	66	\$8,831	0	\$0
St. Mark's Hospital	1,071	\$7,735	89	\$14,243
Timpanogos Regional Hospital	310	\$9,127	9	\$16,977
Uintah Basin Medical Center	157	\$6,166	7	\$8,978
University Health Care	718	\$8,780	159	\$16,231
Utah Valley Regional Medical Center	864	\$8,010	85	\$14,847
Valley View Medical Center	134	\$6,491	9	\$12,706

### Table Legend

< 5 = 1 to 4 patients

### State average hospital length of stay

Minor/Moderate is 3.2 days

Major/Extreme is 5.2 days.

[View Data Limitations.](#)

**Level of Illness:** Compared to patients with minor/moderate level of illness, patients with major/extreme level of illness are likely to have more serious conditions that require more

**Average Charge:** The average dollars for hospital services for which patients were billed at a particular hospital. The charge does not include physicians' professional fees or patient personal costs.

# Injuries to Mother, Severe Vaginal Tears Without Instruments (PSI 19)

2007

Hospital	Patients (Denominator)	Actual Rate	Expected Rate	Statistical Rating
<b>Utah Overall</b>	<b>37,959</b>	<b>2.6%</b>	<b>4.8%</b>	<b>***</b>
Allen Memorial Hospital - CAH	61	8.2%	7.0%	**
Alta View Hospital	1,626	4.0%	4.7%	**
American Fork Hospital	2,441	2.0%	4.7%	***
Ashley Regional Medical Center	290	2.4%	4.8%	**
Bear River Valley Hospital	70	1.4%	4.8%	**
Beaver Valley Hospital	70	10.0%	4.7%	**
Brigham City Community Hospital	228	0.4%	4.7%	***
Castleview Hospital	303	6.3%	4.7%	**
Central Valley Medical Center - CAH	93	2.2%	5.0%	**
Cottonwood Hospital Medical Center (closed)	2,368	2.6%	4.8%	***
Davis Hospital & Medical Center	1,553	1.5%	4.8%	***
Delta Community Medical Center - CAH	76	5.3%	4.8%	**
Dixie Regional Medical Center	2,226	1.6%	4.8%	***
Fillmore Community Medical Center - CAH	40	2.5%	4.9%	**
Gunnison Valley Hospital - CAH	93	2.2%	4.8%	**
Heber Valley Medical Center - CAH	148	1.4%	4.9%	***
Intermountain Medical Care	672	1.5%	4.8%	***
Jordan Valley Medical Center	1,875	2.8%	4.8%	***
Kane County Hospital	51	3.9%	4.6%	**
LDS Hospital	3,197	3.1%	4.8%	***
Lakeview Hospital	339	5.0%	4.6%	**

Continued on Next Page

**20 Utah hospitals in this table had a lower rate of injuries than expected compared to similar patients nationwide. The remaining 18 Utah hospitals had about the same rate than expected. No hospitals had a higher rate than expected.**

[See additional hospitals that treated at least one patient but less than 30 patients.](#)

[View Data Limitations.](#)

**Rating:** based on the Exact 95% Confidence Interval test of statistical significance.

\*\*\* Lower % injuries than expected, \*\* about same % injuries as expected, \* higher % injuries than expected.

**Actual injuries:** percentage of patients who had these injuries in this hospital.

**Expected injuries:** percentage of patients who were expected to have injuries at this hospital adjusted for its patient mix (age, gender, how ill the patients were).

# Injuries to Mother, Severe Vaginal Tears Without Instruments (PSI 19)

2007

- CONTINUED -

Hospital	Patients (Denominator)	Actual Rate	Expected Rate	<u>Statistical Rating</u>
<b>Utah Overall</b>	<b>37,959</b>	<b>2.6%</b>	<b>4.8%</b>	<b>***</b>
Logan Regional Hospital	1,833	2.8%	4.7%	***
McKay-Dee Hospital Center	2,628	1.3%	4.8%	***
Mountain View Hospital	635	0.5%	4.8%	***
Mountain West Medical Center	419	0.7%	4.7%	***
Ogden Regional Medical Center	1,659	0.4%	4.8%	***
Orem Community Hospital	919	2.6%	4.8%	***
Pioneer Valley Hospital	763	3.0%	4.4%	**
Salt Lake Regional Medical Center	856	1.5%	4.7%	***
San Juan Hospital - CAH	97	7.2%	4.8%	**
Sanpete Valley Hospital - CAH	103	4.9%	4.9%	**
Sevier Valley Medical Center	186	1.1%	4.8%	***
St. Mark's Hospital	2,272	4.8%	4.9%	**
Timpanogos Regional Hospital	1,158	5.3%	4.7%	**
Uintah Basin Medical Center	359	4.2%	4.8%	**
<u>University Health Care</u>	2,265	3.2%	4.8%	***
Utah Valley Regional Medical Center	3,211	2.1%	4.8%	***
Valley View Medical Center	761	1.1%	4.7%	***

