Evolving Workforces

# **U.S. Life Sciences Research Talent** 2023

REPORT

Accessing Top Talent Amid the Growing Life Sciences Revolution

CBRE RESEARCH JUNE 2023





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01 Executive Summary



### The number of U.S. life sciences research professionals grew by 3.1% last year to a record 545,000,

compared with a 2.2% increase for all U.S. occupations.



### The labor market for life sciences research talent remains extremely tight.

Although a slowing economy could change this dynamic, the number of U.S. life sciences researchers has not declined in more than 20 years through three recessions.



U.S. life sciences researchers tend to be younger, slightly more diverse and have higher salaries and wage growth than the overall U.S. workforce.

The average salary for U.S. life sciences researchers increased by 14.5% between 2018 and 2021, compared with 10.2% for all private industry employees. This trend will likely persist through 2023.



The number of college graduates earning biological and biomedical sciences degrees increased by 4.8% year-over-year in 2021 to 171,520.

Certain metros are producing high numbers of graduates in specialized life sciences fields, such as Washington, D.C./Baltimore for biotechnology and Sacramento for genetics.



### CBRE has identified the top 25 U.S. markets for life sciences research talent in 2023.

The top three markets remain Boston/ Cambridge, the San Francisco Bay Area and Washington, D.C./Baltimore.

Philadelphia, Denver/Boulder, Miami/Fort Lauderdale and Sacramento showed the most improvement in the top 25 rankings from the previous year.

The top three markets for life sciences research talent are Boston/Cambridge, the San Francisco Bay Area and Washington, D.C./Baltimore.



## 02 U.S. Life Sciences Research Talent Trends

There are more life sciences researchers in the United States than ever before, numbering roughly 545,000.

These researchers encompass such roles as biochemists, biological scientists, chemists and skilled laboratory support staff. They form the core of the industry's rapid growth, underpinning new innovation and discoveries.

Between 2002 and 2022, the number of U.S. life sciences researchers grew 87%, compared with only 14% for all U.S. occupations (Figure 1).

## U.S. life sciences researchers have four main areas of expertise:

Chemistry Chemists

02

**Biology** Biological scientists, biophysicists, bioengineers, etc.

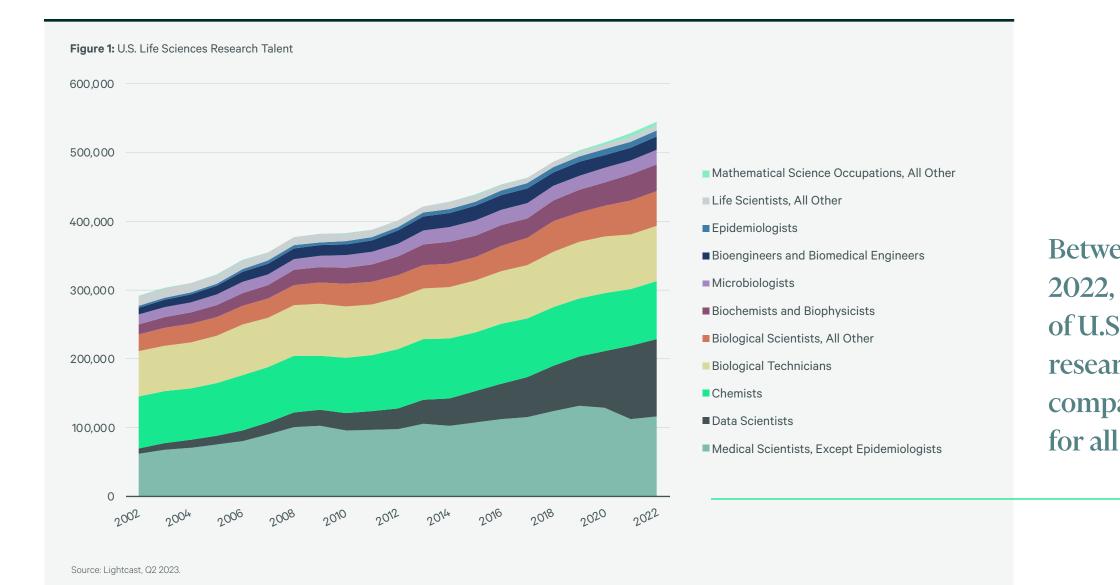
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Medical and health care Medical scientists, epidemiologists

04

Digital and analytics Data scientists, etc.





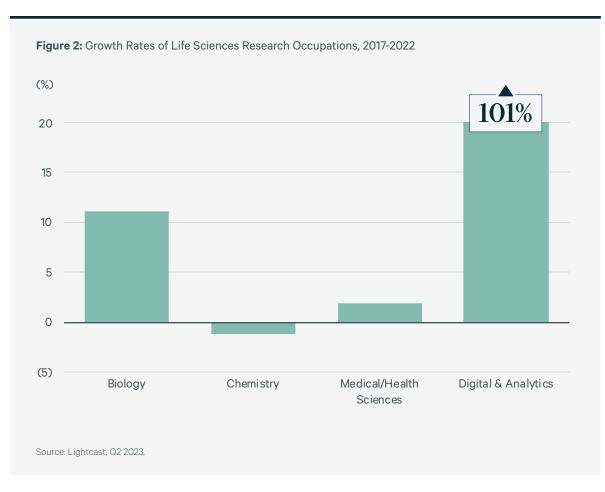
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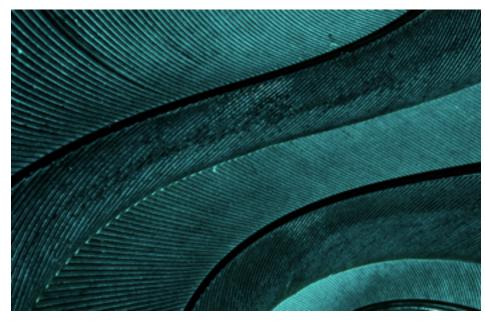
Between 2002 and 2022, the number of U.S. life sciences researchers grew 87%, compared with only 14% for all U.S. occupations.

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There continues to be an occupational shift from chemistry to biology, reflecting larger industry trends. The number of biology-based researchers increased by 11.1% over the past five years, while the number of chemists fell by 1.2%. Meanwhile, the number of digital and analytics workers, including those not employed in the life sciences industry, more than doubled due to innovations in artificial intelligence and machine learning (Figure 2).

As the life sciences industry continues to expand, the labor market for life sciences researchers remains historically tight. Unemployment rates for select life sciences researchers are well below the broader economy's unemployment rate. As a result, labor market weakness in an economic downturn may not impact life sciences researchers as much as more cyclical sectors (Figure 3).





## 11.1%

increase over the past five years in biologicsbased occupations.

## 101%

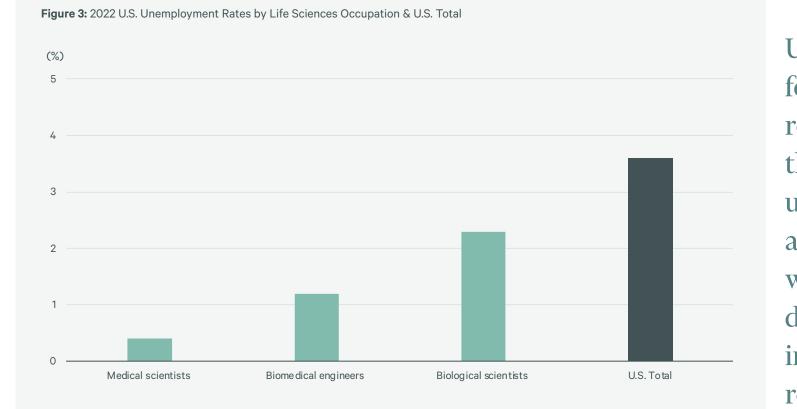
increase over the past five years in digital & analytics occupations.

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The digital & analytics area of expertise has grown due to industry innovation in artificial intelligence and machine learning.



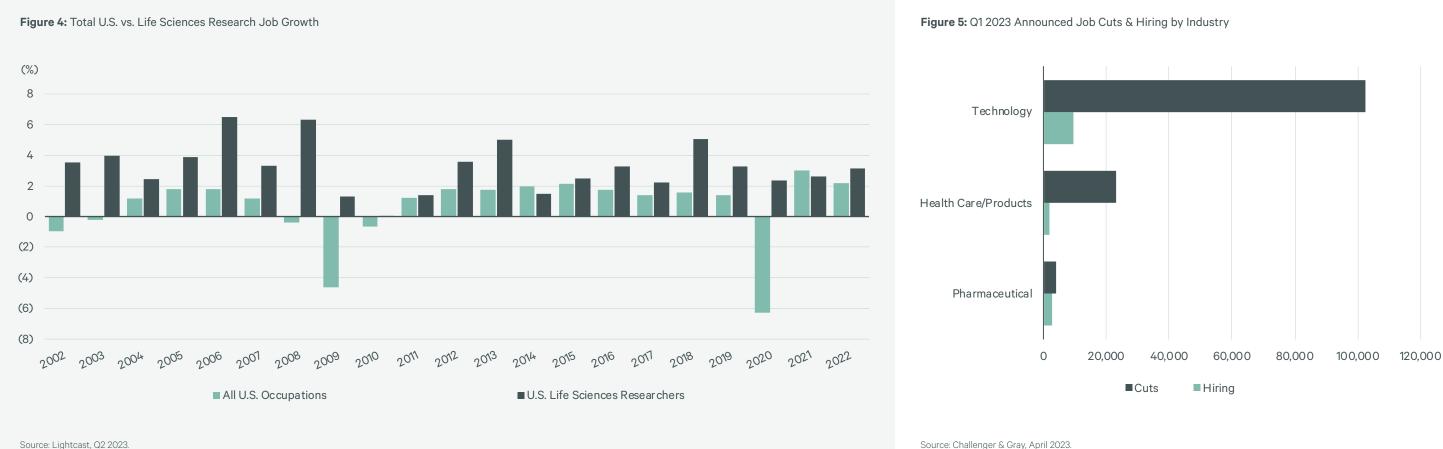




Source: U.S. Bureau of Labor Statistics, CBRE Research, February 2023.

Unemployment rates for select life sciences researchers are well below the broader economy's unemployment rate. As unemployment rate. As a result, labor market weakness in an economic downturn may not impact life sciences researchers as much as more cyclical sectors. The number of life sciences research jobs has not fallen in the past 20 years, displaying unusual resilience even for an industry that is particularly stable in economic downturns (Figure 4).

Some segments of the labor market are softening. However, the pharmaceutical industry is demonstrating more job stability than the technology or health care/ products industries. While there are more announced cuts than hirings in each of these three industries, the pharmaceutical industry maintains by far the most closely balanced ratio of hiring to cuts. This may indicate greater stability in the life sciences labor market in 2023 than in other sectors (Figure 5).



Announced hiring plans in the pharmaceutical industry have been more resilient than in the technology and health care/ products industries, comparing Q1 2023 data to one year ago (Figure 6).

The life sciences industry requires a strong pool of new university graduates to meet its growing need for talent. The U.S. had a record-high 171,520 biological and biomedical sciences degrees and certifications conferred in 2021. This represents a 4.8% year-over-year increase that has continued at an accelerated pace each year since 2017 (Figure 7).

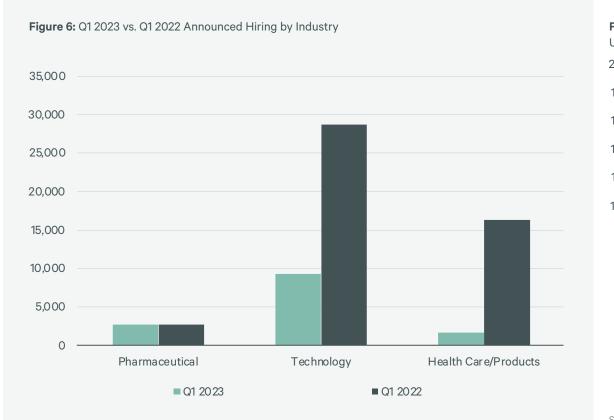
Biological and biomedical science degrees and certifications increased by 12.6% since 2018. This greatly exceeds the 4.6% growth in all U.S. degrees and certifications over the same period (Figure 8).

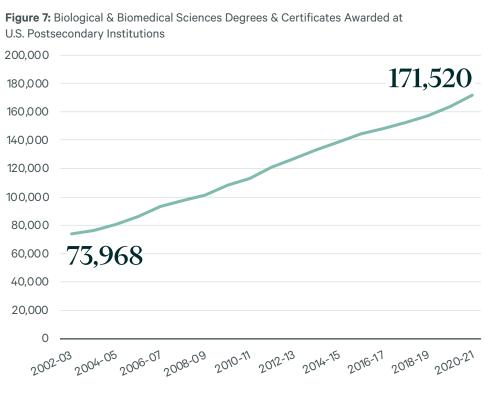


year-over-year change in degrees & certifications issued in biological/ biomedical sciences.



change in biological and biomedical science degrees & certifications since 2018



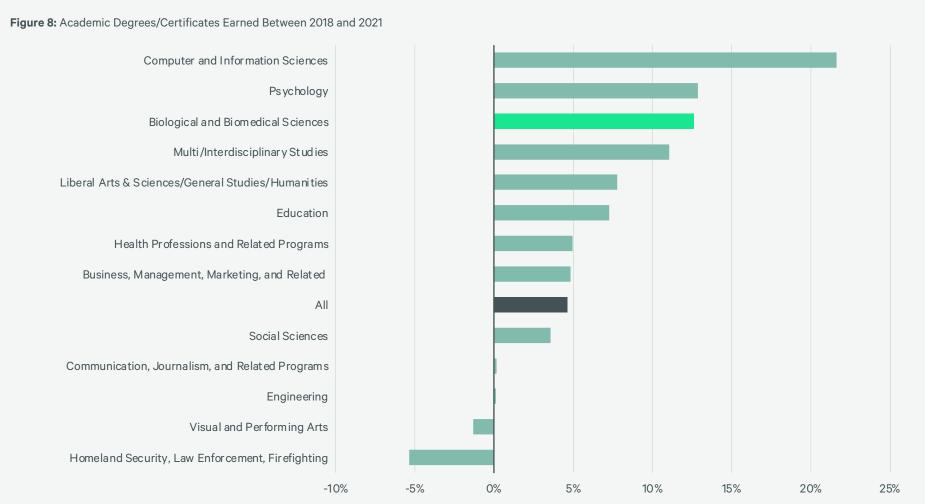


Source: Challenger & Gray, April 2023.

