

Mississippi



Mississippi is home to more than 6,100 bioscience industry jobs that span 451 business establishments. The state has a specialization in agricultural feedstock and chemicals with a 75 percent greater employment concentration relative to the national average (location quotient of 1.75). While several state subsectors have experienced job loss, two have seen increases since 2007—medical devices and equipment and research, testing, and medical labs. Average annual wages in Mississippi’s bioscience industry were more than \$58,000 in 2012, 65 percent greater than the overall average for the private sector. The state’s 379 bioscience patents issued since 2009 were largely in surgical and medical instruments and in drugs and pharmaceuticals.

Bioscience Performance Metrics

Summary of State Performance in Selected Bioscience-related Metrics

Metric	Mississippi	United States	Quintile
Bioscience Industry, 2012			
Bioscience Industry Employment	6,106	1,619,746	IV
Bioscience Industry Location Quotient	0.49	n/a	V
Bioscience Industry Establishments	451	73,088	IV
Academic Bioscience R&D Expenditures, FY 2012			
Bioscience R&D (\$ thousands)	\$214,167	\$38,139,876	IV
Bioscience Share of Total R&D	49%	61%	IV
Bioscience R&D Per Capita	\$72	\$119	IV
NIH Funding, FY 2013			
Funding (\$ thousands)	\$47,720	\$22,293,255	IV
Funding Per Capita	\$16	\$70	V
Bioscience Venture Capital Investments, 2009–13 (\$ millions)	\$11.5	\$49,401.7	V
Bioscience and Related Patents, 2009–13	379	100,238	IV

State ranking figures for bioscience performance metrics are calculated as quintiles, where I = top quintile, III = middle quintile, and V = bottom quintile.

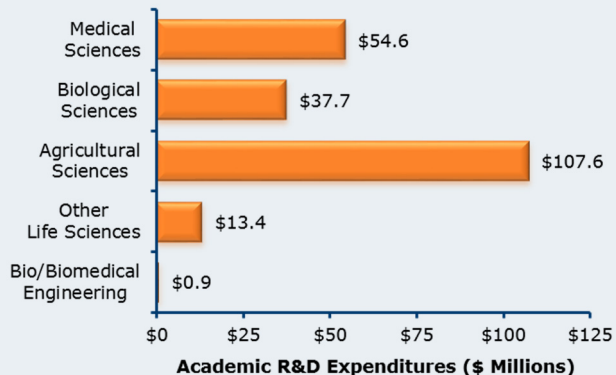
For source notes, see end of State Profile.

Industry Subsector	Mississippi		United States	
	2012	2007-2012 Change	2012	2007-2012 Change
Agricultural Feedstock & Chemicals				
Establishments	16	-20.7%	1,772	5.2%
Employment	1,017	-20.2%	76,404	-1.0%
Location Quotient	1.75		n/a	
Direct-Effect Employment Multiplier	17.0		18.1	
Total Employment Impact	17,307		1,382,637	
Average Annual Wage	\$53,803	25.4%	\$75,828	14.2%
Bioscience-Related Distribution				
Establishments	283	-9.9%	36,793	1.4%
Employment	2,786	-17.0%	442,016	-3.9%
Location Quotient	0.90		n/a	
Direct-Effect Employment Multiplier	2.4		2.7	
Total Employment Impact	6,569		1,199,015	
Average Annual Wage	\$68,094	-11.5%	\$85,188	11.5%
Drugs and Pharmaceuticals				
Establishments	15	-11.8%	3,057	12.0%
Employment	914	-26.2%	284,331	-10.9%
Location Quotient	0.42		n/a	
Direct-Effect Employment Multiplier	6.7		9.9	
Total Employment Impact	6,102		2,673,265	
Average Annual Wage	\$50,744	34.3%	\$106,576	13.9%
Medical Devices and Equipment				
Establishments	25	-16.7%	7,235	12.0%
Employment	534	15.7%	349,432	1.4%
Location Quotient	0.20		n/a	
Direct-Effect Employment Multiplier	2.6		3.9	
Total Employment Impact	1,413		1,318,459	
Average Annual Wage	\$38,778	-13.8%	\$75,695	10.7%
Research, Testing, and Medical Laboratories				
Establishments	113	29.5%	24,231	31.0%
Employment	856	11.1%	467,563	9.7%
Location Quotient	0.24		n/a	
Direct-Effect Employment Multiplier	2.2		2.7	
Total Employment Impact	1,866		1,284,196	
Average Annual Wage	\$50,705	9.3%	\$91,248	15.9%
Total Bioscience Industry				
Establishments	451	-3.5%	73,088	11.4%
Employment	6,106	-14.0%	1,619,746	-0.4%
Location Quotient	0.49		n/a	
Direct-Effect Employment Multiplier	4.7		4.9	
Total Employment Impact	28,817		7,857,572	
Average Annual Wage	\$58,118	-0.9%	\$88,202	12.8%
Total Private Sector				
Establishments	64,847	-1.5%	8,699,564	-0.5%
Employment	846,761	-5.7%	111,137,206	-3.1%
Average Annual Wage	\$35,261	11.3%	\$49,130	11.1%

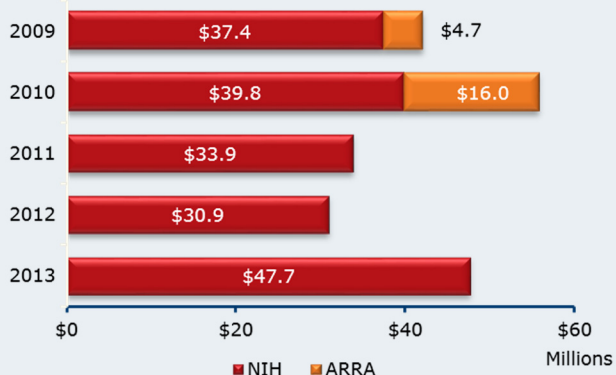
Note: U.S. employment metrics include Puerto Rico. Estimates of total impacts do not include Puerto Rico.