**20 Utah hospitals in this table had a lower rate of injuries than expected compared to similar patients nationwide. The remaining 18 Utah hospitals had about the same rate than expected. No hospitals had a higher rate than expected.**

[See additional hospitals that treated at least one patient but less than 30 patients.](#)

[View Data Limitations.](#)

**Rating:** based on the Exact 95% Confidence Interval test of statistical significance.

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\*\*\* Lower % injuries than expected, \*\* about same % injuries as expected, \* higher % injuries than expected.

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**Actual injuries:** percentage of patients who had these injuries in this hospital.

**Expected injuries:** percentage of patients who were expected to have injuries at this hospital adjusted for its patient mix (age, gender, how ill the patients were).

# Injuries to Mother, Severe Vaginal Tears With Instruments (PSI 18)

2007

Hospital	Patients (Denominator)	Actual Rate	Expected Rate	<a href="#">Statistical Rating</a>
<b>Utah Overall</b>	<b>3,915</b>	<b>14.0%</b>	<b>19.4%</b>	<b>* * *</b>
Alta View Hospital	243	18.5%	19.4%	* *
American Fork Hospital	132	24.2%	19.2%	* *
Ashley Regional Medical Center	39	17.9%	19.7%	* *
Brigham City Community Hospital	48	8.3%	18.9%	* *
Cottonwood Hospital Medical Center	278	14.4%	19.9%	* * *
Davis Hospital & Medical Center	241	7.5%	19.2%	* * *
Dixie Regional Medical Center	93	9.7%	19.2%	* * *
Heber Valley Medical Center - CAH	41	12.2%	19.0%	* *
Intermountain Medical Care	47	23.4%	19.6%	* *
Jordan Valley Medical Center	229	18.8%	19.4%	* *
LDS Hospital	153	21.6%	19.8%	* *
Lakeview Hospital	34	8.8%	18.6%	* *
Logan Regional Hospital	245	12.2%	19.2%	* * *
McKay-Dee Hospital Center	356	8.1%	19.2%	* * *

Continued on Next Page

**Most Utah hospitals in this table had about the same rate of injuries as expected compared to similar patients nationwide. Nine Utah hospitals had a lower rate than expected. No hospitals had a higher rate than expected.**

[See additional hospitals that treated at least one patient but less than 30 patients.](#)

[View Data Limitations.](#)

**Rating:** based on the Exact 95% Confidence Interval test of statistical significance.

\* \* \* Lower % injuries than expected, \* \* about same % injuries as expected, \* higher % injuries than expected.

**Actual injuries:** percentage of patients who had these injuries in this hospital.

**Expected injuries:** percentage of patients who were expected to have injuries at this hospital adjusted for its patient mix (age, gender, how ill the patients were).

# Injuries to Mother, Severe Vaginal Tears With Instruments (PSI 18)

2007

- CONTINUED -

Hospital	Patients (Denominator)	Actual Rate	Expected Rate	Statistical Rating
<b>Utah Overall</b>	<b>3,915</b>	<b>14.0%</b>	<b>19.4%</b>	<b>* * *</b>
Mountain View Hospital	57	14.0%	19.7%	* *
Ogden Regional Medical Center	224	4.5%	19.2%	* * *
Orem Community Hospital	141	6.4%	19.3%	* * *
Pioneer Valley Hospital	77	13.0%	17.7%	* *
Salt Lake Regional Medical Center	56	16.1%	19.3%	* *
St. Mark's Hospital	263	14.1%	19.8%	* * *
Timpanogos Regional Hospital	119	16.0%	19.4%	* *
Uintah Basin Medical Center	42	28.6%	19.4%	* *
<a href="#">University Health Care</a>	116	23.3%	19.4%	* *
Utah Valley Regional Medical Center	439	15.0%	19.4%	* * *
Valley View Medical Center	71	11.3%	19.1%	* *

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[View Data Limitations.](#)

**Rating:** based on the Exact 95% Confidence Interval test of statistical significance.

**\* \* \*** Lower % injuries than expected, **\* \*** about same % injuries as expected, **\*** higher % injuries than expected.