System, CBRE Research, Q2 2023.

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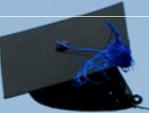
Source: U.S. Dept. of Education, National Center for Education Statistics, Integrated Postsecondary Education Data



Source: U.S. Dept. of Education, National Center for Education Statistics, Integrated Postsecondary Education Data System, CBRE Research, Q2 2023. Note: Only select disciplines shown with at least 100,000 degrees and certificates issued.



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Biological and biomedical science degrees and certifications increased by 12.6% since 2018. This greatly exceeds the 4.6% growth in all U.S. degrees and certifications over the same period.

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## o3 Geography of Existing U.S. Life Sciences Research Talent

The largest pools of existing U.S. life sciences research talent are still in the Northeast Corridor (Boston/Cambridge to Washington, D.C./ Baltimore), as well as in California.

Some of the fastest growing markets for life sciences research talent include major population centers, such as Atlanta, Dallas/Fort Worth, Phoenix and Miami/Fort Lauderdale. Some smaller markets, such as Salt Lake City, Kansas City and Richmond, are showing impressive growth rates.

Most life sciences researchers are in the nation's most populous metro, New York/New Jersey. However, the next three regions (Boston/Cambridge, the San Francisco Bay Area and Washington, D.C./Baltimore) each have less than half of New York/New Jersey's population but have a comparable number of life sciences researchers. The significantly higher amount of life sciences researchers per capita demonstrates the intensity of life sciences research activity in these metros.

Philadelphia, a generally slower-growth metro, has the fifth most life sciences researchers and continues to achieve above-average rates of growth.



## Most life sciences researchers are in the nation's most populous metropolitan regions.

While San Diego has the seventh largest pool of life sciences researchers, it ranks even higher on a per-capita basis given its relatively smaller population.

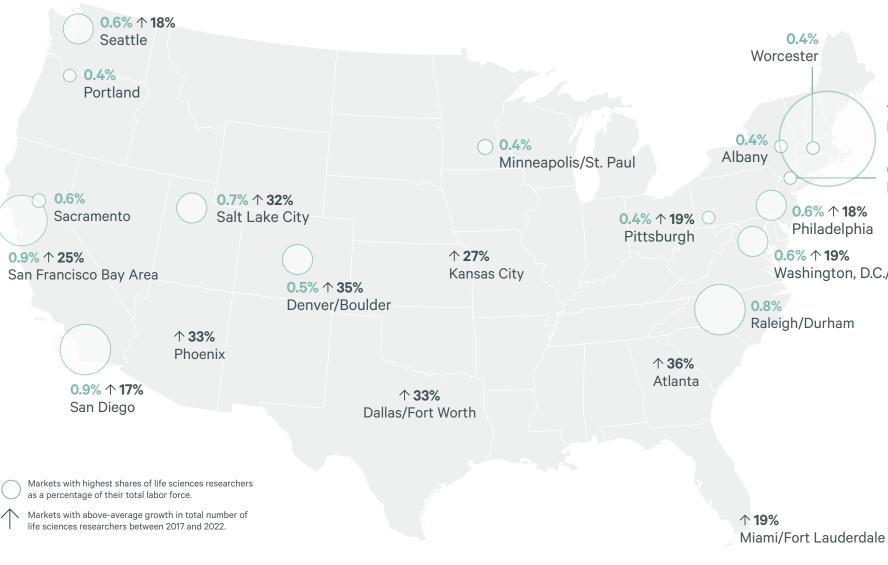


### Figure 9: Most Concentrated Life Sciences Research Clusters (% of Labor Force) & Select High-Growth Markets

Figure 9 illustrates select U.S. markets' concentration of life sciences researchers (researchers per capita) and growth in the number of researchers in the past five years.

In terms of concentration of life sciences research talent, Boston/Cambridge leads all U.S. markets with 1.3% of its labor force employed in this sector. The next tier of markets with high concentrations includes the San Francisco Bay Area, San Diego and Raleigh/Durham, all having between 0.8% and 0.9% of their labor force employed as life sciences researchers. Philadelphia, Washington, D.C./ Baltimore, Seattle and Denver/Boulder also have high concentrations of life sciences talent, as do smaller markets like Salt Lake City, Sacramento and Pittsburgh.

In terms of five-year life sciences researcher growth, most markets with the highest concentrations of researchers also exhibited among the highest growth of researchers. Various emerging life sciences research hubs highlighted in Figure 9 also have some of the nation's highest growth of life sciences researchers. These markets range from large metropolitan areas, such as Dallas/Fort Worth, Atlanta and Miami/Fort Lauderdale, to smaller metros, such as Kansas City and Salt Lake City. Each metro contains a leading research institution.



Source: Lightcast CBRE Research, Q2 2023.

**1.3%**  $\uparrow$  **20%** Boston/Cambridge

**0.4% 126%** New York/New Jersey

Washington, D.C./Baltimore

## 04 Sources of Emerging U.S. Life Sciences Research Talent

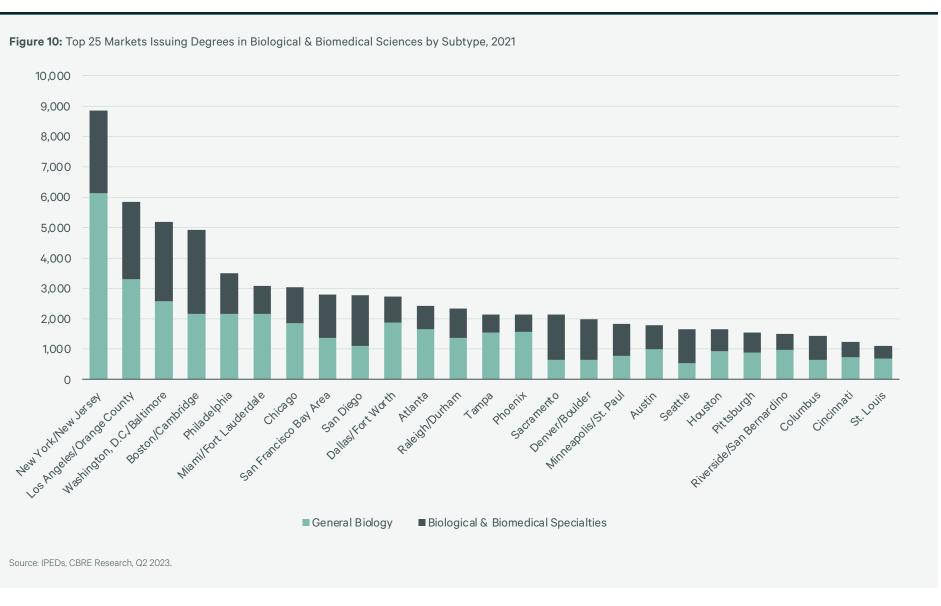
### Identifying sources of emerging talent is critical to fueling a growth industry like life sciences.

Figure 10 shows where the most graduates in biological and biomedical sciences are originating, including a breakdown of those with general biology degrees and those with more specialized training, such as genetics, biotechnology and computational biology.

New York/New Jersey produced the most biological and biomedical sciences graduates in 2021 (8,800), followed by Los Angeles/Orange County (5,900), Washington, D.C./Baltimore (5,200) and Boston/ Cambridge (4,900). All four leading markets are coastal life sciences hubs with world-renowned research universities.

Miami/Fort Lauderdale and Tampa experienced significant five-year growth in biological and biomedical sciences graduates in 2021. However, the metro with the fastest growth rate of new life sciences graduates was Phoenix, followed by Riverside/San Bernardino and Houston (Figure 11).

### Figure 10: Top 25 Markets Issuing Degrees in Biological & Biomedical Sciences by Subtype, 2021



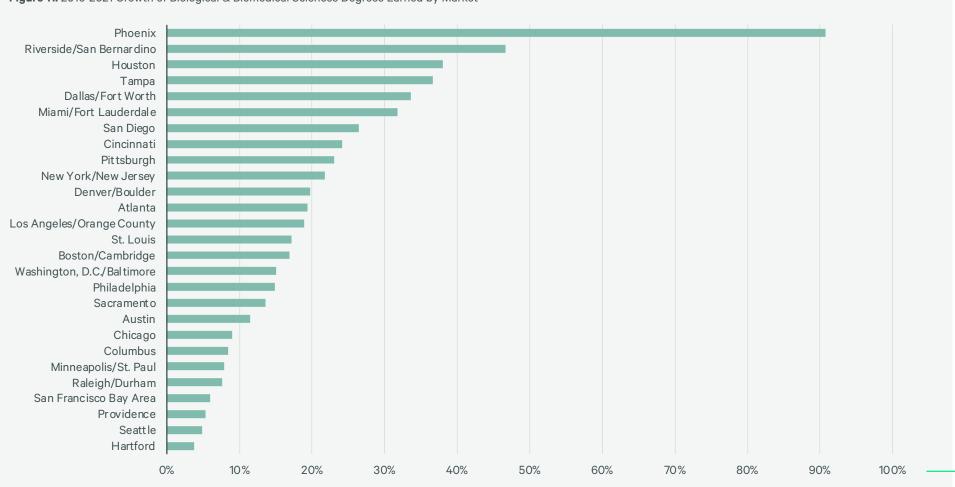


Figure 11: 2016-2021 Growth of Biological & Biomedical Sciences Degrees Earned by Market

Source: IPEDs, CBRE Research, Q2 2023..

Miami/Fort Lauderdale and Tampa experienced significant five-year growth in biological and biomedical sciences graduates in 2021. However, the metro with the fastest growth rate of new life sciences graduates is Phoenix, followed by Riverside/San Bernardino and Houston. Figure 12: Top 5 Markets for Number of Specialized Biological & Biomedical Sciences Graduates, 2021

Certain markets tend to produce more graduates with specialized biological and biomedical degrees. For example, Washington, D.C./Baltimore has an outsized number of graduates specializing in biotechnology, the San Francisco Bay Area in cell/cellular biology and anatomical sciences and Los Angeles/ Orange County in microbiological sciences and immunology. Among smaller markets, Sacramento has a focus primarily on genetics and, to a lesser extent, microbiological sciences and immunology (Figure 12).

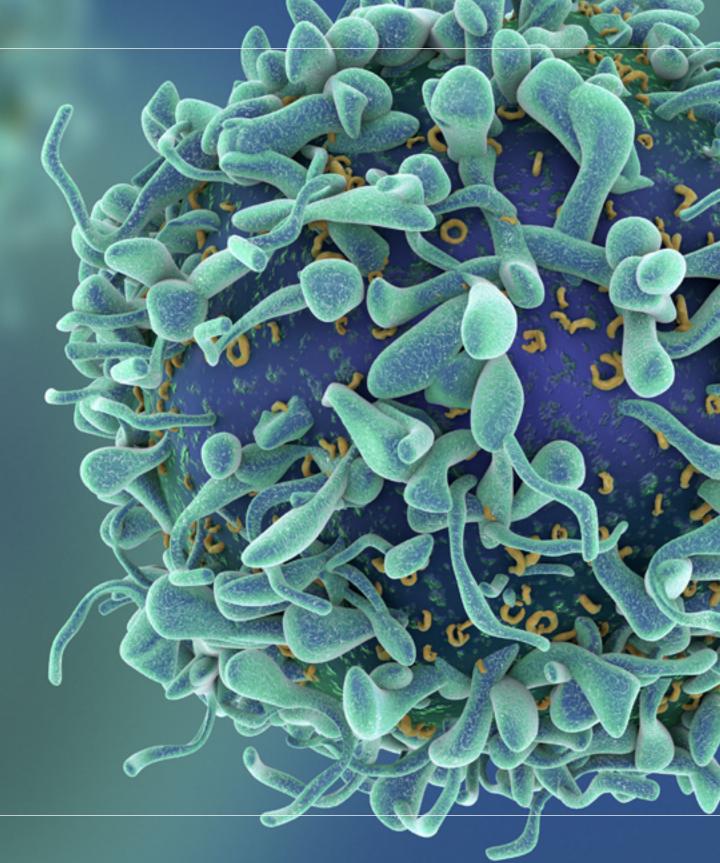
Biochemistry, Biophysics & Mo	lecular Biology
Los Angeles/Orange County	735
New York/New Jersey	594
Boston/Cambridge	533
Washington, D.C./Baltimore	480
San Diego	423