Bioscience Research in Mississippi

Bioscience Academic R&D Expenditures, FY 2012



NIH Awards, 2009–2013

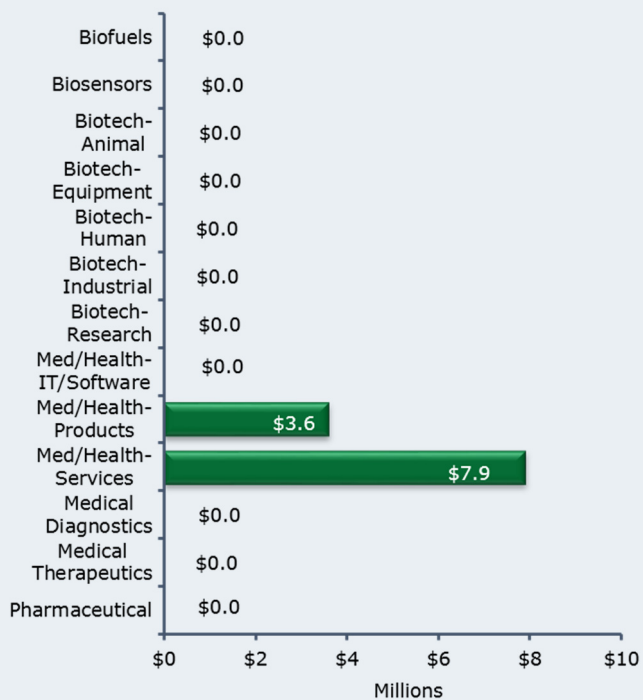


Bioscience Venture Capital in Mississippi

Bioscience-Related Venture Capital Investments, 2009–2013

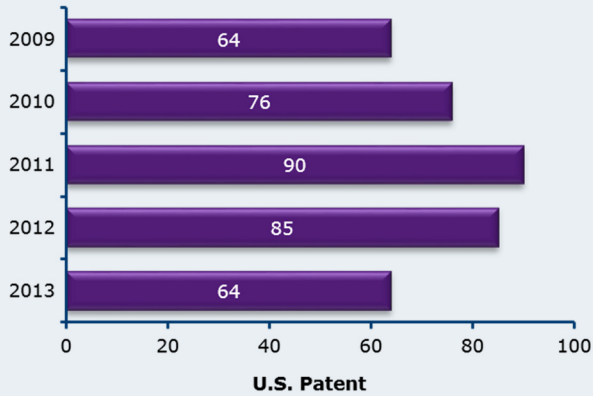


Bioscience-Related Venture Capital Investments by Segment, 2009–2013

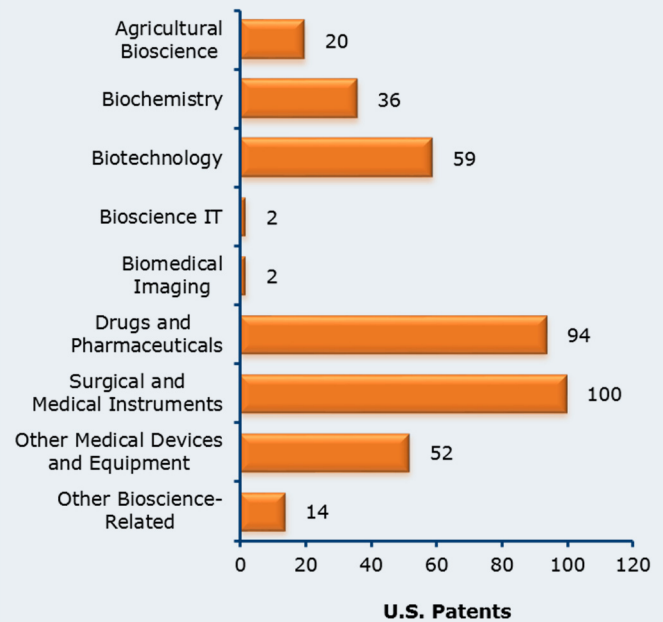


Bioscience Patents in Mississippi

Bioscience-Related Patents, 2009–2013



Bioscience-Related Patents by Segment, 2009–2013



Source Notes

Employment, Establishments, and Wages: U.S. Bureau of Labor Statistics, Quarterly Census of Employment and Wages (QCEW), enhanced file from the IMPLAN Group, LLC.

Employment Multipliers: IMPLAN Group, LLC state-level Input/Output models.

Academic R&D Expenditures: National Science Foundation (NSF) Higher Education Research and Development (HERD) Survey.

NIH Funding: National Institutes of Health, *NIH Awards by Location & Organization* (summary information within RePORT database), and NIH-managed funding for FY 2009 and FY 2010 from the American Recovery and Reinvestment Act (ARRA) website.

Venture Capital: Thomson Reuters Thomson ONE venture capital database.

Patents: U.S. Patent & Trademark Office data from Thomson Reuters Delphion Patent Analysis Database.

For a more detailed discussion of the data and methodology used, please see the Appendix to the full national report.