

## PEER GROUPING METHODOLOGY (Peer Groups 1- 5)

### OBJECTIVE:

Peer grouping aims to create groups of similar hospitals for comparison purposes.

### METHODOLOGY:

Seven measures were used to generate a score that reflects the size, patient mix and complexity of services for each hospital. This score was used to define peer groups 1-5. Specialty hospitals (pediatric, rehabilitation, behavioral health, non-acute, long-term care facilities and government hospitals) were excluded from the analysis.

### MEASURES:

#### 1. Number of Beds

Points were assigned based upon the number of hospital beds. The data source was <http://www.ahd.com>.

# of Beds	Points
≥500	10
400-499	7
300-399	5
200-299	3
100-199	1
1-99	0

#### 2. Case Mix Index

The Medicare Case Mix Index **methodology** and IDPH all-payer data for Federal Fiscal Year 2008 were used to calculate the case mix index.

The case mix index was calculated using calculated case weights from CMS (Center for Medicare & Medicaid Services) DRG case weight table for Federal fiscal year 2008 after excluding Medicaid and transfers from another acute care facility. The case mix index was modified by DRG adjustment and a single weighted case mix index was then calculated using the ratio of unadjusted to adjusted total cost using the Case Weight report from WebMD Quality Services.

This adjusted case mix index for each hospital was multiplied by 15 to determine the number of points.

### 3. Resident to Bed Ratio

This measure was used as an indicator of the intensity of the teaching program. The number of residents was obtained from the Accreditation Council for Graduate Medical Education (<http://www.acgme.org>) and American Osteopathic Association <https://www.do-online.org> web sites.

Ratio	Points
≥0.50	10
0.30-0.49	7
0.20-0.29	5
0.1-0.19	3
0.01-0.09	1

Hospitals that have residents but are not listed as a primary sponsoring institution on the ACGME or AOA websites received two points for this measure.

### 4. Transplants

All solid organ transplants except kidney were included. The data source was <http://www.ustransplant.org>. The measure used was number of the transplants (defined above) performed between 1/1/08 and 12/31/08.

Volume	Points
≥50	10
25-49	7
1-24	3

### 5. Open Heart Surgery

Points were assigned for the volume of open-heart surgery. The source was the Illinois All Payer Data for Federal Fiscal Year 2008. DRGs 104 through 106, 108, 110, 111 and 547 through 550 were used to obtain the number of cases.

Volume	Points
≥400	10
300-399	7
200-299	5
100-199	3
50-99	1
0-49	0

## 6. Trauma Centers

Points were assigned to hospitals with trauma center designation. The data sources were the Illinois Hospital Association (IHA) web site (<http://www.ihatoday.org>) and Illinois Department of Public Health (<http://www.idph.state.il.us/ems/traumaregions.htm>).

Level	Points
Level I	10
Level II	6

## 7. Neonatal ICUs

Points were assigned to hospitals with neonatal ICUs based upon the ICU level. The data source was the Illinois Hospital Association (IHA) web site (<http://www.ihatoday.org>).

Level	Points
Level III	10
Level II+	5
Level II	3
Level 0	0

### SUMMARY:

Points were assigned for each of the seven measures. To improve the stability of the peer groups, a hospital will be moved to a different peer group only if for two consecutive years the overall point score indicates that the peer group should change. 2010 is a transition year for this criterion. (The peer group for 2010 was changed for hospitals whose peer group had changed in 2009 and whose 2010 overall point score indicated that the hospital should move back to the 2008 peer group.)

Peer groups are listed on the following pages.

## PEER GROUP 1

Hospital Name	City	2010 Peer Group
Loyola University Medical Center	Maywood	1
Northwestern Memorial Hospital	Chicago	1
Rush University Medical Center	Chicago	1
The University of Chicago Hospitals & Health System	Chicago	1

## PEER GROUP 2

Hospital Name	City	2010 Peer Group
Advocate Christ Hospital	Oak Lawn	2
Advocate Good Samaritan	Downers Grove	2
Advocate Illinois Masonic Hospital	Chicago	2
Advocate Lutheran General Hospital	Park Ridge	2
Carle Foundation Hospital	Urbana	2
Memorial Medical Center –Springfield	Springfield	2
NorthShore University HealthSystem	Evanston	2
OSF St. Francis Hospital – Peoria	Peoria	2
Resurrection Medical Center	Chicago	2
St. James Hospital & Health Centers	Olympia Fields	2
St. John Hospital – Springfield	Springfield	2
University of Illinois Medical Center at Chicago	Chicago	2