Biomathematics, Bioinformatics & Computa	tional Biology	Biotechnology	
New York/New Jersey	296	Washington, D.C./Baltimore	582
Boston/Cambridge	259	Boston/Cambridge	207
Los Angeles/Orange County	154	New York/New Jersey	142
Washington, D.C./Baltimore	149	Los Angeles/Orange County	118
Raleigh/Durham	145	Houston	93

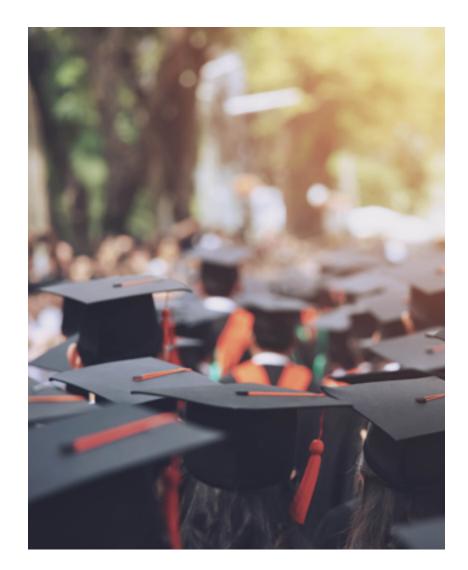
Cell/Cellular Biology & Anatomical	Sciences
San Francisco Bay Area	877
San Diego	530
Los Angeles/Orange County	334
New York/New Jersey	254
Seattle	227

Microbiological Sciences & Immuno	logy	Genetics	
Los Angeles/Orange County	256	New York/New Jersey	110
Washington, D.C./Baltimore	92	Sacramento	110
Seattle	88	Raleigh/Durham	78
Sacramento	85	Columbus	68
San Diego	83	Washington, D.C./Baltimore	43

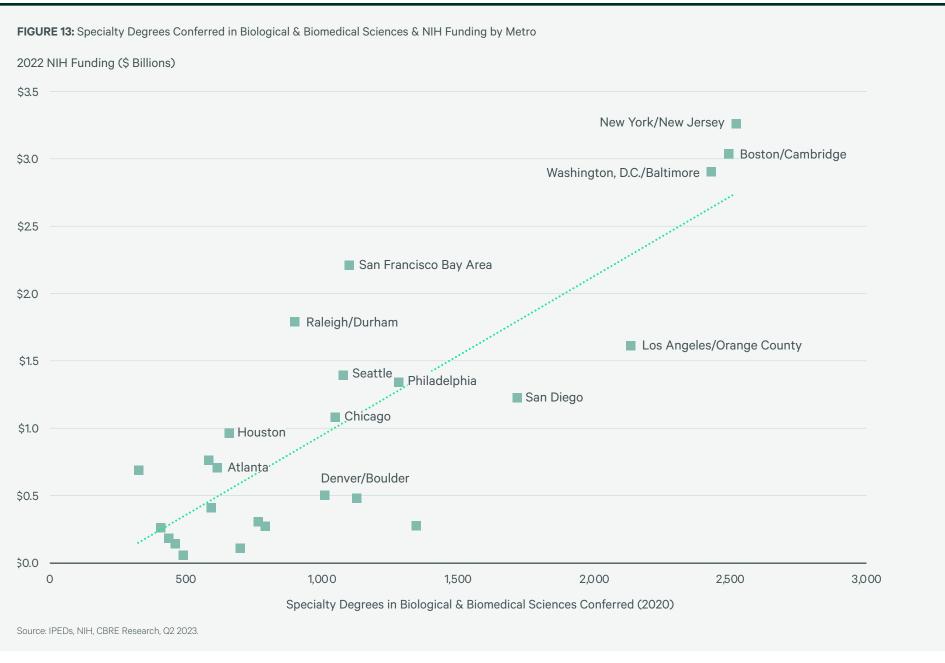
Washington, D.C./Baltimore has an outsized number of graduates specializing in biotechnology, the San Francisco Bay Area in cell/ cellular biology and anatomical sciences and Los Angeles/ Orange County in microbiological sciences and immunology.



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Markets that produce the largest numbers of specialized biological and biomedical sciences research talent generally receive the most National Institutes of Health funding. This funding enhances a market's life sciences research ecosystem and perpetuates its cycle of talent development (Figure 13).



# o5 Life Sciences Research Talent Salary Trends

Salaries for life sciences researchers remain well above most professions' average and are growing faster.

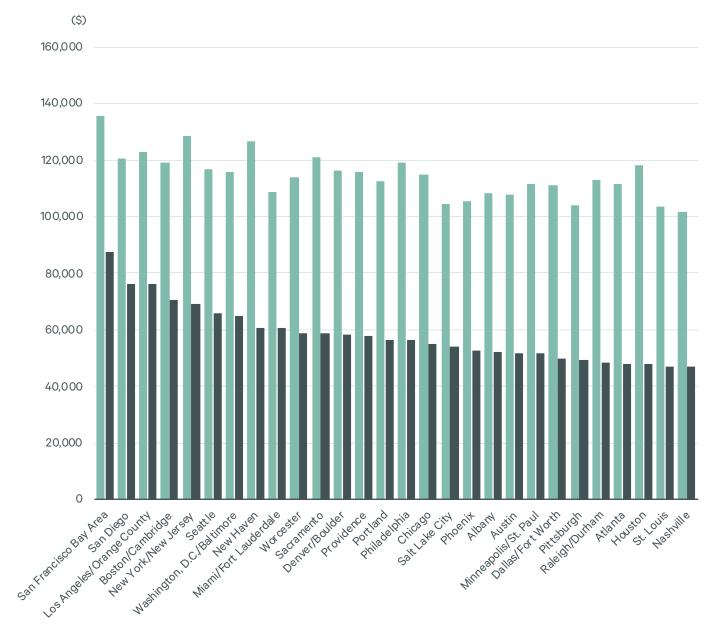
Average salaries in most major U.S. markets for biochemists, biomedical engineers, biophysicists and chemists do not strongly fluctuate, regardless of cost of living differences (Figure 14). It is notable that average salaries exceed the average cost of living by a much wider margin in Southern and Midwestern markets than in major coastal markets (Figure 15). For example, the salary of a biochemist in St. Louis may be more than one might expect considering the lower cost of living.



Figure 14: 2021 Average Annual Salaries for Select Life Sciences Research Occupations (\$)

Market (sorted by cost of living)	Biochemists	<b>Biomedical Engineers</b>	Chemists	Biophysicists	Cost Of Living
San Francisco Bay Area	135,435	117,636	135,133	106,660	87,673
San Diego	120,633	105,097	120,363	92,418	76,257
Los Angeles / Orange County	122,918	108,854	122,633	95,377	76,086
Boston / Cambridge	119,034	105,462	118,773	94,228	70,334
New York / New Jersey	128,274	107,532	127,978	98,669	69,246
Seattle	116,589	108,717	116,332	91,968	66,016
Washington, D.C. / Baltimore	115,702	108,705	115,446	100,601	64,765
New Haven	126,586	100,536	126,318	96,683	60,681
Miami/Fort Lauderdale	108,772	94,026	108,514	82,902	60,458
Worcester	113,728	96,957	113,476	88,882	58,768
Sacramento	120,757	107,025	120,491	94,612	58,566
Denver/Boulder	116,202	102,188	115,943	92,518	58,150
Providence	115,665	100,139	115,408	90,591	57,964
Portland	112,599	97,041	112,348	86,886	56,538
Philadelphia	119,102	102,716	118,834	93,263	56,355
Chicago	115,009	98,961	114,758	88,931	55,118
Salt Lake City	104,302	91,283	104,058	81,081	53,804
Phoenix	105,602	93,874	105,359	80,740	52,545
Albany	107,998	99,644	107,766	84,190	52,020
Austin	107,868	100,800	107,610	84,101	51,821
Minneapolis / St. Paul	111,717	100,773	111,469	88,268	51,497
Dallas / Fort Worth	111,043	102,218	110,781	88,397	49,792
Pittsburgh	104,086	92,687	103,846	82,264	49,275
Raleigh / Durham	112,714	98,238	112,447	86,702	48,515
Atlanta	111,328	94,405	111,056	86,113	48,030
Houston	118,018	108,113	117,736	97,887	47,794
St. Louis	103,396	96,007	103,166	82,650	47,137
Nashville	101,579	88,766	101,345	77,465	46,894

Figure 15: 2021 Average Annual Salaries for Biochemists & Local Cost of Living



Avg Biochemist Salary

Source: Lightcast, CBRE Research, Q2 2023.

Source: Lightcast, CBRE Research, Q2 2023.

■ Cost of Living

The U.S. life sciences labor market is tight, with inflation influencing continued salary and wage growth. The U.S. Employment Cost Index (ECI) for private industry workers reflects rising wage pressures over the past several years, but particularly rapid growth in 2020 and 2021 (Figure 16). It also shows that the annual change in median life sciences researcher salaries in the nation's top clusters is more volatile but higher than that of other private industry workers. While the life sciences salary dataset lags the national ECI by a year, the two generally trend similarly.

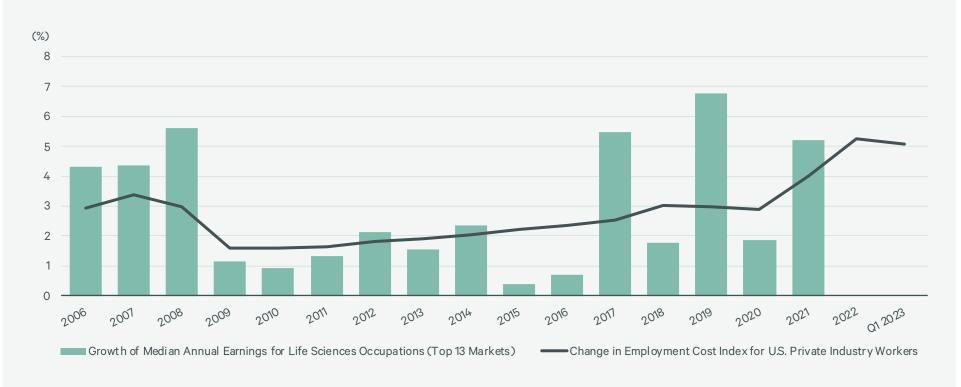


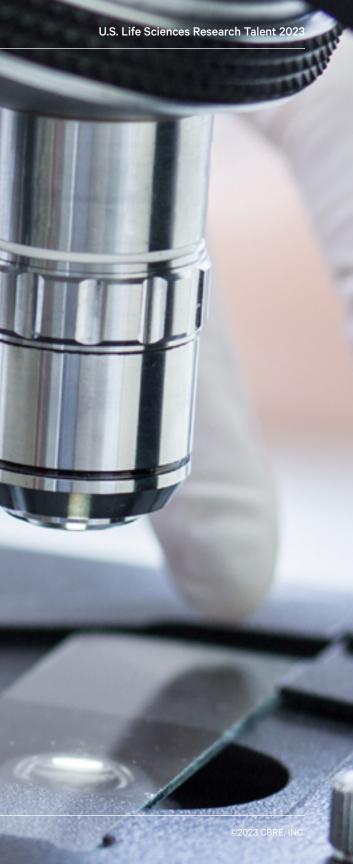
Figure 16: Growth of Life Sciences Researcher Earnings vs. Employment Costs for All Private Industry Workers



Source: Lighcast, CBRE Research, Q2 2023.

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The U.S. Employment Cost Index for private industry workers shows the annual change in median life sciences researcher salaries in the nation's top clusters is more volatile but higher than other private industry workers.



## 06 Demographic Profile of U.S. Life Sciences Research Talent

Millennials (born between 1981 and 1996) comprise the largest cohort of life sciences researchers (Figure 17).

Fifty-eight percent of life sciences researchers are between 25 and 44 years old, compared with 50% for all professional occupations and 44% for the total US workforce.

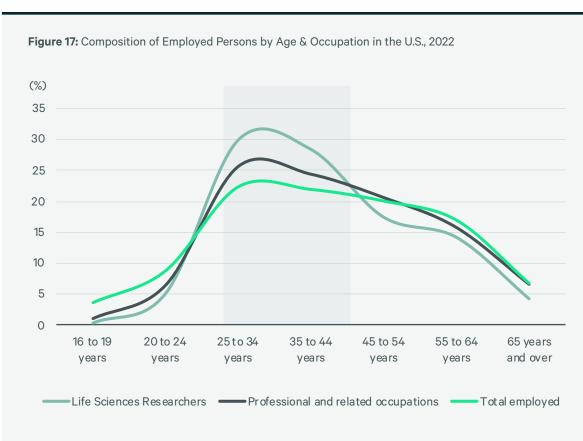


millennials.

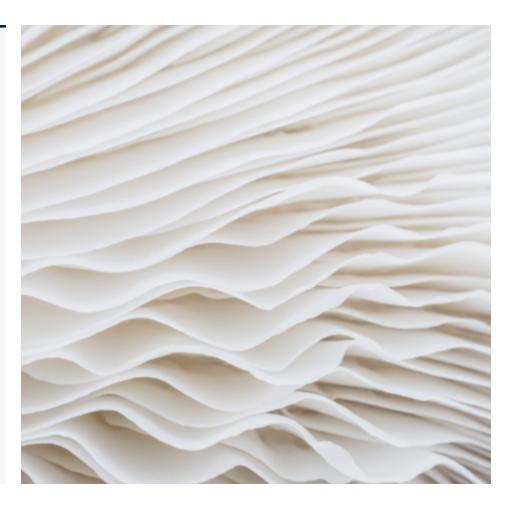
of U.S. life sciences researchers are

44% of the total U.S. workforce

are millennials.