**Actual injuries:** percentage of patients who had these injuries in this hospital.

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## Newborn Injuries (PSI 17)

2005-2007

Hospital	Patients (Denominator)	Actual Rate	Expected Rate	Statistical Rating
<b>Utah Overall</b>	<b>158,929</b>	<b>0.2%</b>	<b>0.6%</b>	<b>***</b>
Allen Memorial Hospital - CAH	204	0.0%	0.6%	**
Alta View Hospital	6,749	0.2%	0.6%	***
American Fork Hospital	9,063	0.4%	0.6%	***
Ashley Regional Medical Center	1,116	0.0%	0.6%	***
Bear River Valley Hospital	316	0.6%	0.6%	**
Beaver Valley Hospital	296	0.3%	0.6%	**
Brigham City Community Hospital	1,002	0.1%	0.6%	***
Castleview Hospital	1,228	0.0%	0.6%	***
Central Valley Medical Center - CAH	385	0.5%	0.6%	**
Cottonwood Hospital Medical Center (closed)	11,174	0.1%	0.6%	***
Davis Hospital & Medical Center	7,554	0.1%	0.6%	***
Delta Community Medical Center - CAH	289	0.3%	0.6%	**
Dixie Regional Medical Center	8,159	0.1%	0.6%	***
Fillmore Community Medical Center - CAH	159	0.0%	0.6%	**
Garfield Memorial Hospital	109	0.0%	0.6%	**
Gunnison Valley Hospital - CAH	497	0.0%	0.6%	**

Continued on Next Page

**Most Utah hospitals (25 of 39) in this table had a lower rate of injuries than expected (\*\*\*) compared to similar patients nationwide. The remaining hospitals had about the same rate of injuries as expected. Of these, five more hospitals had no reported injuries in three years.**

[View Data Limitations.](#)

**Rating:** based on the Exact 95% Confidence Interval test of statistical significance.

\*\*\* Lower % injuries than expected, \*\* about same % injuries as expected, \* higher % injuries than expected.

**Actual injuries:** percentage of patients who had these injuries in this hospital.

**Expected injuries:** percentage of patients who were expected to have injuries at this hospital adjusted for its patient mix (age, gender, how ill the patients were).

## Newborn Injuries (PSI 17)

2005-2007

- CONTINUED -

Hospital	Patients (Denominator)	Actual Rate	Expected Rate	Statistical Rating
<b>Utah Overall</b>	<b>158,929</b>	<b>0.2%</b>	<b>0.6%</b>	<b>***</b>
Heber Valley Medical Center - CAH	694	0.0%	0.6%	***
Intermountain Medical Care	939	0.1%	0.6%	***
Jordan Valley Medical Center	7,157	0.1%	0.6%	***
Kane County Hospital	228	0.0%	0.6%	**
Lakeview Hospital	1,348	0.3%	0.6%	**
LDS Hospital	12,715	0.2%	0.6%	***
Logan Regional Hospital	7,862	0.0%	0.6%	***
McKay-Dee Hospital Center	11,446	0.1%	0.6%	***
Mountain View Hospital	2,551	0.0%	0.6%	***
Mountain West Medical Center	1,364	0.1%	0.6%	***
Ogden Regional Medical Center	7,001	0.0%	0.6%	***
Orem Community Hospital	3,843	0.5%	0.6%	**
Pioneer Valley Hospital	4,020	0.1%	0.6%	***
Salt Lake Regional Medical Center	4,065	0.1%	0.6%	***

Continued on Next Page

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## Newborn Injuries (PSI 17)

2005-2007

**- CONTINUED -**

<b>Hospital</b>	<b>Patients (Denominator)</b>	<b>Actual Rate</b>	<b>Expected Rate</b>	<b><u>Statistical Rating</u></b>
<b>Utah Overall</b>	<b>158,929</b>	<b>0.2%</b>	<b>0.6%</b>	<b>***</b>
San Juan Hospital - CAH	405	0.5%	0.6%	**
Sanpete Valley Hospital - CAH	416	0.2%	0.6%	**
Sevier Valley Medical Center	815	0.6%	0.6%	**
St. Mark's Hospital	10,875	0.1%	0.6%	***
Timpanogos Regional Hospital	5,086	0.1%	0.6%	***
Uintah Basin Medical Center	1,600	0.1%	0.6%	***
University Health Care	9,934	0.3%	0.6%	***
Utah Valley Regional Medical Center	13,540	0.1%	0.6%	***
Valley View Medical Center	2,725	0.1%	0.6%	***

**Most Utah hospitals (25 of 39) in this table had a lower rate of injuries than expected (\*\*\*) compared to similar patients nationwide. The remaining hospitals had about the same rate of injuries as expected. Of these, five more hospitals had no reported injuries in three years.**

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