

Pat Quinn, Governor LaMar Hasbrouck, MD, MPH, Director

122 S. Michigan Ave., Suite 700 · Chicago, IL 60603-6119 · www.idph.state.il.us

### Illinois Statewide Central Line-associated Blood Stream Infection Report (CLABSI) - Pediatric and Neonatal ICU Health Care Associated Infections

Hospitals in Illinois are participating in programs to reduce the number of infections acquired during hospital stays. While it is difficult to reduce infections to zero, following specific protocols can greatly reduce the risk. The Hospital Report Card Act (Illinois Public Act 93-563) requires Illinois hospitals to report central line associated bloodstream infections(CLABSIs) occurring in critical care units, also known as intensive care units (ICUs). Comparison summary data for CLABSIs, expressed as a Standardized Infection Ratio (SIR), are presented by hospital for each of three ICU types (ex. Medical, Surgical and Medical/Surgical). Interpretation of these summary measures is provided.

This data represents reporting of **CLABSI** in Pediatric and Neonatal ICU from January 1, 2013 to December 31, 2013.

Location: Pediatric Cardiothoracic Intensive Care Unit

Hospital Name	City	Observed [O] Number of CLABSIs	Number of Central Line Days <sup>b</sup>	Statistically "Expected" [E] Number of CLABSIs <sup>c</sup>	Unit-Specific SIR <sup>d</sup> = O/E	95% Confidence Interval - Lower Bound <sup>e</sup>		Statistical Interpretation <sup>f</sup>
ADVOCATE CHRIST MEDICAL CENTER	OAK LAWN	1	2085	6.88	0.15	0.01	0.72	Lower
ANN AND ROBERT H LURIE CHILDREN'S HOSPITAL OF CHICAGO	CHICAGO	3	4480	14.78	0.20	0.05	0.55	Lower
THE UNIVERSITY OF CHICAGO MEDICAL CENTER	CHICAGO	2	318	1.05	1.91	0.32	6.30	Similar

#### Location: Pediatric Medical Intensive Care Unit

Hospital Name	City	Observed [O] Number of CLABSIs	Number of Central Line Days <sup>b</sup>	Statistically "Expected" [E] Number of CLABSIs <sup>c</sup>	Unit-Specific SIR <sup>d</sup> = O/E	95% Confidence Interval - Lower Bound <sup>e</sup>	95% Confidence Interval - Upper Bound	Statistical Interpretation <sup>f</sup>
ADVOCATE CHRIST MEDICAL CENTER	OAK LAWN	1	1779	2.31	0.43	0.02	2.13	Similar
EDWARD HOSPITAL	NAPERVILLE	0	58	0.08	•		•	Not Available
PRESENCE SAINT JOSEPH MEDICAL CENTER	JOLIET	0	0	0.00				Not Available

#### Location: Pediatric Medical/Surgical Intensive Care Unit

Hospital Name	City	Observed [O] Number of CLABSIs	Number of Central Line Days <sup>b</sup>	Statistically "Expected" [E] Number of CLABSIs <sup>c</sup>	Unit-Specific SIR <sup>d</sup> = O/E	95% Confidence Interval - Lower Bound <sup>e</sup>	95% Confidence Interval - Upper Bound	Statistical Interpretation <sup>f</sup>
ADVENTIST HINSDALE HOSPITAL	HINSDALE	0	3	0.01				Not Available
ADVOCATE LUTHERAN GENERAL HOSPITAL	PARK RIDGE	0	1350	4.05	0.00		0.74	Lower
ANN AND ROBERT H LURIE CHILDREN'S HOSPITAL OF CHICAGO	CHICAGO	6	4235	12.71	0.47	0.19	0.98	Lower
CENTRAL DUPAGE HOSPITAL	WINFIELD	0	188	0.56				Not Available
JOHN H. STROGER, JR. HOSPITAL OF COOK COUNTY	CHICAGO	0	233	0.70				Not Available
LOYOLA UNIVERSITY MEDICAL CENTER	MAYWOOD	1	672	2.02	0.50	0.03	2.45	Similar
MOUNT SINAI HOSPITAL	CHICAGO	0	118	0.35				Not Available
OSF SAINT FRANCIS MEDICAL CENTER	PEORIA	4	4005	12.02	0.33	0.11	0.80	Lower
ROCKFORD MEMORIAL HOSPITAL	ROCKFORD	1	589	1.77	0.57	0.03	2.79	Similar
RUSH UNIVERSITY MEDICAL CENTER	CHICAGO	1	1508	4.52	0.22	0.01	1.09	Similar