## PEER GROUP 3

Hospital Name	City	2010 Peer Group
Adventist Hinsdale Hospital	Hinsdale	3
Adventist La Grange Memorial Hospital	LaGrange	3
Advocate BroMenn Medical Center	Normal	3
Advocate Condell Medical Center	Libertyville	3
Advocate Good Shepherd	Barrington	3
Alexian Brothers Medical Center	Elk Grove Village	3
Blessing Hospital	Quincy	3
Central DuPage Hospital	Winfield	3
Edward Hospital	Naperville	3
Elmhurst Memorial Hospital	Elmhurst	3
Gottlieb Memorial Hospital	Melrose Park	3
MacNeal Hospital	Berwyn	3
Methodist Medical Center Of Illinois	Peoria	3
MetroSouth Medical Center	Blue Island	3
Mount Sinai Hospital	Chicago	3
Northwest Community Hospital	Arlington Heights	3
OSF St. Anthony Hospital - Rockford	Rockford	3
OSF St. Joseph Hospital - Bloomington	Bloomington	3
Provena Mercy Center for Health Care	Aurora	3
Provena St. Joseph Med Ctr - Joliet	Joliet	3
Riverside Medical Center	Kankakee	3
Rush-Copley Medical Center	Aurora	3
Saint Joseph Hospital - Chicago	Chicago	3
Sherman Hospital	Elgin	3
St. Francis Hospital - Evanston	Evanston	3
Swedish American Hospital	Rockford	3
Trinity Regional Health System - West Campus	Rock Island	3

## PEER GROUP 4

Hospital Name	City	2010 Peer Group
Adventist Bolingbrook Hospital	Bolingbrook	4
Centegra Hospital – McHenry	McHenry	4
Centegra Hospital - Woodstock	Woodstock	4
Decatur Memorial Hospital	Decatur	4
Delnor Community Hospital	Geneva	4
Genesis Medical Center, Illini Campus	Silvis	4
Ingalls Memorial Hospital	Harvey	4
Lake Forest Hospital	Lake Forest	4
Little Company of Mary Hospital	Evergreen Park	4
Memorial Hospital – Belleville	Belleville	4
Mercy Hospital	Chicago	4
Palos Community Hospital	Palos Heights	4
Provena Covenant Medical Center	Urbana	4
Provena St. Joseph – Elgin	Elgin	4
Provena St. Mary's Hospital - Kankakee	Kankakee	4
Silver Cross Hospital	Joliet	4
St. Alexius Medical Center	Hoffman Estates	4
St. Elizabeth Hospital - Belleville	Belleville	4
St. Mary of Nazareth Hospital Center	Chicago	4
Swedish Covenant Hospital	Chicago	4
Weiss Memorial Hospital	Chicago	4
West Suburban Medical Center	Chicago	4

## PEER GROUP 5

Hospital Name	City	2010 Peer Group
Adventist Glen Oaks Hospital	Glendale Heights	5
Advocate South Suburban Hospital	Hazel Crest	5
Advocate Trinity Hospital	Chicago	5
FHN Memorial Hospital	Freeport	5
Gateway Regional Medical Center	Granite City	5
Holy Cross Hospital	Chicago	5
Illinois Valley Community Hospital	Peru	5
Jackson Park Hospital	Chicago	5
Kenneth Hall Regional Hospital	East St. Louis	5
Loretto Hospital	Chicago	5
Methodist Hospital of Chicago	Chicago	5
Norwegian American Hospital	Chicago	5
Our Lady of the Resurrection Hospital	Chicago	5
Proctor Hospital	Peoria	5
Provena United Samaritan Medical Center	Danville	5
Provident Hospital	Chicago	5
Roseland Community Hospital	Chicago	5
Rush Oak Park Hospital	Oak Park	5
Sacred Heart Hospital	Chicago	5
Saint Anthony Hospital	Chicago	5
South Shore Hospital	Chicago	5
St. Bernard Hospital & Health Care	Chicago	5
St. Elizabeth Hospital - Chicago	Chicago	5
St. Mary's Hospital – Decatur	Decatur	5
Thorek Hospital & Medical Center	Chicago	5
Touchette Regional Hospital	Centreville	5
Vista Medical Center – East	Waukegan	5
Westlake Hospital	Melrose Park	5

## PEER GROUPING METHODOLOGY (Peer Groups 6 & 7)

### METHODOLOGY:

Hospitals with a population density at the location of the hospital of <1000 persons/square mile are included in peer groups 6 and 7.

Critical access status and bed size were used to define peer groups 6 and 7. Specialty hospitals (pediatric, rehabilitation, behavioral health, non-acute, long-term care facilities and government hospitals) were excluded from the analysis.

#### 1. Critical Access Status

The Illinois Hospital Association (IHA) website (<http://www.ihatoday.org>) was consulted to determine whether a hospital is a critical access hospital. Hospitals identified as critical access hospitals on the IHA website were assigned to peer group 7.

Critical Access Hospital?	Peer Group
Yes	7

#### 2. Number of Beds

For non-critical access hospitals, the number of hospital beds was obtained from <http://www.ahd.com>. If the number of beds was  $\geq 90$ , the hospital was assigned to peer group 6. If the number of beds was <90, the hospital was assigned to peer group 7.