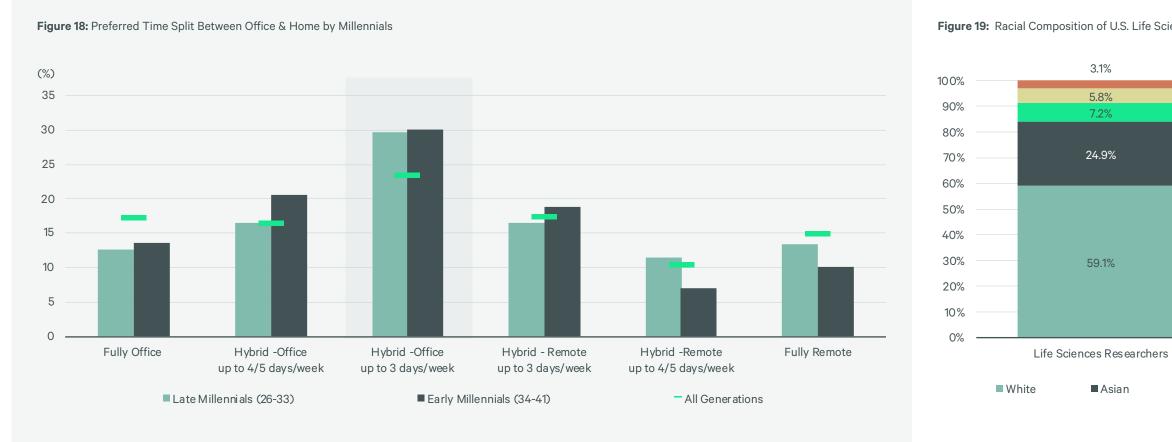
Source: U.S. Bureau of Labor Statistics, Q2 2023.



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Millennials strongly prefer hybrid work with up to three days in the office (Figure 18). This data may aid life sciences occupiers' projections of office space needs, but may be less relevant for employees who spend most of their in-person time in labs.

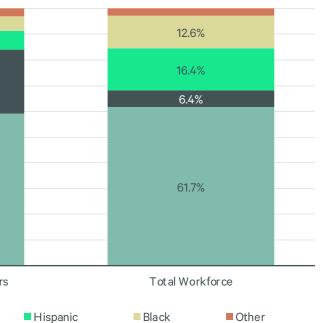
U.S. life sciences researchers tend to be slightly more racially diverse than the overall U.S. workforce, with a much higher Asian population. However, there is significant underrepresentation of Hispanic and Black populations (Figure 19). This data shows further progress is needed for more racial diversity in life sciences laboratories.





Source: Lightcast, 2022.

Figure 19: Racial Composition of U.S. Life Sciences Researchers vs. Total U.S. Workforce



2.8%

U.S. life sciences researchers tend to be slightly more racially diverse than the overall U.S. workforce, with a much higher Asian population.



# 07 Top 25 U.S. Metros for Life Sciences Research Talent



### CBRE Research ranked the top U.S. markets for life sciences research talent in 2023.

This was based on a comprehensive analysis of data, including the total number and per-capita concentration of researchers and annual college graduates with life sciences-related degrees in each market. The top five markets remain in the Northeast Corridor and California. Compared with last year's Life Sciences Research Talent 2022 report, Philadelphia and Denver/Boulder showed notable improvement, as did Miami/Fort Lauderdale and Atlanta. Smaller hubs, such as Sacramento, Austin, Albany and Pittsburgh, also had strong growth in the number and density of life sciences researchers and graduates with life sciences expertise.

Boston/Cambridge has a high number of life sciences researchers and graduates with life sciences expertise, but its top ranking is largely attributable to its concentration of talent. It has the highest number of bioengineers and biomedical engineers, biochemists and biophysicists, microbiologists, medical scientists and biological technicians. It has the nation's highest concentration of biochemists and biophysicists, microbiologists and medical scientists.

### FIGURE 20: Top 25 U.S. Metros for Life Sciences Research Talent

Rank	Market	Score	Rank	Market	Score
1	Boston/Cambridge	139.6	13	Houston	103.5
2	San Francisco Bay Area	132.1	14	Atlanta	103.3
3	Washington, D.C./Baltimore	129.0	15	Sacramento	102.3
4	New York/New Jersey	126.8	16	Austin	101.8
5	San Diego	118.8	17	Worcester	101.7
6	Philadelphia	114.5	18	Salt Lake City	101.7
7	Raleigh/Durham	114.1	19	Dallas/Fort Worth	101.0
8	Los Angeles/Orange County	112.3	20	Miami/Fort Lauderdale	100.6
9	Seattle	109.8	21	Albany	100.3
10	Denver/Boulder	108.9	22	Portland	100.2
11	Minneapolis/St. Paul	106.7	23	Pittsburgh	100.1
12	Chicago	106.4	24	New Haven	99.6
Source: CB	RE Research, Q2 2023		25	Nashville	98.5

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n Francisco Bay Area, Washington, D.C./Baltimore and rk/New Jersey also have very large talent pools, along with ent density. They host the largest number of data scientists, cal and life scientists and chemists. Also, because of their restigious research universities, they earned the highest for educational talent based on certain criteria.<sup>1</sup>

go and Raleigh/Durham, two relatively small markets in terms of pulation, offer compelling opportunities to access life sciences h talent. They have sizable talent pools and very significant s of researchers, underpinning thriving life sciences ecosystems.







## 08 Emerging Hubs Showing Promising Activity

CBRE has identified key emerging life sciences talent clusters, such as Phoenix, Cincinnati, Tampa and Richmond.

They demonstrated attractive NIH funding levels within regional research institutions.



### FIGURE 21: Emerging Hubs Showing Promising Activity

### Cincinnati

### \$262M NIH Funding (2022)

- Cincinnati Children's Hospital: largest NIH recipient
- 2,620 Life Sciences Researchers (#23 in US)
- #24 in U.S. markets with graduates with Biological and Biomedical Sciences degrees. (8th fastest growth rate 2016-2021)

### Indianapolis

### \$240M NIH Funding (2022)

- Indiana Univ/Purdue Univ at Indianapolis: largest NIH recipient
- 2.930 Life Sciences Researchers
- Above average concentrations of Bioengineers and Biomedical Engineers, Epidemiologists, Chemists, Data Scientists

### Kansas City

### \$81M NIH Funding (2022)

- University of Kansas Medical Center: largest NIH recipient
- Above average concentrations of Chemists, Biological Scientists, Biological technicians, and Data Scientists as well as persons working in Professional. Scientific. and Tech Services

### Phoenix

### \$143M NIH Funding (2022)

- Arizona State University: largest NIH recipient (4,130 Life Sci Researchers)
- Above average concentrations of Bioengineers, Biomedical Engineers and Data Scientists.
- Above-average number of graduates in Biological and Biomedical Sciences (2,138 in 2021)

### Albuquerque

### \$100M NIH Funding (2022)

- University of New Mexico: largest NIH recipient
- Above average concentrations of Microbiologists and Biological Scientists as well as those with Doctorates and persons working in Professional, Scientific, and Technical Services

Source: U.S. Bureau of Labor Statistics, National Institutes of Health (NIH), CBRE Research.

### Knoxville

### \$11M NIH Funding (2022)

- University of Tennessee: largest NIH recipient
- 1,530 Life Sciences Researchers (#42 in US; #64 largest US metro)
- Above average concentrations of Biochemists and biophysicists
- Microbiologists and Biological Technicians

### Columbus

### \$306M NIH Funding (2022)

- 2,620 Life Sciences Researchers

### Richmond

### Tampa

- \$179M NIH Funding (2022)
- 2.650 Life Sciences Researchers

- #23 in US markets with graduates with Biological and Biomedical Sciences degree - Above average concentrations of Epidemiologists, Chemists, Data Scientists

### \$107M NIH Funding (2022)

- Virginia Commonwealth University: largest NIH recipient - 2,170 Life Sciences Researchers (#34 in US) Above average concentrations of Epidemiologists, Data Scientists, Bioengineers and Biomedical Engineers, Biochemists and biophysicists

- University of South Florida: largest NIH recipient - #13 in US markets with graduates with Biological and Biomedical Sciences degrees. (4th fastest growth rate 2016-2021)

## 09 Methodology & Approach

CBRE's analysis encompassed the largest 74 U.S. life sciences labor markets (generally metros with 750,000+ populations) and evaluated each on various occupational and educational data. We then standardized the data to see how far each metro deviated from the group's average. The standardized scores for each variable were then summed for each metro, for a final score.

The scoring methodology evaluates markets on a combination of talent volume (total number of researchers and graduates with life sciences expertise) and the density of talent that thriving life sciences clusters contain (per capita researchers, graduates, people employed in professional, scientific, and technical services, among others).

We identified the most relevant occupations and new graduates fueling life sciences industry growth. We measured and evaluated the number and density of life sciences researchers and new graduates with life sciences expertise. Many of the relative scores were weighted according to how closely they correlated to data from Boston/Cambridge, San Francisco Bay Area and San Diego. As the premier life sciences hubs, these markets likely reflect the most ideal elements for success as a life sciences cluster.

This logic supported the inclusion of two other datapoints: the concentration of all Ph.D.s in a metro area and the concentration of professional, scientific and technical services industries employment. These two indicators strongly correlate to primary and secondary life sciences researcher markets. They are also generally reflective of success as professional, scientific and technical clusters.



The scoring methodology evaluates markets on a combination of talent volume and the density of talent that thriving life sciences clusters contain.

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## 10 Market Profiles

## Market Navigation

Click on any link to jump to the profile

## **Boston/Cambridge**

Source: CBRE Labor Analytics, CBRE Research.

### WAGES

	Average Wage
Biochemists	\$119,034
<b>Biomedical Engineers</b>	\$105,462
Biophysicists	\$118,773
Chemists	\$94,228

POPULATION & LABOR FORCE	
Labor Force (2022)	2,755,465
% of Laborers in Professional, Scientific & Tech Services	13.6%
% of Laborers in Health care Services	16.1%
5-Year Projected Population Growth	3.1%

3.6% Yearly Cost of Living 16.1% Median Household Income Value 3.1% Median Home Value Average Apartment Rent/1BR/MO

Source: CBRE Labor Analytics, CBRE EA Q4 2022.

COST OF LIVING

Costs of Living (2021)

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
Boston University	647	497	92	1,236
Harvard University	205	222	187	614
Tufts University	210	226	42	478
Northeastern University	411	35	13	459
University of New Hampshire	350	15	10	375

Source: IPEDS, CBRE Research

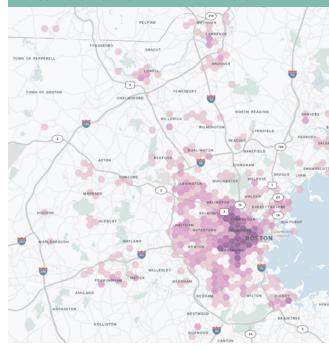
\$70,334

\$94,470

\$522,156

\$2,208

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

EMPLOYMENT	
	Employed (2022)
Total Life Sciences Occupations	36,450
Biochemists and biophysicists	7,640
Biological scientists, all other	840
Medical scientists, except epidemiologists	11,800
Bioengineers and Biomedical Engineers	1,500
Chemists	4,160
Microbiologists	2,480
Biological technicians	4,770
Epidemiologists	330
Life scientists, all other	460
Data Scientists & Math Science	2,470

TALENT PIPELINE Total Degrees % of Top 25 Markets Degree Completions (2021) **Biological and Biomedical Sciences** 5,475 6.3% Total Bachelor, Masters, Doctorate degrees 86,605 (all subjects) Degree Completions in the Biological and Biomedical Sciences Total Degrees % of Total Degrees Bachelor's Degree 3,740 68% Master's Degree 1270 23% 465 8% Doctorate

Source: IPEDS, CBRE Research

### SCORE 139.6



- Up to 10 10-25 25-50 50-100 100-150
- 150+

## **O2** San Francisco Bay Area

V	7	Δ		F	2	
		- 1	U		υ	

	Average Wage
Biochemists	\$135,435
Biomedical Engineers	\$117,636
Biophysicists	\$135,133
Chemists	\$106,660

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	3,657,380
% of Laborers in Professional, Scientific & Tech Services	18.1%
% of Laborers in Health care Services	12.6%
5-Year Projected Population Growth	
San Francisco	3.1%
San Jose	3.4%

Source: CBRE Labor Analytics, CBRE Research.

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	32,490
Biochemists and biophysicists	3,760
Biological scientists, all other	5,540
Medical scientists, except epidemiologists	6,000
Bioengineers and Biomedical Engineers	1,120
Chemists	2,970
Microbiologists	1,040
Biological technicians	3,050
Epidemiologists	160
Life scientists, all other	-
Data Scientists & Math Science	8,850

Source: CBRE Labor Analytics, CBRE Research.

Costs of Living (2021)	
Yearly Cost of Living	\$87,673
San Francisco	\$87,902
San Jose	\$87,138
Median Household Income Value	\$117,594
San Francisco	\$112,551
San Jose	\$129,355
Median Home Value	\$1,002,079
San Francisco	\$952,197
San Jose	\$1,118,403
Average Apartment Rent/1BR/MO	
San Francisco	\$2,837
San Jose	\$2,503

**COST OF LIVING** 

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	3,205	5.6%
Total Bachelor, Masters, Doctorate degrees (all subjects)	57,417	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,434	76%
Master's Degree	391	12%
Doctorate	380	12%

Source: CBRE Labor Analytics, CBRE Research.

### **TOP LIFE SCIENCES COLLEGES & UNIVERSITIES** School University of California - Berkeley San Francisco State University Stanford University

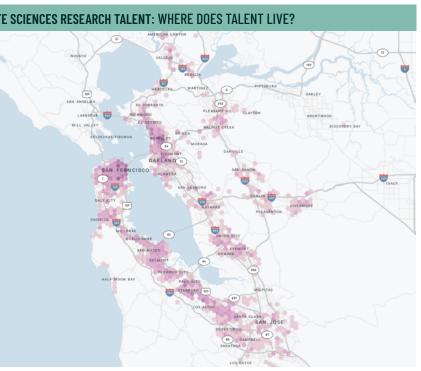
Bach

San Jose State University

Santa Clara University

Source: IPEDS, CBRE Research

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

### SCORE 132.1

nelors	Masters	Doctorate	Total
1220	64	92	1,236
406	54	187	614
85	97	42	478
239	74	13	459
145	12	10	375

### 2022 Life Sciences Talent

## **O3** Washington, D.C./Baltimore

W	ΙΔ		F	2	
ш		U		υ	

	Average Wage
Biochemists	\$115,702
Biomedical Engineers	\$108,705
Biophysicists	\$115,446
Chemists	\$100,601

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	5,029,91
% of Laborers in Professional, Scientific & Tech Services	16.7%
% of Laborers in Health care Services	12.1%
5-Year Projected Population Growth	
Washington, D.C.	4.9%
Baltimore	1.8%

Source: CBRE Labor Analytics, CBRE Research.

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	30,240
Biochemists and biophysicists	140
Biological scientists, all other	5,610
Medical scientists, except epidemiologists	6,620
Bioengineers and Biomedical Engineers	830
Chemists	3,580
Microbiologists	2,160
Biological technicians	4,470
Epidemiologists	380
Life scientists, all other	660
Data Scientists & Math Science	5,790

Source: CBRE Labor Analytics, CBRE Research.

Costs of Living (2021)	
Yearly Cost of Living	\$64,765
Washington, D.C.	\$66,785
Baltimore	\$60,022
Median Household Income Value	\$99,142
Washington, D.C.	\$106,165
Baltimore	\$82,647
Median Home Value	\$426,472
Washington, D.C.	\$463,119
Baltimore	\$340,397
Average Apartment Rent/1BR/MO	
Washington, D.C.	\$1,733
Baltimore	\$1,408

COST OF LIVING

Source: CBRE Labor Analytics, CBRE EA Q4 2022

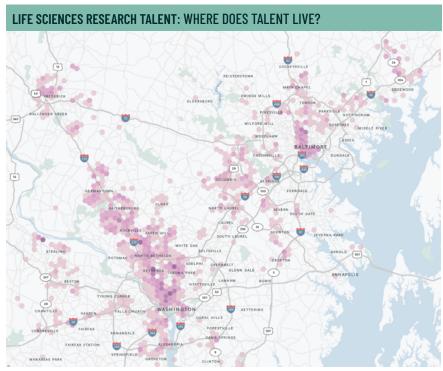
TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	5,645	5.2%
Total Bachelor, Masters, Doctorate degrees (all subjects)	107,591	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	3,514	62%
Master's Degree	1,765	31%
Doctorate	366	6%

Source: CBRE Labor Analytics, CBRE Research.

### School Johns Hopkins University University of Maryland - College Park Georgetown University George Mason University George Washington University

**TOP LIFE SCIENCES COLLEGES & UNIVERSITIES** 

Source: IPEDS, CBRE Research



Source: CBRE Location Intelligence.

# SCORE

Bachelors	Masters	Doctorate	Total
461	749	165	1375
670	21	46	737
99	452	34	585
423	74	21	518
243	195	24	462

### 2022 Life Sciences Talent

## 04 New York/New Jersey

WAGES	
	Average Wage
Biochemists	\$128,274
Biomedical Engineers	\$107,532
Biophysicists	\$127,978
Chemists	\$98,669

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

EMPLOYMENT	
	Employed (2022)
Total Life Sciences Occupations	38,700
Biochemists and biophysicists	3,100
Biological scientists, all other	1,810
Medical scientists, except epidemiologists	9,240
Bioengineers and Biomedical Engineers	720
Chemists	7,820
Microbiologists	1,560
Biological technicians	3,270
Epidemiologists	210
Life scientists, all other	570
Data Scientists & Math Science	10,400

POPULATION & LABOR FORCE	
Labor Force (2022)	10,040,665
% of Laborers in Professional, Scientific & Tech Services	10.9%
% of Laborers in Health care Services	16.8%
5-Year Projected Population Growth	1.2%

Source: CBRE Labor Analytics, CBRE Research.

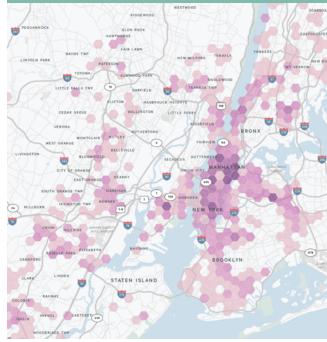
COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$69,246
Median Household Income Value	\$83,225
Median Home Value	\$517,738
Average Apartment Rent/1BR/MO	
New York	\$2,857
Newark	\$1,732

### Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
Rutgers University	1,121	351	63	1,535
Stony Brook University	723	103	41	867
New York University	242	484	74	800
Columbia University in the City of New York	186	479	109	774
CUNY City College	315	41	2	358

Source: IPEDS, CBRE Research

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

IALEN I PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	9,497	5.0%
Total Bachelor, Masters, Doctorate degrees (all subjects)	191,153	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	6,816	72%
Master's Degree	2,165	23%
Doctorate	516	5%

Source: CBRE Labor Analytics, CBRE Research.

### SCORE 126.8



- Up to 10 10-25 25-50 50-100 100-150
- 150+

## **05 San Diego**

### WAGES

	Average Wage
Biochemists	\$120,633
<b>Biomedical Engineers</b>	\$105,097
Biophysicists	\$120,363
Chemists	\$92,418

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

Employed	1 (2022)
tions	14,660
sts	2,230
er	3,610
pidemiologists	3,110
al Engineers	47(
	1,310
	400
	1,790
	-
	220
nce	1,520
nce	

POPULATION & LABOR FORCE	
Labor Force (2022)	1,712,551
% of Laborers in Professional, Scientific & Tech Services	12.6%
% of Laborers in Health care Services	13.1%
5-Year Projected Population Growth	2.7%

Source: CBRE Labor Analytics, CBRE Research.

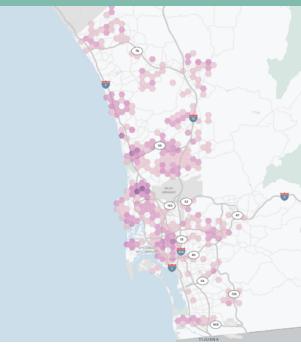
COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$76,257
Median Household Income Value	\$84,986
Median Home Value	\$663,193
Average Apartment Rent/1BR/MO	\$2,155

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
University of California - San Diego	1,703	331	130	2,164
San Diego State University	317	49	8	374
California State University - San Marcos	256	34	-	290
University of San Diego	178	1	-	179
Point Loma Nazarene University	71	8	-	79

Source: IPEDS, CBRE Research

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

### 

IALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	3,103	6.0%
Total Bachelor, Masters, Doctorate degrees (all subjects)	51,376	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,537	82%
Master's Degree	423	14%
Doctorate	143	5%

Source: CBRE Labor Analytics, CBRE Research.

### SCORE 118.8



### 2022 Life Sciences Talent

## **06 Philadelphia**

### WAGES

	Average Wage
Biochemists	\$119,102
<b>Biomedical Engineers</b>	\$102,716
Biophysicists	\$118,834
Chemists	\$93,263

Source: CBRE Labor Analytics, CBRE Research.

EMPLOYMENT	
	Employed (2022)
Total Life Sciences Occupations	19,520
Biochemists and biophysicists	2,440
Biological scientists, all other	1,170
Medical scientists, except epidemiologists	4,410
Bioengineers and Biomedical Engineers	220
Chemists	4,130
Microbiologists	520
Biological technicians	4,250
Epidemiologists	70
Life scientists, all other	-
Data Scientists & Math Science	2,310

POPULATION & LABOR FORCE	
Labor Force (2022)	3,209,354
% of Laborers in Professional, Scientific & Tech Services	10.0%
% of Laborers in Health care Services	17.7%
5-Year Projected Population Growth	1.7%

Source: CBRE Labor Analytics, CBRE Research.

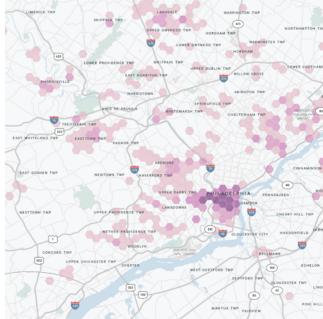
COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$56,355
Median Household Income Value	\$74,817
Median Home Value	\$280,529
Average Apartment Rent/1BR/MO	\$1,479

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
University of Pennsylvania	337	146	44	991
Temple University	452	67	123	975
University of Delaware	383	108	105	708
Drexel University	219	261	1	58
Rowan University	394	8	-	48

Source: IPEDS, CBRE Research

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

## TALENT PIPELINE

Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	3,951	5.9%
Total Bachelor, Masters, Doctorate degrees (all subjects)	67,182	
Degree Completions in the Biological and		
Biomedical Sciences	Total Degrees	% of Total Degrees
Biomedical Sciences Bachelor's Degree	Total Degrees 2,947	% of Total Degrees 75%
Bachelor's Degree	2,947	75%

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

### SCORE 114.5



- Up to 10
- 10-25
- 25-50
- 50-100
- 100-150
- 150+

## **07** Raleigh/Durham

### WAGES

	Average Wage
Biochemists	\$112,714
Biomedical Engineers	\$98,238
Biophysicists	\$112,447
Chemists	\$86,702

Source: CBR	E Labor	Analytics,	CBRE	Research.
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POPULATION & LABOR FORCE	
Labor Force (2022)	1,097,179
% of Laborers in Professional, Scientific & Tech Services	13.8%
% of Laborers in Health care Services	14.0%
5-Year Projected Population Growth	
Raleigh	6.6%
Durham	5.3%

Source: CBRE Labor Analytics, CBRE Research.

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	8,230
Biochemists and biophysicists	400
Biological scientists, all other	660
Medical scientists, except epidemiologists	2,140
Bioengineers and Biomedical Engineers	410
Chemists	2,190
Microbiologists	360
Biological technicians	980
Epidemiologists	50
Life scientists, all other	220
Data Scientists & Math Science	820

Source: CBRE Labor Analytics, CBRE Research.

TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	2,813	10.0%
Total Bachelor, Masters, Doctorate degrees (all subjects)	27,992	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,087	74%
Master's Degree	453	16%
Doctorate	273	10%

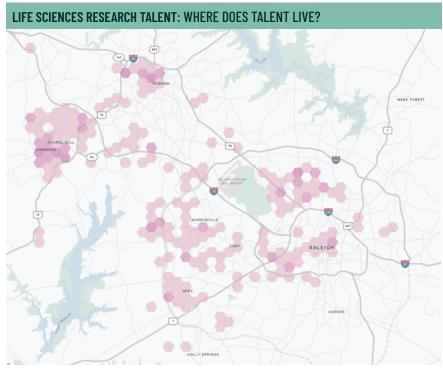
Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING		
Costs of Living (2021)		
Yearly Cost of Living		\$48,515
	Raleigh	\$49,103
	Durham	\$47,230
Median Household Income	e Value	\$74,821
	Raleigh	\$79,223
	Durham	\$65,195
Median Home Value		\$286,741
	Raleigh	\$290,980
	Durham	\$277,472
Average Apartment Rent/1	IBR/MO	\$1,300

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES CO	<b>DLLEGES &amp; UNIVERSITIES</b>
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TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
North Carolina State University at Raleigh	777	170	44	991
University of North Carolina at Chapel Hill	800	52	123	975
Duke University	382	221	105	708
North Carolina Central University	47	10	1	58
Meredith College	48	-	-	48
Source: IPEDS, CBRE Research				



Source: CBRE Location Intelligence.

### SCORE 114.1

- Up to 10 10-25 25-50 50-100 100-150
- 150+

## **08 Los Angeles/Orange County**

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	Average Wage
Biochemists	\$122,918
Biomedical Engineers	\$108,854
Biophysicists	\$122,633
Chemists	\$95,377

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

EMPLOYMENT	
	Employed (2022)
Total Life Sciences Occupations	17,190
Biochemists and biophysicists	780
Biological scientists, all other	1,910
Medical scientists, except epidemiologists	4,700
Bioengineers and Biomedical Engineers	740
Chemists	2,880
Microbiologists	600
Biological technicians	1,290
Epidemiologists	220
Life scientists, all other	240
Data Scientists & Math Science	3,830

POPULATION & LABOR FORCE	
Labor Force (2022)	6,767,243
% of Laborers in Professional, Scientific & Tech Services	10.1%
% of Laborers in Health care Services	13.1%
5-Year Projected Population Growth	1.5%

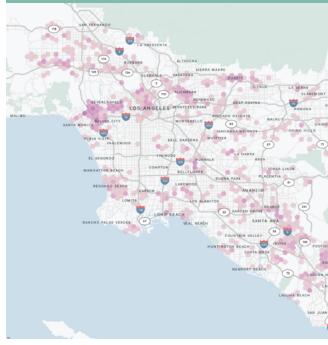
COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$76,086
Median Household Income Value	\$78,889
Median Home Value	\$709,275
Average Apartment Rent/1BR/MO	
Los Angeles	\$2,322
Orange County	\$2,249

### Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
University of California - Los Angeles	1,698	98	108	1,904
University of California - Irvine	1,032	103	68	1,203
University of Southern California	309	198	64	571
California State University - Long Beach	418	21	-	439
California State Polytechnic University - Pomona	335	27	-	362

Source: IPEDS, CBRE Research

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

### TAI ENT PIPEI INE

Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	6,402	4.9%
Total Bachelor, Masters, Doctorate degrees (all subjects)	131,246	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	5,479	86%
Master's Degree	630	10%
Doctorate	293	5%

Source: CBRE Labor Analytics, CBRE Research.

### SCORE 112.3



### 2022 Life Sciences Talent

## **09** Seattle

### WAGES

	Average Wage
Biochemists	\$116,589
<b>Biomedical Engineers</b>	\$108,717
Biophysicists	\$116,332
Chemists	\$91,968

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

EMPLOYMENT	
	Employed (2022)
Total Life Sciences Occupations	12,210
Biochemists and biophysicists	240
Biological scientists, all other	720
Medical scientists, except epidemiologists	4,270
Bioengineers and Biomedical Engineers	650
Chemists	550
Microbiologists	360
Biological technicians	2,750
Epidemiologists	400
Life scientists, all other	150
Data Scientists & Math Science	2,120

POPULATION & LABOR FORCE	
Labor Force (2022)	2,227,470
% of Laborers in Professional, Scientific & Tech Services	13.9%
% of Laborers in Health care Services	13.2%
5-Year Projected Population Growth	6.8%

Source: CBRE Labor Analytics, CBRE Research.

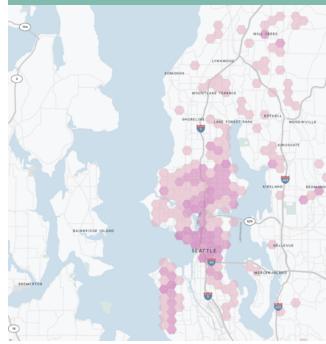
**COST OF LIVING** Costs of Living (2021) \$66,016 Yearly Cost of Living Median Household Income Value \$92,987 Median Home Value \$532,737 Average Apartment Rent/1BR/MO \$1,777

Source: CBRE Labor Analytics, CBRE EA Q4 2022

School	Bachelors	Masters	Doctorate	Total
University of Washington - Seattle Campus	1,048	119	116	1,283
University of Washington - Bothell Campus	146	-	-	146
University of Washington - Tacoma Campus	87	-	-	87
Seattle University	75	-	-	75
Seattle Pacific University	59	-	-	59

Source: IPEDS, CBRE Research

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?

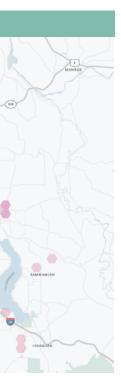


Source: CBRE Location Intelligence.

TALENT PIPELINE Total Degrees % of Top 25 Markets Degree Completions (2021) **Biological and Biomedical Sciences** 1,765 6.7% Total Bachelor, Masters, Doctorate degrees 26,272 (all subjects) Degree Completions in the Biological and Biomedical Sciences Total Degrees % of Total Degrees Bachelor's Degree 1,530 87% Master's Degree 116 7% 119 7% Doctorate

Source: CBRE Labor Analytics, CBRE Research.

# SCORE



- Up to 10 10-25 25-50
- 50-100
- 100-150
- 150+

## **10 Denver/Boulder**

### WAGES

Average Wage
\$116,202
\$102,188
\$115,943
\$92,518

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	1,953,700
% of Laborers in Professional, Scientific & Tech Services	13.3%
% of Laborers in Health care Services	12.5%
5-Year Projected Population Growth	
Denver	7.0%
Boulder	5.3%

Source: CBRE Labor Analytics, CBRE Research.

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	10,630
Biochemists and biophysicists	780
Biological scientists, all other	460
Medical scientists, except epidemiologists	1,500
Bioengineers and Biomedical Engineers	530
Chemists	1,720
Microbiologists	300
Biological technicians	2,330
Epidemiologists	370
Life scientists, all other	-
Data Scientists & Math Science	2,640

Source: CBRE Labor Analytics, CBRE Research.

Costs of Living (2021)	
Yearly Cost of Living	\$58,150
Denver	\$57,800
Boulder	\$61,262
Median Household Income Value	\$85,096
Denver	\$84,885
Boulder	\$86,969
Median Home Value	\$473,403
Denver	\$459,313
Boulder	\$598,730
Average Apartment Rent/1BR/MO	\$1,592

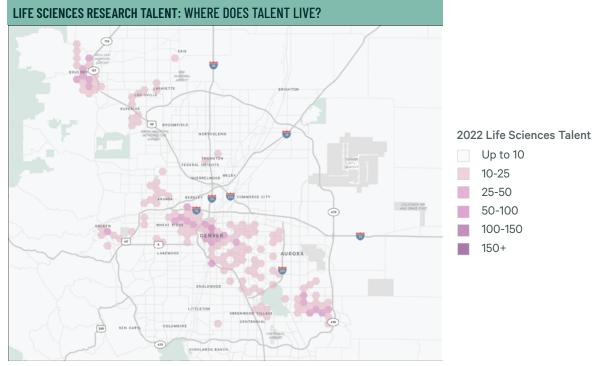
COST OF LIVING

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	2,058	6.5%
Total Bachelor, Masters, Doctorate degrees (all subjects)	31,762	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	1,711	83%
Master's Degree	232	11%
Doctorate	115	6%

Source: CBRE Labor Analytics, CBRE Research.

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
University of Colorado Boulder	927	37	38	1,002
University of Colorado Denver/Anschutz Medical Campus	402	82	66	550
Metropolitan State University of Denver	199	-	-	199
University of Denver	108	23	11	142
Regis University	55	40	-	95
Source: IPEDS, CBRE Research				



Source: CBRE Location Intelligence.

# SCORE

### Minneapolis/St. Paul 11

1A	1	C	Г	C	
V	1	G	E	Э	

	Average Wage
Biochemists	\$111,717
Biomedical Engineers	\$100,773
Biophysicists	\$111,469
Chemists	\$88,268

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	2,026,361
% of Laborers in Professional, Scientific & Tech Services	9.5%
% of Laborers in Health care Services	15.3%
5-Year Projected Population Growth	4.7%

Bachelor's Degree

Master's Degree

Source: CBRE Labor Analytics, CBRE Research.

Doctorate

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$51,497
Median Household Income Value	\$83,904
Median Home Value	\$297,739
Average Apartment Rent/1BR/MO	\$1,255

Source: CBRE Labor Analytics, CBRE EA Q4 2022

1,651

226

124

School	Bachelors	Masters	Doctorate	Total
Iniversity of Minnesota-Twin Cities	1,046	226	124	1,396
Jniversity of St Thomas	142	-	-	142
Jniversity of Wisconsin-River Falls	96	-	-	96
1acalester College	86	-	-	86
Yetropolitan State University	61	-	-	61

Source: IPEDS, CBRE Research

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	8,800
Biochemists and biophysicists	1,140
Biological scientists, all other	240
Medical scientists, except epidemiologists	2,970
Bioengineers and Biomedical Engineers	930
Chemists	1,160
Microbiologists	310
Biological technicians	460
Epidemiologists	270
Life scientists, all other	70
Data Scientists & Math Science	1,250

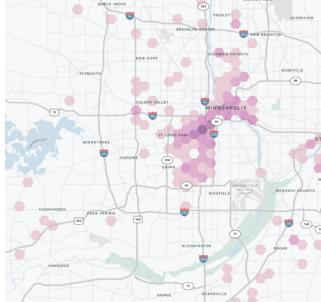
TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	2,001	3.7%
Total Bachelor, Masters, Doctorate degrees (all subjects)	53,923	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees

	LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?
o 25 Markets	
3.7%	MALE ORDAE BEOKENIN PARK MOLIEG VIEW
	TIDEY SHOREVEN

83%

11%

6%



Source: CBRE Location Intelligence.

Source: CBRE Labor Analytics, CBRE Research.

# SCORE



- Up to 10 10-25 25-50 50-100
- 100-150
- 150+

## 12 Chicago

### WAGES

	Average Wage
Biochemists	\$115,009
<b>Biomedical Engineers</b>	\$98,961
Biophysicists	\$114,758
Chemists	\$88,931

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

**POPULATION & LABOR FORCE** 4,984,678 Labor Force (2022) % of Laborers in Professional, Scientific & Tech Services 10.1% 14.0% % of Laborers in Health care Services 5-Year Projected Population Growth -0.1% Source: CBRE Labor Analytics, CBRE Research.

Costs of Living (2021) Yearly Cost of Living Median Household Income Value Median Home Value \$267,269 Average Apartment Rent/1BR/MO

COST OF LIVING

### Source: CBRE Labor Analytics, CBRE EA Q4 2022

\$55,118

\$76,111

\$1,565

4.9%

rs Masters 0 64 3 121	s Doctorate 48	Total 791 640
	48	
121	11	G/.0
, IZI	11	040
91	72	420
) 89	76	335
8 81	-	119
C	0 89	0 89 76

Source: IPEDS, CBRE Research

### EMPLOYMENT

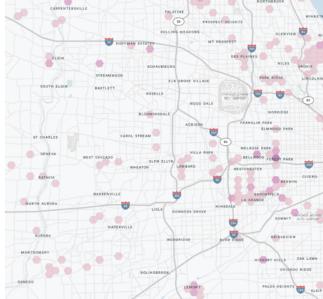
	Employed (2022)
Total Life Sciences Occupations	13,030
Biochemists and biophysicists	170
Biological scientists, all other	410
Medical scientists, except epidemiologists	3,090
Bioengineers and Biomedical Engineers	700
Chemists	2,600
Microbiologists	430
Biological technicians	1,430
Epidemiologists	130
Life scientists, all other	80
Data Scientists & Math Science	3,990

### TALENT PIPELINE Total Degrees % of Top 25 Markets Degree Completions (2021) **Biological and Biomedical Sciences** 3,309 Total Bachelor, Masters, Doctorate degrees 67,273 (all subjects)

(dii babjeoto)		
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,464	74%
Master's Degree	612	18%
Doctorate	233	7%

Source: CBRE Labor Analytics, CBRE Research.

## LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

# SCORE



### 2022 Life Sciences Talent

## **13 Houston**

W	ΙΔ		F	2	
ш		U		υ	

	Average Wage
Biochemists	\$118,018
<b>Biomedical Engineers</b>	\$108,113
Biophysicists	\$117,736
Chemists	\$97,887

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

18,018	% of Laborers in Professional, Scientific & Tech Services
08,113	% of Laborers in Health care Services
17,736	5-Year Projected Population Growth
97,887	Source: CBRE Labor Analytics, CBRE Research.

**POPULATION & LABOR FORCE** 

Labor Force (2022)

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$47,794
Median Household Income Value	\$68,729
Median Home Value	\$248,638
Average Apartment Rent/1BR/MO	\$1,086

Source: CBRE Labor Analytics, CBRE EA Q4 2022

% of Top 25 Markets

School	Bachelors	Masters	Doctorate	Total
University of Houston	628	54	37	719
The University of Texas Health Science Center at Houston	-	155	89	244
Rice University	194	23	26	243
University of Houston - Clear Lake	93	46	-	139
Prairie View A & M University	103	-	-	103

Source: IPEDS, CBRE Research

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	8,480
Biochemists and biophysicists	190
Biological scientists, all other	310
Medical scientists, except epidemiologists	3,450
Bioengineers and Biomedical Engineers	230
Chemists	1,340
Microbiologists	130
Biological technicians	1,530
Epidemiologists	180
Life scientists, all other	140
Data Scientists & Math Science	980

TALENT PIPELINE	
Degree Completions (2021)	Total Degrees

4,984,678

10.1%

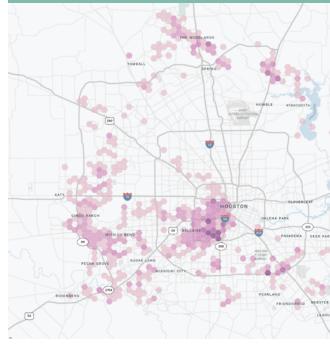
14.0%

-0.1%

Biological and Biomedical Sciences	1,832	6.5%
Total Bachelor, Masters, Doctorate degrees (all subjects)	28,182	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	1,263	69%
Master's Degree	302	16%
Doctorate	267	15%

Source: CBRE Labor Analytics, CBRE Research.