### Location: Pediatric Medical/Surgical Intensive Care Unit

Hospital Name	City	Observed [O] Number of CLABSIs	Number of Central Line Days <sup>b</sup>	Statistically "Expected" [E] Number of CLABSIs <sup>c</sup>	Unit-Specific SIR <sup>d</sup> = O/E	95% Confidence Interval - Lower Bound <sup>e</sup>	95% Confidence Interval - Upper Bound	Statistical Interpretation <sup>f</sup>
ST. ALEXIUS MEDICAL CENTER	HOFFMAN ESTATES	0	229	0.69				Not Available
ST. JOHN'S HOSPITAL	SPRINGFIELD	1	457	1.37	0.73	0.04	3.60	Similar
THE UNIVERSITY OF CHICAGO MEDICAL CENTER	CHICAGO	2	2575	7.73	0.26	0.04	0.86	Lower
UNIVERSITY OF ILLINOIS HOSPITAL AT CHICAGO	CHICAGO	4	817	2.45	1.63	0.52	3.94	Similar

Location: Neonatal Intensive Care Unit - Level II/III

Hospital Name	City	Observed [O] Number of CLABSIs	Number of Central Line Days <sup>b</sup>	Statistically "Expected" [E] Number of CLABSIs <sup>c</sup>	Unit-Specific SIR <sup>d</sup> = O/E	95% Confidence Interval - Lower Bound <sup>e</sup>	95% Confidence Interval - Upper Bound	Statistical Interpretation <sup>f</sup>
ADVENTIST HINSDALE HOSPITAL	HINSDALE	1	1011	2.54	0.39	0.02	1.94	Similar
ADVOCATE CHRIST MEDICAL CENTER	OAK LAWN	2	4643	10.76	0.19	0.03	0.61	Lower
ADVOCATE LUTHERAN GENERAL HOSPITAL	PARK RIDGE	3	3591	8.98	0.33	0.09	0.91	Lower
ANN AND ROBERT H LURIE CHILDREN'S HOSPITAL OF CHICAGO	CHICAGO	4	5235	11.90	0.34	0.11	0.81	Lower
CARLE FOUNDATION HOSPITAL	URBANA	8	1188	3.09	2.59	1.20	4.92	Higher
CENTRAL DUPAGE HOSPITAL	WINFIELD	0	1202	3.04	0.00	·	0.99	Lower
JOHN H. STROGER, JR. HOSPITAL OF COOK COUNTY	CHICAGO	2	2795	6.05	0.33	0.06	1.09	Similar
NORTHSHORE UNIV HS EVANSTON HOSPITAL	EVANSTON	2	2811	7.46	0.27	0.05	0.89	Lower
NORTHWESTERN MEMORIAL HOSPITAL	CHICAGO	1	2412	5.52	0.18	0.01	0.89	Lower
ROCKFORD MEMORIAL HOSPITAL	ROCKFORD	4	2383	6.41	0.62	0.20	1.51	Similar

Location: Neonatal Intensive Care Unit - Level II/III

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RUSH UNIVERSITY MEDICAL CENTER	CHICAGO	2	3185	7.69	0.26	0.04	0.86	Lower
ST. ALEXIUS MEDICAL CENTER	HOFFMAN ESTATES	1	1383	2.96	0.34	0.02	1.66	Similar
ST. JOHN'S HOSPITAL	SPRINGFIELD	0	1228	3.33	0.00		0.90	Lower
THE UNIVERSITY OF CHICAGO MEDICAL CENTER	CHICAGO	4	6987	15.93	0.25	0.08	0.61	Lower
UNIVERSITY OF ILLINOIS HOSPITAL AT CHICAGO	CHICAGO	6	2426	6.23	0.96	0.39	2.00	Similar