# of Beds	Peer Group
$\geq 90$	6
<90	7

### SUMMARY:

To improve the stability of the peer groups, a hospital will be moved to a different peer group only if for two consecutive years the criteria indicate that the peer group should change. 2010 is a transition year for this criterion. (The peer group for 2010 was changed for hospitals whose peer group had changed in 2009 and whose 2010 information indicated that the hospital should move back to the 2008 peer group.)

Peer groups are listed on the following pages.

## PEER GROUP 6

Hospital Name	City	2010 Peer Group
Alton Memorial Hospital	Alton	6
Anderson Hospital	Maryville	6
CGH Medical Center	Sterling	6
Galesburg Cottage Hospital	Galesburg	6
Good Samaritan Regional Health Center	Mt. Vernon	6
Graham Hospital	Canton	6
Greenville Regional Hospital	Greenville	6
Kishwaukee Community Hospital	DeKalb	6
McDonough District Hospital	Macomb	6
Memorial of Carbondale	Carbondale	6
Ottawa Regional Hospital & Healthcare Center	Ottawa	6
Passavant Area Hospital	Jacksonville	6
Pekin Hospital	Pekin	6
Sarah Bush Lincoln Health Center	Mattoon	6
St. Anthony Hospital - Alton	Alton	6
St. Anthony Memorial Hospital - Effingham	Effingham	6
St. Mary's Hospital - Centralia	Centralia	6
St. Mary's Hospital - Streator	Streator	6

## PEER GROUP 7

Hospital Name	City	2010 Peer Group
Abraham Lincoln Memorial Hospital	Lincoln	7
Carlinville Area Hospital	Carlinville	7
Clay County Hospital	Flora	7
Community Memorial – Staunton	Staunton	7
Crawford Memorial Hospital & Health Services	Robinson	7
Crossroads Community Hospital	Mt. Vernon	7
Dr. John Warner Hospital	Clinton	7
Advocate Eureka Hospital	Eureka	7
Fairfield Memorial Hospital	Fairfield	7
Fayette County Hospital & Long Term Care	Vandalia	7
Ferrell Hospital	Eldorado	7
Franklin Hospital – Benton	Benton	7
Gibson Area Hospital & Health Services	Gibson City	7
Hamilton Memorial Hospital	McLeansboro	7
Hammond-Henry Hospital	Geneseo	7
Hardin County General Hospital	Rosiclare	7
Harrisburg Medical Center	Harrisburg	7
Heartland Regional Hospital	Marion	7
Herrin Hospital	Herrin	7
Hillsboro Area Hospital	Hillsboro	7
Hoopeston Regional Health Center	Hoopeston	7
Hopedale Medical Complex	Hopedale	7
Illini Community Hospital	Pittsfield	7
Iroquois Memorial Hospital	Watseka	7
Jersey Community Hospital	Jerseyville	7
John & Mary E. Kirby Hospital	Monticello	7
Katherine Shaw Bethea Hospital	Dixon	7
Kewanee Hospital	Kewanee	7
Lawrence County Memorial Hospital	Lawrenceville	7
Marshall Browning Hospital	Duquoin	7
Mason District Hospital	Havana	7
Massac Memorial Hospital	Metropolis	7
Memorial Hospital – Chester	Chester	7
Mendota Community Hospital	Mendota	7
Mercer County Hospital	Aledo	7
Mercy Harvard Hospital	Harvard	7
Midwest Medical Center	Galena	7
Morris Hospital	Morris	7
Morrison Community Hospital	Morrison	7
OSF - Holy Family Medical Center	Monmouth	7
OSF St. James - John W Albrecht Medical Center	Pontiac	7
OSF St. Mary's Hospital - Galesburg	Galesburg	7

## PEER GROUP 7 (Contd)

Hospital Name	City	2010 Peer Group
Pana Community Hospital	Pana	7
Paris Community Hospital	Paris	7
Perry Memorial Hospital	Princeton	7
Pinckneyville Community Hospital	Pinckneyville	7
Red Bud Regional Hospital	RedBud	7
Richland Memorial Hospital	Olney	7
Rochelle Community Hospital	Rochelle	7
Salem Township Hospital	Salem	7
Sarah D. Culbertson Memorial Hospital	Rushville	7
Shelby Memorial Hospital	Shelbyville	7
Sparta Community Hospital	Sparta	7
St. Francis – Litchfield	Litchfield	7
St. Joseph – Highland	Highland	7
St. Joseph Memorial Hospital - Murphysboro	Murphysboro	7
St. Joseph's Hospital - Breese	Breese	7
St. Margaret's Hospital	Spring Valley	7
Taylorville Memorial Hospital	Taylorville	7
Thomas H. Boyd Critical Access Hospital	Carrollton	7
Union County Hospital	Anna	7
Valley West Community Hospital	Sandwich	7
Wabash General Hospital	Mt. Carmel	7
Washington County Hospital	Nashville	7