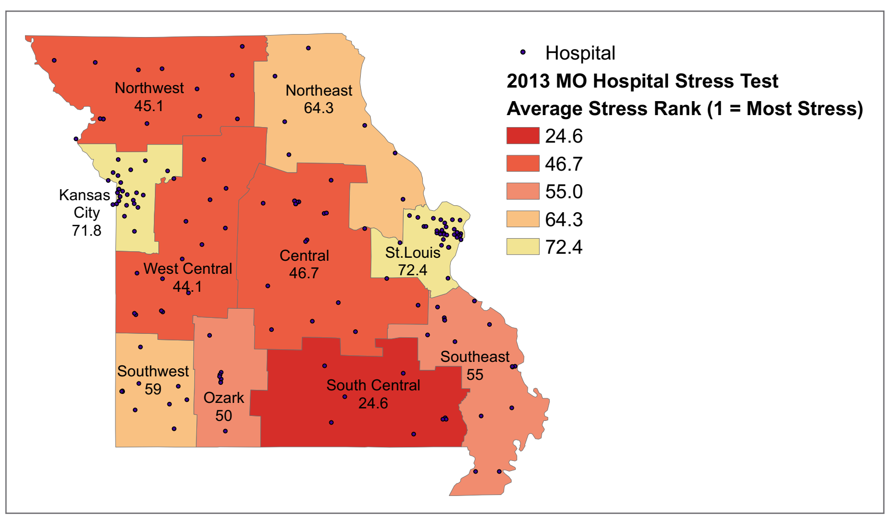
HIDI HealthStats

Statistics and Analysis From the Hospital Industry Data Institute

JULY 2014 ■ **ECONOMIC AND FINANCIAL STRESSES ON MISSOURI HOSPITALS**

The Missouri Hospital Association conducts an annual financial stress test of its member hospitals. The Missouri Hospital Stress Test was developed in response to the extraordinary fiscal pressures facing hospitals as a result of the dynamic contemporary policy landscape in the United States and in Missouri. New federal policies, such as the Medicaid disproportionate share payment reductions, various Medicare reimbursement cuts arising through the Affordable Care Act and subsequent legislative activity, coupled with Medicare sequestration are increasing the solvency pressure faced by hospitals. This pressure is compounded by accountability policies, such as the community health needs assessment, pay for performance and hospital readmission reduction programs, that require hospitals to improve care for patients and the community while reducing health care spending. At the same time, hospitals are treating more uninsured and underinsured patients than ever before, with little or no compensation. In Missouri, hospitals' fiscal pressures also continue to be exacerbated by the failure of Missouri's legislature to reform and expand Medicaid.

Figure 1: 2013 Missouri Hospital Stress Test, Average Hospital Rank by Region (lower ranks indicate higher average stress)



The Missouri Hospital Stress Test is based on trends observed in financial data included in the Missouri Hospital Annual Licensing Survey, utilization data included in the HIDI Inpatient Discharge Databases and future reimbursement reductions that hospitals will experience as a result of the Affordable Care Act and the American Taxpayer Relief Act. A stress index is computed for each acute care hospital in the state. The index is based on the following five key indicators of financial health for hospitals.

HIDI
HOSPITAL INDUSTRY DATA INSTITUTE
The Data Company of the Missouri Hospital Association

- payer mix ratio
- operating margin
- uncompensated care as a percent of gross revenue
- cumulative cuts through 2019 as a percent of operating revenue
- percent change in inpatient volume from 2009

Hospitals are listed in descending order of their respective stress index and assigned a rank where a value of one indicates the highest stress, according to the variables used. Figure 1 shows the average rank for hospitals included in the 2013 Missouri Hospital Stress Test for each workforce investment area in the state. Hospitals in the South Central region of Missouri had the most stress in 2013, with an average rank of 24.6. This implies that on average, the hospitals in the South Central region were in the top stress quartile for the 112 hospitals included in the test.

Table 1 lists the average 2013 scores for each stress test domain by hospital size. The size categories were defined by staffed beds in 2013. The largest 10 percent of hospitals accounted for 41 percent of staffed beds; the middle 40 percent of hospitals accounted for 47 percent of staffed beds; and the smallest 50 percent of hospitals accounted for only 12 percent of staffed beds in Missouri.

The smallest 50 percent of hospitals faced the highest stress levels in each of the five domains except for the cumulative ACA and sequestration cuts through 2019 because many of those cuts do not apply to critical access hospitals. The payer mix ratio is calculated as the ratio of gross revenue from government payers and uninsured patients to patients with commercial insurance. On average, the smallest 50 percent of hospitals in 2013 had $3.03 in revenue from government and uninsured patients for every dollar of commercial pay revenue. The average operating margins for the smallest hospitals were barely in the black at 0.1 percent, and uncompensated care accounted for more than 7 percent of their gross revenue. Since 2009, Missouri's smallest hospitals also have seen a dramatic 13.9 percent decline in inpatient volume — a foundational revenue center for hospitals.