Location: Neonatal Intensive Care Unit - Level III

Hospital Name	City	Observed [O] Number of CLABSIs	Number of Central Line Days <sup>b</sup>	Statistically "Expected" [E] Number of CLABSIs <sup>c</sup>	Unit-Specific SIR <sup>d</sup> = O/E	95% Confidence Interval - Lower Bound <sup>e</sup>	95% Confidence Interval - Upper Bound	Statistical Interpretation <sup>f</sup>
ADVOCATE GOOD SAMARITAN HOSPITAL	DOWNERS GROVE	1	651	1.71	0.59	0.03	2.89	Similar
ADVOCATE GOOD SHEPHERD HOSPITAL	BARRINGTON	0	22	0.03				Not Available
ADVOCATE ILLINOIS MASONIC MEDICAL CENTER	CHICAGO	4	2796	8.21	0.49	0.16	1.18	Similar
ADVOCATE SHERMAN HOSPITAL	ELGIN	0	210	0.31				Not Available
ALEXIAN BROTHERS MEDICAL CENTER	ELK GROVE VILLAGE	0	227	0.32			·	Not Available
EDWARD HOSPITAL	NAPERVILLE	1	626	1.60	0.62	0.03	3.08	Similar
FRANCISCAN ST. JAMES HEALTH - CHICAGO HEIGHTS	CHICAGO HEIGHTS	0	25	0.03				Not Available
FRANCISCAN ST. JAMES HEALTH - OLYMPIA FIELDS	OLYMPIA FIELDS	0	25	0.03			·	Not Available
LOYOLA UNIVERSITY MEDICAL CENTER	MAYWOOD	1	3110	8.11	0.12	0.01	0.61	Lower
MEMORIAL HOSPITAL OF CARBONDALE	CARBONDALE	0	53	0.08				Not Available

Location: Neonatal Intensive Care Unit - Level III

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METROSOUTH MEDICAL CENTER	BLUE ISLAND	0	61	0.09			·	Not Available
MOUNT SINAI HOSPITAL	CHICAGO	2	2316	5.28	0.38	0.06	1.25	Similar
NORTHWEST COMMUNITY HOSPITAL	ARLINGTON HEIGHTS	2	570	1.35	1.48	0.25	4.89	Similar
NORTHWESTERN LAKE FOREST HOSPITAL	LAKE FOREST	0	42	0.05				Not Available
PRESENCE COVENANT MEDICAL CENTER	URBANA	0	15	0.02				Not Available
PRESENCE MERCY MEDICAL CENTER	AURORA	0	1	0.00				Not Available
PRESENCE RESURRECTION MEDICAL CENTER	CHICAGO	0	60	0.07			·	Not Available
PRESENCE SAINT FRANCIS HOSPITAL	EVANSTON	0	55	0.10				Not Available
PRESENCE SAINT JOSEPH HOSPITAL - CHICAGO	CHICAGO	0	455	1.22	0.00		2.46	Similar
PRESENCE SAINT JOSEPH MEDICAL CENTER	JOLIET	0	46	0.07				Not Available
PRESENCE SAINTS MARY AND ELIZABETH MEDICAL CENTER	CHICAGO	0	35	0.04			·	Not Available

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RUSH-COPLEY MEDICAL CENTER	AURORA	4	928	2.71	1.48	0.47	3.57	Similar
SWEDISHAMERICAN HOSPITAL	ROCKFORD	0	27	0.03				Not Available
THE UNIVERSITY OF CHICAGO MEDICAL CENTER	CHICAGO	0	129	0.21				Not Available
UNITYPOINT HEALTH - TRINITY - ROCK ISLAND	ROCK ISLAND	0	44	0.06			·	Not Available

<sup>&</sup>lt;sup>a</sup> The Standardized Infection Ratio (SIR) is a summary measure used to compare central line associated bloodstream infection (CLABSI) experience among a group of reported locations to that of a standard population. It is the observed number of infections divided by the predicted number of infections.

If the number of observed infections is less than 0 and the number predicted is greater than or equal to 1.00, a 95% confidence interval is reported

- If the 95% confidence interval includes 1.00, the hospital's infection rate is 'Similar' (not significantly different) from predicted.
- If the SIR is greater than 1.00 and the 95% confidence interval does not include 1.00, the hospital's infection rate is significantly 'Higher' than predicted.
- If the SIR is less than 1.00 and the 95% confidence interval does not include 1.00, the hospital's infection rate is significantly 'Lower' than predicted.
- If the predicted number of infections is less than 1.0, the SIR is not calculated because it does not meet the minimum requirement for precision and statistical interpretation is "Not Available".

NOTE: All conclusions are based on the assumption that the hospital's patient population is similar to the NHSN pooled patient population

<sup>&</sup>lt;sup>b</sup> Too few central line days. Reporting on too few procedures is a risk to patient confidentiality. If there are fifty (50) or fewer central line days, the report for the number of infections will be deferred until there are more central line days.

<sup>&</sup>lt;sup>d</sup> If the predicted number of infections is less than 1.0, the SIR is not calculated because it does not meet the minimum requirement for precision.

<sup>&</sup>lt;sup>e</sup> The lower bound of the confidence interval is calculated only if the infection count greater than 0.

<sup>&</sup>lt;sup>f</sup> Statistical Interpretation of SIR: