

South Carolina

The U.S. Bioscience Industry: Fostering Innovation and Driving America's Economy Forward

South Carolina's bioscience industry has experienced strong employment growth since 2018, increasing by nearly 22 percent and reaching 19,418 jobs in 2021, with firms operating 1,918 business establishments across the state. South Carolina has a high, above-average employment concentration in the pharmaceuticals subsector of the industry. NIH awards to South Carolina institutions have steadily risen in recent years and by 2021 totaled \$226 million. State universities spent \$462 million on R&D activities in bioscience-related fields, which comprises 71 percent of all academic R&D in science and engineering fields. This concentration of bioscience academic R&D expenditures is well above the national average.

Bioscience Performance Metrics

Summary of State Performance in Selected Bioscience-related Metrics

Metric	South Carolina	United States	Quintile
Bioscience Industry, 2021			
Bioscience Industry Employment	19,418	2,135,704	Ш
Bioscience Industry Location Quotient	0.64	n/a	IV
Bioscience Industry Establishments	1,918	127,389	III
Academic Bioscience R&D Expenditures, FY 2020			
Bioscience R&D (\$ thousands)	\$462,193	\$51,108,737	III
Bioscience Share of Total R&D	71%	63%	1
Bioscience R&D Per Capita	\$90	\$154	IV
NIH Funding, FY 2021			
Funding (\$ thousands)	\$226,214	\$34,751,109	III
Funding Per Capita	\$44	\$105	IV
Bioscience Venture Capital Investments, 2018-21 (\$ millions)	\$119.10	\$197,674.54	IV
Bioscience-Related Patents, 2018-21	704	153,072	Ш

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.