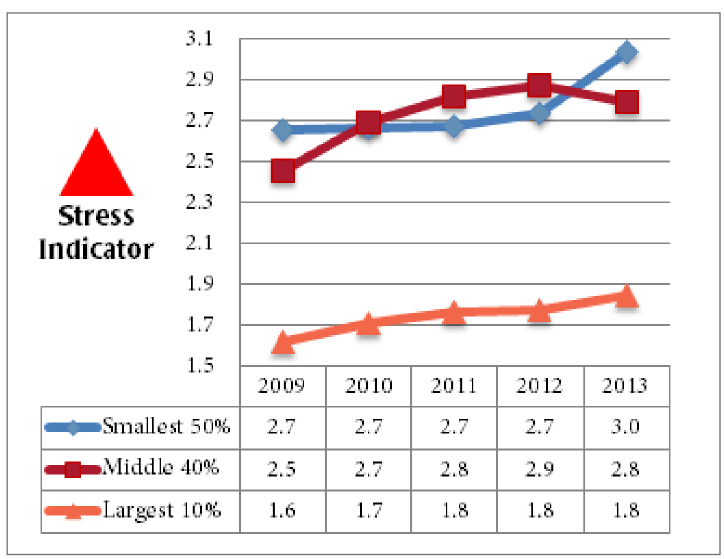
Table 1: 2013 Missouri Hospital Stress Test Domain Scores by Hospital Size

2013 Average Score	Smallest 50%	Middle 40%	Largest 10%	All Hospitals
Payer Mix Ratio	3.03	2.79	1.85	2.80
Operating Margin	0.1%	2.7%	4.4%	1.6%
Uncompensated Care Percent of Gross Revenue	7.1%	6.6%	5.1%	6.7%
2019 Cumulative Cuts Percent of Operating Revenue	16.3%	24.4%	20.3%	19.9%
Inpatient Percent Change From 2009	-13.9%	-4.6%	3.6%	-8.2%
Average Rank (Lower Rank Indicates Higher Stress)	51	57	79	57

Payer Mix Ratio

The payer mix ratio is a key indicator of financial risk because government payers such as Medicare and Medicaid typically exercise their substantial purchasing power by compensating providers below the cost they actually incur. Further, providing care for uninsured patients often results in no compensation for the providers at all. Therefore, higher payer mix ratios indicate more undercompensated and uncompensated care provided by hospitals. Figure 2 shows the trends in payer mix ratios since 2009 for small, medium and large hospitals in Missouri. The ratios have been trending up in Missouri during the past five years for hospitals of all sizes. However, in 2013, the average ratio for the largest 10 percent of hospitals was 64 percent lower than the smallest hospitals and 51 percent lower than mid-sized hospitals.

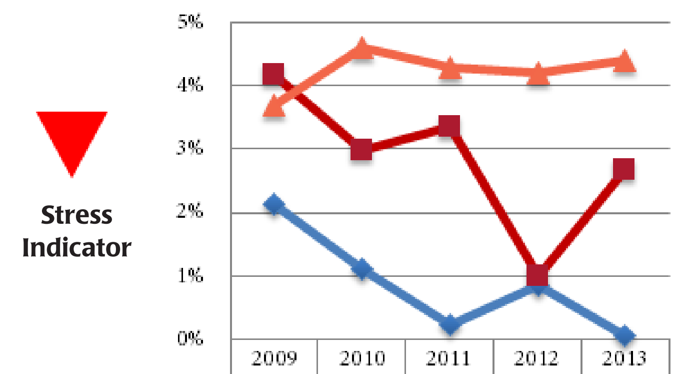
Figure 2: Five-Year Payer Mix Ratio Trend by Hospital Size



Operating Margin

Figure 3 shows the five-year trend in operating margins for Missouri hospitals by bed size categories. The operating margin is calculated as the difference between operating revenue and operating expense and is reported as a percent of operating revenue. A positive operating margin indicates revenues that exceed expenses, and a negative margin indicates that a hospital's expenses are greater than its revenues. The operating margins for the largest 10 percent of hospitals have stabilized to nearly 4.5 percent during the past four years. The margins for small and mid-sized hospitals have trended downward during the past five years, with the smallest 50 percent of hospitals finishing the period with a collective average operating margin near zero.