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

57 CBRE RESEARCH

### SCORE 103.5



### 2022 Life Sciences Talent

## 14 Atlanta

### WAGES

	Average Wage
Biochemists	\$111,328
<b>Biomedical Engineers</b>	\$94,405
Biophysicists	\$111,056
Chemists	\$86,113

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

3,210,525 Labor Force (2022) 11.2% % of Laborers in Professional, Scientific & Tech Services 11.3% % of Laborers in Health care Services 5-Year Projected Population Growth 6.6% Source: CBRE Labor Analytics, CBRE Research.

**POPULATION & LABOR FORCE** 

COST OF LIVING Costs of Living (2021) \$48,030 Yearly Cost of Living Median Household Income Value \$71,225 Median Home Value \$263,851 Average Apartment Rent/1BR/MO \$1,430

Source: CBRE Labor Analytics, CBRE EA Q4 2022

% of Top 25 Markets

7.1%

TOP 5 LIFE SCIENCES COLLEGES & UNIVERSITIE	S			
School	Bachelors	Masters	Doctorate	Total
Emory University	362	217	98	677
Georgia Institute of Technology	473	70	53	596
Georgia State University	420	93	17	530
Kennesaw State University	290	15	-	305
University of West Georgia	113	4	-	117

Source: IPEDS, CBRE Research

### EMPLOYMENT

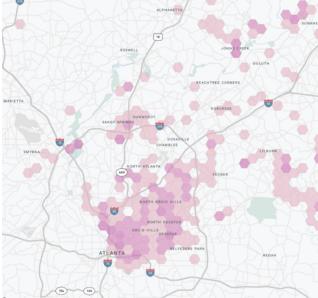
	Employed (2022)
Total Life Sciences Occupations	7,840
Biochemists and biophysicists	100
Biological scientists, all other	790
Medical scientists, except epidemiologists	880
Bioengineers and Biomedical Engineers	130
Chemists	730
Microbiologists	580
Biological technicians	640
Epidemiologists	260
Life scientists, all other	
Data Scientists & Math Science	3,730

TALENT PIPELINE	
Degree Completions (2021)	Total Degrees
Biological and Biomedical Sciences	2,782
Total Bachelor, Masters, Doctorate degrees	38,967

(all subjects)	38,967	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,190	79%
Master's Degree	410	15%
Doctorate	182	7%

Source: CBRE Labor Analytics, CBRE Research.

# LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

### SCORE 103.3



- Up to 10 10-25 25-50 50-100 100-150
- 150+

## **15** Sacramento

### WAGES

	Average Wage
Biochemists	\$120,757
Biomedical Engineers	\$107,025
Biophysicists	\$120,491
Chemists	\$94,612

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	1,158,030
% of Laborers in Professional, Scientific & Tech Services	8.7%
% of Laborers in Health care Services	14.5%
5-Year Projected Population Growth	4.2%

TAI ENT PIPEI INE

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$58,566
Median Household Income Value	\$77,240
Median Home Value	\$481,098
Average Apartment Rent/1BR/MO	\$1,668

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
University of California - Davis	1,728	145	65	1,938
California State University - Sacramento	295	-	13	308
William Jessup University	11	-	-	11

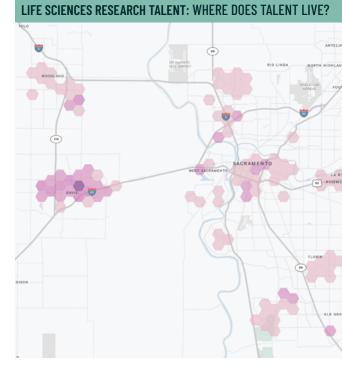
Source: IPEDS, CBRE Research

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	4,630
Biochemists and biophysicists	180
Biological scientists, all other	700
Medical scientists, except epidemiologists	910
Bioengineers and Biomedical Engineers	80
Chemists	310
Microbiologists	100
Biological technicians	400
Epidemiologists	180
Life scientists, all other	110
Data Scientists & Math Science	1,660

Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	2,257	10.8%
Total Bachelor, Masters, Doctorate degrees (all subjects)	20,988	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,034	90%
Master's Degree	78	3%
Doctorate	145	6%

Source: CBRE Labor Analytics, CBRE Research.



Source: CBRE Location Intelligence.

### SCORE 102.3



### 2022 Life Sciences Talent

## 16 Austin

### WAGES

	Average Wage
Biochemists	\$107,868
<b>Biomedical Engineers</b>	\$100,800
Biophysicists	\$107,610
Chemists	\$84,101

Source: CBRE Labor Analytics, CBRE Research.

EMPLOYMENT	
	Employed (2022)
Total Life Sciences Occupations	2,830
Biochemists and biophysicists	240
Biological scientists, all other	180
Medical scientists, except epidemiologists	590
Bioengineers and Biomedical Engineers	170
Chemists	260
Microbiologists	160
Biological technicians	170
Epidemiologists	120
Life scientists, all other	-
Data Scientists & Math Science	940

POPULATION & LABOR FORCE	
Labor Force (2022)	1,266,681
% of Laborers in Professional, Scientific & Tech Services	13.3%
% of Laborers in Health care Services	10.8%
5-Year Projected Population Growth	11.9%

Source: CBRE Labor Analytics, CBRE Research.

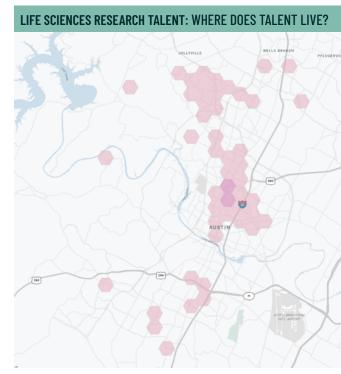
COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$51,821
Median Household Income Value	\$81,999
Median Home Value	\$319,826
Average Apartment Rent/1BR/MO	\$1,424

Source: CBRE Labor Analytics, CBRE EA Q4 2022

% of Top 25 Markets

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES	3			
School	Bachelors	Masters	Doctorate	Total
The University of Texas at Austin	1,329	59	16	1,404
Texas State University	358	-	28	386
Saint Edward's University	77	-	-	77
Southwestern University	32	-	-	32
Huston-Tillotson University	15	-	-	15

Source: IPEDS, CBRE Research



Source: CBRE Location Intelligence.

Medical scientists, except epidemiologists
Bioengineers and Biomedical Engineers
Chemists
Microbiologists
Biological technicians
Epidemiologists
Life scientists, all other
Data Scientists & Math Science

Source: CBRE Labor Analytics, CBRE Research.

TALENT PIPELINE Degree Completions (2021) Total Degrees

Biological and Biomedical Sciences	1,927	7.3%
Total Bachelor, Masters, Doctorate degrees (all subjects)	26,247	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	1,824	95%
Master's Degree	44	2%
Doctorate	59	3%

Source: CBRE Labor Analytics, CBRE Research.

### SCORE 101.8



- Up to 10 10-25 25-50
- 50-100
- 100-150
- 150+

## **17 Worcester**

### WAGES

	Average Wage
Biochemists	\$113,728
<b>Biomedical Engineers</b>	\$96,957
Biophysicists	\$113,476
Chemists	\$88,882

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

ON & LABOR FORCE	
e (2022)	523,873
ers in Professional, Scientific & Tech Services	8.4%
ers in Health care Services	16.9%
ected Population Growth	1.6%

Source: CBRE Labor Analytics, CBRE Research.

\$58,768
\$77,066
\$340,540

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES	S			
School	Bachelors	Masters	Doctorate	Total
Worcester Polytechnic Institute	158	48	8	214
Worcester State University	99	5	-	104
Clark University	59	18	1	78
Fitchburg State University	70	1	-	71
College of the Holy Cross	60	-	-	60

Source: IPEDS, CBRE Research

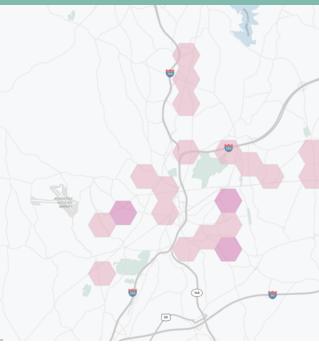
### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	1,980
Biochemists and biophysicists	430
Biological scientists, all other	80
Medical scientists, except epidemiologists	270
Bioengineers and Biomedical Engineers	90
Chemists	250
Microbiologists	130
Biological technicians	490
Epidemiologists	100
Life scientists, all other	
Data Scientists & Math Science	140

TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	663	6.5%
Total Bachelor, Masters, Doctorate degrees (all subjects)	10,153	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	527	79%
Master's Degree	86	13%
Doctorate	50	8%

Source: CBRE Labor Analytics, CBRE Research.

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

### SCORE 101.7



### 2022 Life Sciences Talent

## **18 Salt Lake City**

### WAGES

	Average Wage
Biochemists	\$104,302
<b>Biomedical Engineers</b>	\$91,283
Biophysicists	\$104,058
Chemists	\$81,081

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	687,774
% of Laborers in Professional, Scientific & Tech Services	9.3%
% of Laborers in Health care Services	11.9%
5-Year Projected Population Growth	7.1%

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$53,804
Median Household Income Value	\$80,658
Median Home Value	\$398,070
Average Apartment Rent/1BR/MO	\$1,300

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
University of Utah	284	71	61	416
Westminster College	33	-	-	33
-				

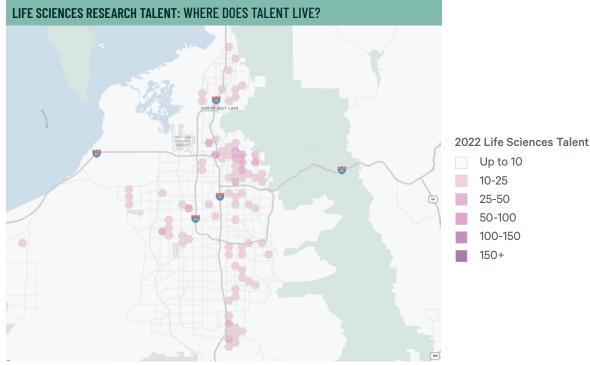
Source: IPEDS, CBRE Research

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	4,440
Biochemists and biophysicists	240
Biological scientists, all other	270
Medical scientists, except epidemiologists	1,220
Bioengineers and Biomedical Engineers	440
Chemists	420
Microbiologists	100
Biological technicians	360
Epidemiologists	120
Life scientists, all other	70
Data Scientists & Math Science	1,200

TALENT PIPELINE		
Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	449	0.8%
Total Bachelor, Masters, Doctorate degrees (all subjects)	58,553	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	317	71%
Master's Degree	71	16%
Doctorate	61	14%

Source: CBRE Labor Analytics, CBRE Research.



Source: CBRE Location Intelligence.

### SCORE 101.7

## **19 Dallas/Fort Worth**

WAGES	
	Average Wage
Biochemists	\$111,043
Biomedical Engineers	\$102,218
Biophysicists	\$110,781
Chemists	\$88,397

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

Labor Force (2022)	4,115,965
% of Laborers in Professional, Scientific & Tech Services	9.3%
% of Laborers in Health care Services	11.6%
5-Year Projected Population Growth	8.7%

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$49,792
Median Household Income Value	\$73,903
Median Home Value	\$266,837
Average Apartment Rent/1BR/MO	\$1,258

Source: CBRE Labor Analytics, CBRE EA Q4 2022

% of Top 25 Markets

Bachelors	Masters	Doctorate	Total
777	154	29	960
575	23	14	612
451	44	26	521
-	271	13	284
108	11	2	121
	777 575 451	777 154   575 23   451 44   - 271	777 154 29   575 23 14   451 44 26   - 271 13

Source: IPEDS, CBRE Research

### EMPLOYMENT

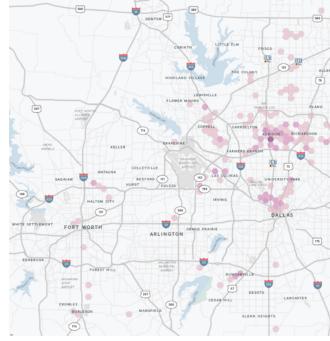
	Employed (2022)
Total Life Sciences Occupations	7,850
Biochemists and biophysicists	110
Biological scientists, all other	400
Medical scientists, except epidemiologists	1,700
Bioengineers and Biomedical Engineers	320
Chemists	710
Microbiologists	110
Biological technicians	1,620
Epidemiologists	180
Life scientists, all other	-
Data Scientists & Math Science	2,700

TALENT PIPELINE	
Degree Completions (2021)	Total Degrees
Biological and Biomedical Sciences	3 074

Biological and Biomedical Sciences	3,074	5.6%
Total Bachelor, Masters, Doctorate degrees (all subjects)	54,469	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,351	76%
Master's Degree	588	19%
Doctorate	135	4%

Source: CBRE Labor Analytics, CBRE Research.