Agricultural Feedstock and Industrial Biosciences	Industry Subsector		South Carolina		United States	
Agricultural Feedstock and Industrial Feedstock and Industrial Biosciences Employment 369 -7.3% 69.573 369 -7.3% 69.573 369 -7.3% 69.573 369 -7.3% 69.573 369 -7.3% 69.573 369 -7.3% 69.573 369 -7.3% 69.573 369 369 -7.3% 69.573 369			2021		2021	2018–2021 Change
Feedstock and Industrial Biosciences Employment 369 -7.3% 69,573 369 Average Annual Wage \$76,415 19.6% \$91,989 13 Bioscience-Related Distribution Employment 5,074 14.8% 602,589 14 Average Annual Wage \$100,257 16.0% \$121,606 11 Average Annual Wage \$100,257 16.0% \$121,606 11 Medical Devices and Equipment 218 34.9% 10,268 11 Medical Devices and Equipment Employment 3,972 1.8% 398,847 1 Medical Devices and Equipment Location Quotient 0.70 n/a 1 Average Annual Wage \$78,311 20.0% \$98,481 1 Establishments 155 49.8% 5,973 3 Employment 5,600 39.4% 344,839 1 Location Quotient 1.15 n/a 1 Average Annual Wage \$67,600 5.8% \$126,155 1 Research,	Feedstock and Industrial	Establishments	31	-	1,948	10.0%
Biosciences		Employment	369	-7.3%	69,573	1.9%
Average Annual Wage \$76,415 19.6% \$91,989 13		Location Quotient	0.37		n/a	
Employment S,074 14.8% 602,589 Related Location Quotient 0.59 n/a Nerage Annual Wage \$100,257 16.0% \$121,606 19 Nedical Devices and Equipment Location Quotient 0.70 n/a Nerage Annual Wage \$78,311 20.0% \$98,481 19 Nerage Annual Wage \$78,311 20.0% \$79,836 19 Nerag		Average Annual Wage	\$76,415	19.6%	\$91,989	13.1%
Related Distribution Location Quotient 0.59 n/a Average Annual Wage \$100,257 16.0% \$121,606 19 Bestablishments 218 34.9% 10,268 11 Medical Devices and Equipment Employment 3,972 1.8% 398,847 19 Location Quotient 0.70 n/a 10 10 10 10 Average Annual Wage \$78,311 20.0% \$98,481 10 <td rowspan="4">Related</td> <td>Establishments</td> <td>680</td> <td>10.6%</td> <td>62,697</td> <td>14.7%</td>	Related	Establishments	680	10.6%	62,697	14.7%
Distribution		Employment	5,074	14.8%	602,589	6.6%
Establishments 218 34.9% 10,268 11		Location Quotient	0.59		n/a	
Medical Devices and Equipment Employment 3,972 1.8% 398,847 398,848 398,488 398,488 398,488 398,483 398,483 398,483 312,539 398,483 398,483 344,839 398,483 344,839 398,483 344,839 398,483 344,839 398,483 344,839 398,483 344,839 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398,483 348,530 398		Average Annual Wage	\$100,257	16.0%	\$121,606	15.0%
Nedical Devices and Equipment Location Quotient Q	Medical Devices	Establishments	218	34.9%	10,268	17.4%
Average Annual Wage \$78,311 20.0% \$98,481 8 Establishments 155 49.8% 5,973 3.6 Employment 5,600 39.4% 344,839 1: Location Quotient 1.15 n/a Average Annual Wage \$67,600 5.8% \$126,153 1: Establishments 835 29.4% 46,503 3.6 Research, Testing, and Medical Location Quotient 0.43 n/a Average Annual Wage \$89,888 28.8% \$147,396 2: Establishments 1,918 23.5% 127,389 2: Total Bioscience Industry Location Quotient 0.64 n/a Average Annual Wage \$83,546 16.6% \$125,750 1.6		Employment	3,972	1.8%	398,847	5.5%
Establishments 155 49.8% 5,973 35	and Equipment	Location Quotient	0.70		n/a	
Employment 5,600 39.4% 344,839 15 Location Quotient 1.15 n/a Average Annual Wage \$67,600 5.8% \$126,153 10 Research, Testing, and Medical Laboratories Employment 4,402 36.0% 719,856 15 Average Annual Wage \$89,888 28.8% \$147,396 25 Total Bioscience Industry Employment 19,418 21.5% 2,135,704 15 Average Annual Wage \$83,546 16.6% \$125,750 16		Average Annual Wage	\$78,311	20.0%	\$98,481	8.7%
Pharmaceuticals Location Quotient 1.15 n/a Average Annual Wage \$67,600 5.8% \$126,153 10 Research, Testing, and Medical Laboratories Employment 4,402 36.0% 719,856 15 Average Annual Wage \$89,888 28.8% \$147,396 25 Total Bioscience Industry Employment 19,418 21.5% 2,135,704 15 Average Annual Wage \$83,546 16.6% \$125,750 16	Pharmaceuticals	Establishments	155	49.8%	5,973	34.7%
Location Quotient 1.15 n/a Average Annual Wage \$67,600 5.8% \$126,153 10 Research, Testing, and Medical Laboratories Employment 4,402 36.0% 719,856 10 Average Annual Wage \$89,888 28.8% \$147,396 25 Total Bioscience Industry Employment 19,418 21.5% 2,135,704 15 Average Annual Wage \$83,546 16.6% \$125,750 16		Employment	5,600	39.4%	344,839	11.9%
Establishments 835 29.4% 46,503 34		Location Quotient	1.15		n/a	
Research, Testing, and Medical Laboratories Employment 4,402 36.0% 719,856 19 Average Annual Wage \$89,888 28.8% \$147,396 25 Total Bioscience Industry Employment 19,418 21.5% 2,135,704 15 Average Annual Wage \$83,546 16.6% \$125,750 16		Average Annual Wage	\$67,600	5.8%	\$126,153	10.3%
Testing, and Medical Laboratories Location Quotient 4,402 36.0% 719,856 19 Laboratories Location Quotient 0.43 n/a 19 Average Annual Wage \$89,888 28.8% \$147,396 25 Total Bioscience Industry Employment 19,418 21.5% 2,135,704 15 Location Quotient 0.64 n/a n/a 10 Average Annual Wage \$83,546 16.6% \$125,750 16	Testing, and Medical	Establishments	835	29.4%	46,503	34.5%
Laboratories Location Quotient 0.43 11/4 Average Annual Wage \$89,888 28.8% \$147,396 22 Establishments 1,918 23.5% 127,389 22 Total Bioscience Industry Employment 19,418 21.5% 2,135,704 13 Location Quotient 0.64 n/a Average Annual Wage \$83,546 16.6% \$125,750 16		Employment	4,402	36.0%	719,856	19.3%
Average Annual Wage \$89,888 28.8% \$147,396 25 Establishments 1,918 23.5% 127,389 25 Total Bioscience Industry		Location Quotient	0.43		n/a	
Total Bioscience Industry		Average Annual Wage	\$89,888	28.8%	\$147,396	22.0%
Industry Location Quotient Average Annual Wage \$83,546 16.6% \$125,750 16		Establishments	1,918	23.5%	127,389	22.3%
Average Annual Wage \$83,546 16.6% \$125,750 10		Employment	19,418	21.5%	2,135,704	11.0%
		Location Quotient	0.64		n/a	
Establishments 148,131 15.4% 10,665,643		Average Annual Wage	\$83,546	16.6%	\$125,750	16.4%
	Total Private Sector	Establishments	148,131	15.4%	10,665,643	9.3%
Total Private Employment 1,746,893 0.2% 123,376,557 -:		Employment	1,746,893	0.2%	123,376,557	-1.5%
Sector Location Quotient 1.00 n/a		Location Quotient	1.00		n/a	
Average Annual Wage \$51,850 17.7% \$67,826 18		Average Annual Wage	\$51,850	17.7%	\$67,826	18.9%