Figure 3: Five-Year Operating Margin Trend by Hospital Size

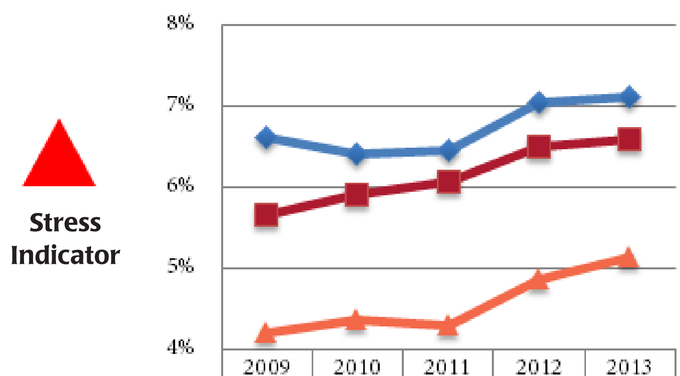


	2009	2010	2011	2012	2013
Smallest 50%	2.1%	1.1%	0.2%	0.8%	0.1%
Middle 40%	4.2%	3.0%	3.3%	1.0%	2.7%
Largest 10%	3.7%	4.6%	4.3%	4.2%	4.4%

Uncompensated Care as a Percent of Gross Revenue

Figure 4 shows the trend in uncompensated care as a percent of gross revenue since 2009 for large, mid-sized and small hospitals in Missouri. Uncompensated care is measured as the bad debt and charity care reported by hospitals in the Missouri Hospital Annual Licensing Survey. Charity care and bad debt have increased across the board in Missouri as a result of the recent recession and proliferation of high-deductible health care plans. Taken as a percent of gross revenue, small hospitals have seen the smallest increase in uncompensated care throughout the past five years. However, they also had the highest levels of uncompensated care as a percent of revenue, with 6.6 percent in 2009 and 7.1 percent in 2013. By comparison, the largest 10 percent of hospitals had uncompensated care at more than 4 percent of gross revenue through 2011 and ended the period up less than one point at 5.1 percent in 2013. Mid-sized hospitals featured

Figure 4: Five-Year Uncompensated Care as a Percent of Gross Revenue Trend by Hospital Size



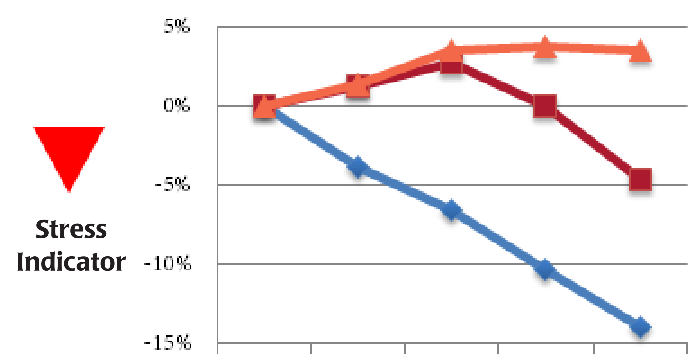
	2009	2010	2011	2012	2013
Smallest 50%	6.6%	6.4%	6.5%	7.0%	7.1%
Middle 40%	5.7%	5.9%	6.1%	6.5%	6.6%
Largest 10%	4.2%	4.4%	4.3%	4.9%	5.1%

monotonic growth in uncompensated care as a percent of gross revenue during the last five years.

Inpatient Utilization

Inpatient volume in Missouri as a whole has decreased nearly 4 percent since 2009. This is primarily because more health care procedures and services are moving from traditional inpatient settings into outpatient and ambulatory care settings. There also appears to be a shift in inpatient care away from small and mid-sized hospitals to larger, highly-specialized hospitals. The largest 10 percent of hospitals experienced 4 percent growth in inpatient volume between 2009 and 2013. Mid-sized hospitals ended the period with a 5 percent decrease in inpatient volume compared to 2009, with the most significant decline occurring between 2012 and 2013. The smallest 50 percent of hospitals experienced a near-linear 14 percent decline in inpatient volume between 2009 and 2013.

Figure 5: Five-Year Inpatient Volume Percent Change from 2009 by Hospital Size



	2009	2010	2011	2012	2013
Smallest 50%	0%	-4%	-7%	-10%	-14%
Middle 40%	0%	1%	3%	0%	-5%
Largest 10%	0%	1%	4%	4%	4%

Additional Information

MHA-member hospitals included in the data can access their hospital-specific 2013 Missouri Hospital Stress Test on HIDI Analytic Advantage®. Member hospitals also can receive quarterly stress tests by participating in the quarterly HIDI Management and Productivity Survey. For additional information on how to gain access to the reports, email hidi@mail.mhanet.com.

Suggested Citation

Reidhead, M. *HIDI HealthStats*, July 2014: Economic and Financial Stresses on Missouri Hospitals. Missouri Hospital Association, Hospital Industry Data Institute. Available at www.mhanet.com.

---

i © 2013 Missouri Hospital Stress Test, Hospital Industry Data Institute, All Rights Reserved. The Hospital Stress Test is based on a proprietary algorithm developed by analysts at the Missouri Hospital Association and Hospital Industry Data Institute.

ii Missouri Hospital Association. The Hidden Health Care Tax: How Not Reforming Medicaid Could Lead to Cost Shifting. March 2013.

iii includes pediatric specialty and critical access hospitals

HIDI
HOSPITAL INDUSTRY DATA INSTITUTE
The Data Company of the Missouri Hospital Association

P.O. Box 60
Jefferson City, MO 65102-0060