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

### SCORE 101



- Up to 10 10-25
- 25-50
- 50-100
- 100-150
- 150+

## 20 Miami/Fort Lauderdale

WAGES	
	Average Wage
Biochemists	\$108,77
Biomedical Engineers	\$94,02
Biophysicists	\$108,51
Chemists	\$82,90

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	3,098,186
% of Laborers in Professional, Scientific & Tech Services	8.9%
% of Laborers in Health care Services	14.0%
5-Year Projected Population Growth	4.6%

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$60,458
Median Household Income Value	\$59,285
Median Home Value	\$329,375
Average Apartment Rent/1BR/MO	\$1,857

Source: CBRE Labor Analytics, CBRE EA Q4 2022

% of Top 25 Markets

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
Florida International University	1,058	30	19	1,107
University of Miami	413	237	50	700
Florida Atlantic University	486	71	16	573
Nova Southeastern University	409	98	-	507
Barry University	65	138	-	203

Source: IPEDS, CBRE Research

### EMPLOYMENT

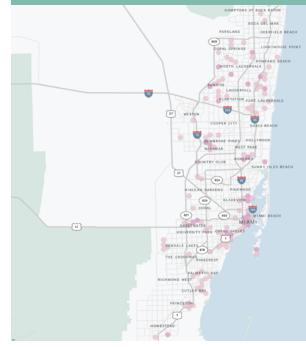
	Employed (2022)
Total Life Sciences Occupations	4,260
Biochemists and biophysicists	220
Biological scientists, all other	1310
Medical scientists, except epidemiologists	0
Bioengineers and Biomedical Engineers	140
Chemists	620
Microbiologists	110
Biological technicians	640
Epidemiologists	60
Life scientists, all other	0
Data Scientists & Math Science	1160

### TALENT PIPELINE Degree Completions (2021) **Total Degrees**

Biological and Biomedical Sciences	3,307	6.9%
Total Bachelor, Masters, Doctorate degrees (all subjects)	47,826	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	2,648	80%
Master's Degree	574	17%
Doctorate	85	3%

Source: CBRE Labor Analytics, CBRE Research.

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

# SCORE



## 21 Albany

WAGES	
	Average Wage
Biochemists	\$107,998
<b>Biomedical Engineers</b>	\$99,644
Biophysicists	\$107,766

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	482,734
% of Laborers in Professional, Scientific & Tech Services	9.6%
% of Laborers in Health care Services	16.4%
5-Year Projected Population Growth	1.1%

TALE

Degre

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$52,020
Median Household Income Value	\$73,490
Median Home Value	\$236,083

Source: CBRE Labor Analytics, CBRE EA Q4 2022

% of Top 25 Markets

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
SUNY at Albany	254	15	19	288
Rensselaer Polytechnic Institute	176	32	13	221
Union College	95	-	-	95
Siena College	89	-	-	89
Skidmore College	54	-	-	54

Source: IPEDS, CBRE Research

### EMPLOYMENT

Chemists

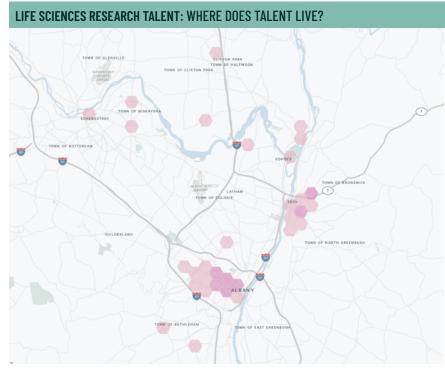
	Employed (2022)
Total Life Sciences Occupations	1,960
Biochemists and biophysicists	210
Biological scientists, all other	70
Medical scientists, except epidemiologists	370
Bioengineers and Biomedical Engineers	90
Chemists	350
Microbiologists	110
Biological technicians	460
Epidemiologists	-
Life scientists, all other	-
Data Scientists & Math Science	300

\$84,190

INT PIPELINE	
ee Completions (2021)	Total Degrees

Biological and Biomedical Sciences	858	5.0%
Total Bachelor, Masters, Doctorate degrees (all subjects)	17,307	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	764	89%
Master's Degree	53	6%
Doctorate	41	5%

Source: CBRE Labor Analytics, CBRE Research.



Source: CBRE Location Intelligence.

# SCORE

- Up to 10 10-25 25-50 50-100
- 100-150
- 150+

## 22 Portland

### WAGES

	Average Wage
Biochemists	\$112,599
<b>Biomedical Engineers</b>	\$97,041
Biophysicists	\$112,348
Chemists	\$86,886

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

**POPULATION & LABOR FORCE** 1,363,250 Labor Force (2022) % of Laborers in Professional, Scientific & Tech Services 9.9% % of Laborers in Health care Services 5-Year Projected Population Growth

Source: CBRE Labor Analytics, CBRE Research.

Median Household Income Value 14.9% Median Home Value 5.8% Average Apartment Rent/1BR/MO

COST OF LIVING Costs of Living (2021)

Yearly Cost of Living

Source: CBRE Labor Analytics, CBRE EA Q4 2022

\$56,538

\$78,432

\$437,985

\$1,461

5.8%

Bachelors	Masters	Doctorate	Total
232	16	5	253
124	-	-	124
114	2	-	116
-	27	39	66
58	2	2	62
	232 124 114	232 16   124 -   114 2   - 27	232 16 5   124 - -   114 2 -   - 27 39

Source: IPEDS, CBRE Research

### EMPLOYMENT

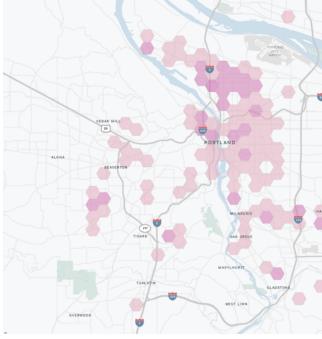
	Employed (2022)
Total Life Sciences Occupations	5,590
Biochemists and biophysicists	0
Biological scientists, all other	280
Medical scientists, except epidemiologists	1400
Bioengineers and Biomedical Engineers	50
Chemists	530
Microbiologists	80
Biological technicians	1950
Epidemiologists	70
Life scientists, all other	180
Data Scientists & Math Science	1050

### TALENT PIPELINE Total Degrees % of Top 25 Markets Degree Completions (2021) **Biological and Biomedical Sciences** 796 Total Bachelor, Masters, Doctorate degrees 13,641 (all subjects)

Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	703	88%
Master's Degree	47	6%
Doctorate	46	6%

Source: CBRE Labor Analytics, CBRE Research.

### LIFE SCIENCES RESEARCH TALENT: WHERE DOES TALENT LIVE?



Source: CBRE Location Intelligence.

# SCORE



- Up to 10 10-25 25-50 50-100 100-150
- 150+

## 23 Pittsburgh

### WAGES

	Average Wage
Biochemists	\$104,086
<b>Biomedical Engineers</b>	\$92,687
Biophysicists	\$103,846
Chemists	\$82,264

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	1,225,253
% of Laborers in Professional, Scientific & Tech Services	-0.4%
% of Laborers in Health care Services	8.6%
5-Year Projected Population Growth	18.3%

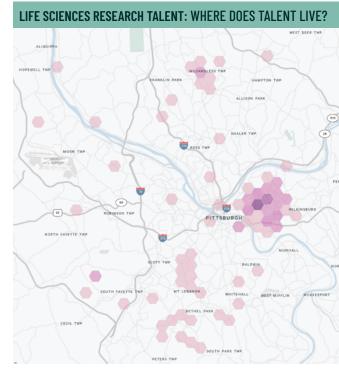
Source: CBRE Labor Analytics, CBRE Research.

, ,	
, ,	
	\$49,275
Median Household Income Value	\$62,319
Median Home Value	3181,306
Average Apartment Rent/1BR/MO	\$1,144

Source: CBRE Labor Analytics, CBRE EA Q4 2022

Bachelors	Masters	Doctorate	Total
694	131	91	916
118	69	24	211
157	18	6	181
53	30	-	83
53	-	-	53
	694 118 157 53	694 131   118 69   157 18   53 30	694 131 91   118 69 24   157 18 6   53 30 -

Source: IPEDS, CBRE Research



Source: CBRE Location Intelligence.

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	4,680
Biochemists and biophysicists	
Biological scientists, all other	230
Medical scientists, except epidemiologists	1,120
Bioengineers and Biomedical Engineers	100
Chemists	930
Microbiologists	40
Biological technicians	1,270
Epidemiologists	-
Life scientists, all other	80
Data Scientists & Math Science	910

TALENT PIPELINE Degree Completions (2021) Total Dogroos

Degree Completions (2021)	Total Degrees	% of Top 25 Markets
Biological and Biomedical Sciences	1,771	6.9%
Total Bachelor, Masters, Doctorate degrees (all subjects)	25,542	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	1,402	79%
Master's Degree	248	14%
Doctorate	121	7%

Source: CBRE Labor Analytics, CBRE Research.

# SCORE



- Up to 10 10-25 25-50
- 50-100
- 100-150
- 150+

## 24 New Haven

	M	VA	G	ES	S
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	Average Wage
Biochemists	\$126,586
<b>Biomedical Engineers</b>	\$100,536
Biophysicists	\$126,318
Chemists	\$96,683

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

POPULATION & LABOR FORCE	
Labor Force (2022)	457,637
% of Laborers in Professional, Scientific & Tech Services	6.8%
% of Laborers in Health care Services	19.4%
5-Year Projected Population Growth	-0.2%

(all subjects)

**Biomedical Sciences** 

Bachelor's Degree

Master's Degree

Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING	
Costs of Living (2021)	
Yearly Cost of Living	\$60,681
Median Household Income Value	\$68,471
Median Home Value	\$264,109

Source: CBRE Labor Analytics, CBRE EA Q4 2022

13,909

441

394

105

Total Degrees

% of Top 25 Markets

% of Total Degrees

6.8%

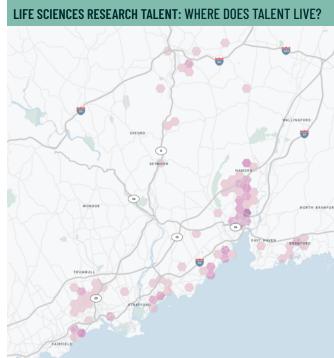
47%

42%

11%

TOP LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
Yale University	180	255	105	540
Quinnipiac University	107	75	-	182
University of New Haven	73	57	-	130
Southern Connecticut State University	62	7	-	69
Post University	16	-	-	16

Source: IPEDS, CBRE Research



### Source: CBRE Location Intelligence.

### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	1,120
Biochemists and biophysicists	-
Biological scientists, all other	110
Medical scientists, except epidemiologists	370
Bioengineers and Biomedical Engineers	40
Chemists	310
Microbiologists	-
Biological technicians	210
Epidemiologists	-
Life scientists, all other	-
Data Scientists & Math Science	80

TALENT PIPELINE Total Degrees Degree Completions (2021) **Biological and Biomedical Sciences** 940

Doctorate
Source: CBRE Labor Analytics, CBRE Research.

Total Bachelor, Masters, Doctorate degrees

Degree Completions in the Biological and

# SCORE



### 2022 Life Sciences Talent

## **25** Nashville

### WAGES

	Average Wage
Biochemists	\$101,579
<b>Biomedical Engineers</b>	\$88,766
Biophysicists	\$101,345
Chemists	\$77,465

Source: CBRE Labor Analytics, CBRE Research.

Source: CBRE Labor Analytics, CBRE Research.

**POPULATION & LABOR FORCE** 1,083,969 Labor Force (2022) 7.8% % of Laborers in Professional, Scientific & Tech Services 15.0% % of Laborers in Health care Services 5-Year Projected Population Growth 8.4% Source: CBRE Labor Analytics, CBRE Research.

COST OF LIVING Costs of Living (2021) \$46,894 Yearly Cost of Living Median Household Income Value \$69,663 Median Home Value \$287,644 Average Apartment Rent/1BR/MO \$1,345

Source: CBRE Labor Analytics, CBRE EA Q4 2022

TOP 5 LIFE SCIENCES COLLEGES & UNIVERSITIES				
School	Bachelors	Masters	Doctorate	Total
Vanderbilt University	256	38	91	385
Middle Tennessee State University	215	54	5	274
Lipscomb University	86	33	-	119
Tennessee State University	45	11	12	68
Belmont University	46	-	-	46

Source: IPEDS, CBRE Research

6.1%

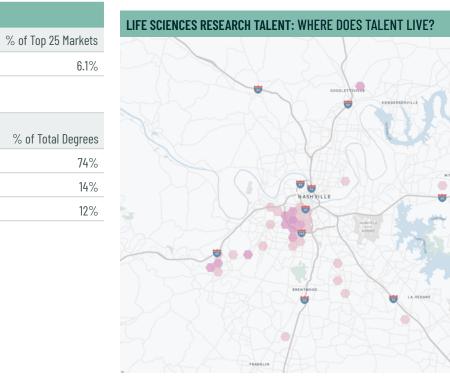
### EMPLOYMENT

	Employed (2022)
Total Life Sciences Occupations	2,990
Biochemists and biophysicists	190
Biological scientists, all other	190
Medical scientists, except epidemiologists	660
Bioengineers and Biomedical Engineers	60
Chemists	280
Microbiologists	80
Biological technicians	790
Epidemiologists	130
Life scientists, all other	
Data Scientists & Math Science	610

### TALENT PIPELINE Total Degrees Degree Completions (2021) **Biological and Biomedical Sciences** 958 Total Bachelor, Masters, Doctorate degrees

(all subjects)	15,710	
Degree Completions in the Biological and Biomedical Sciences	Total Degrees	% of Total Degrees
Bachelor's Degree	710	74%
Master's Degree	136	14%
Doctorate	112	12%

Source: CBRE Labor Analytics, CBRE Research.



Source: CBRE Location Intelligence.

# SCORE



- Up to 10 10-25
- 25-50
- 50-100
- 100-150
- 150+

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