Note: U.S. employment metrics include Puerto Rico.

Bioscience Research in South Carolina

Bioscience Academic R&D Expenditures

\$ Millions, FY 2020



NIH Awards

\$ Millions, FY 2018-2021



Bioscience Venture Capital in South Carolina

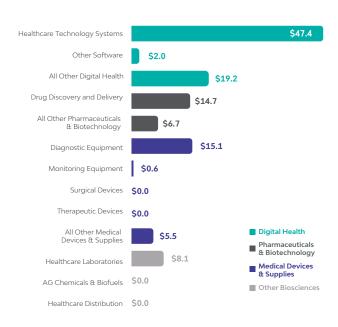
Bioscience-Related Venture Capital Investments

\$ Millions, 2018-2021



Bioscience-Related Venture Capital Investments by Segment

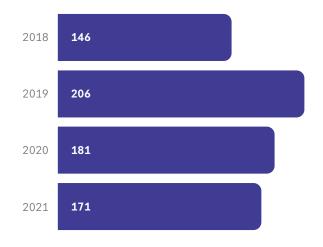
\$ Millions, 2018-2021



Bioscience Patents in South Carolina

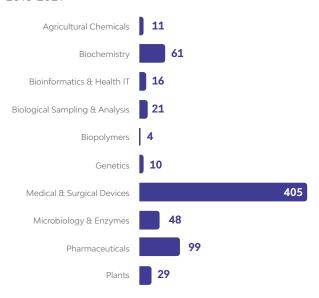
Bioscience-Related U.S. Patents

2018-2021



Bioscience-Related U.S. Patents by Segment

2018-2021



Source Notes

Employment, Establishments and Wages: U.S. Bureau of Labor Statistics, Quarterly Census of Employment and Wages (QCEW), enhanced by Lightcast (Datarun 2022.3).

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).

Venture Capital: PitchBook Data, Inc.

Patents: U.S. Patent & Trademark Office data from Clarivate Analytics' Derwent Innovation patent analysis database.

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



