HEALTHCARE & BIOSCIENCE
ECONOMIC IMPACT STUDY 2020

STUDY CONDUCTED BY
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Trinity University

Based on 2019 data
ABOUT THIS STUDY

Versions of this study prior to 2009 did not include the impact of The University of Texas Health Science Center at San Antonio (subsequently referred to as UT Health San Antonio), the Baylor College of Medicine’s presence at the Children’s Hospital of San Antonio, some elements of the military medical presence in the region, and the multiplier effects of the goods and services local Healthcare and Bioscience businesses sell or deliver to customers and patients outside the region.

This year’s study attempts – as in the 2009, 2011, 2013, 2015 and 2017 studies – to include credible approximations of the size of these important contributors to the San Antonio economy. This expanded definition of the industry is represented in the “comprehensive” estimates. To facilitate comparisons with the past, “traditional” estimates using the previous industry definition are also reported.

HIGHLIGHTS

- The Healthcare and Bioscience Industry continues to be one of San Antonio’s largest industries. Its economic impact in 2019 was $32.6 billion measured conservatively, and $42.4 billion by a more comprehensive estimate.

- By the more comprehensive estimate, the industry paid $10.4 billion in wages and salaries to 187,825 employees in 2019.

- Nearly one of every five San Antonio employees works in the Healthcare and Bioscience Industry.

- The Healthcare and Bioscience industry has added nearly 50,000 net new jobs over the past decade, fueling San Antonio’s growth.

- As one of San Antonio’s leading industries, Healthcare and Bioscience has shown steady growth and innovation over the past quarter-century.
OVERVIEW
San Antonio’s Healthcare and Bioscience industry is both large and diverse. It includes a wide variety of direct healthcare services as well as industries related to the provision of health and medical care.

San Antonio Healthcare and Bioscience Industry 2019
Percent of Total Economic Impact

- Hospitals (37.5%)
- Other Services (14.1%)
- Physicians (13.1%)
- Miscellaneous Related (8.6%)
- Social Services (7.4%)
- Pharmaceuticals (7.3%)
- Research & Education (6.2%)
- Insurance (5.7%)
Direct healthcare services include the care provided in hospitals, physicians’ offices, nursing homes, the offices and clinics of dentists and other healthcare providers, and various other outpatient and ambulatory care settings. In San Antonio, health services include both civilian and military medicine, a Veterans Administration medical center, and a variety of governmental, for-profit and non-profit operations and facilities.

Related industries complement and support the provision of medical and healthcare services. These industry sectors include health insurance carriers, pharmaceutical companies, medical equipment manufacturers and wholesalers, civilian and military medical education, biomedical research organizations, residential care and social service providers, and a variety of related endeavors.

STRAC’s mission as the designated Trauma Regional Advisory Council for our 22-county region is to develop, implement and maintain the trauma/emergency healthcare system, including disaster preparedness. During COVID, STRAC has played a pivotal role by working with county and state emergency officials, hospital leadership and EMS agencies to coordinate patient movement and hospital surge capacity by sharing key equipment like ventilators and personal protective equipment (PPE).
OVERALL SIZE

Measured by the dollar volume of final sales of its products and services, the economic impact of San Antonio’s Healthcare and Bioscience Industry in 2019 totaled **$42.4 billion** by the comprehensive estimate, a 74% increase over its size a decade earlier. Using the traditional method, which is the only consistent measure available for comparisons over longer periods of time, the 2019 estimate of **$32.6 billion** is more than 4.4 times its size in 1994, some 25 years ago.

<table>
<thead>
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<tbody>
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The impact of direct Health Services is higher than that of the Related Industries, representing about 65% of the total economic impact using the comprehensive estimates.
Both sectors have experienced healthy growth in the past quarter-century. Health services have doubled in size since 2009, while the related industries have grown by 40% over the decade.
NEARLY ONE-FIFTH OF THE SAN ANTONIO WORKFORCE

In 2019, a total of 187,825 San Antonians were employed in the Healthcare and Bioscience industry. This includes 16,729 individuals not captured in the “traditional” TWC data, including uniformed military personnel and the employees of both UT Health San Antonio and the Baylor College of Medicine. Healthcare and Bioscience employees make up approximately 18% of the total regional workforce.

Of the 187,625 employed in the industry, 71% were involved in the direct provision of health and medical services; the remaining 29% were employed in related industries.

Looking at the traditional estimates for a comparison over a longer period, the 171,096 employees in the narrower definition of the industry is more than double the number working in the industry in 1994.

Since 2009, the industry has added 46,602 net new jobs, an increase of 33%. Employment in Health Services grew 34%, while Related Industries employment grew 28%, indicating strong growth all around.

UT Health San Antonio leads the world’s largest research group focused on combat–related PTSD and related conditions, with more than $150 million dedicated to 60 related research projects.

UT Health San Antonio’s Military Health Institute serves as a conduit for military-civilian information exchange, helping implement lessons from the battlefield to the civilian setting — and placing medical innovations into the hands of service members.
<table>
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<td>2019</td>
<td>171,096</td>
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A GROWING ANNUAL PAYROLL

The total annual payroll in Healthcare and Bioscience (by the comprehensive estimate) was $10.4 billion in 2019, a **60% increase** since 2009.

<table>
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<tr>
<td>2019</td>
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The San Antonio Partnership for Precision Therapeutics (SAPPT), created by the presidents of Southwest Research Institute, Texas Biomedical Research Institute, UT Health San Antonio, and UT San Antonio, is a novel generator for advanced and timely biomedical breakthroughs that accelerate the delivery of life-saving treatment options.
AN ANNUAL SALARY WELL ABOVE THE SAN ANTONIO AVERAGE

Using the comprehensive estimates, individuals employed in the Healthcare and Bioscience Industry earned, on average, **$55,242** in 2019. This is about 7% above the 2019 average of **$51,592** for all workers in San Antonio.

Annual incomes of workers in the Health Services sector averaged **$57,717**. The average salary for the Related Industries sector was **$49,185**.

These figures include only direct wage payments. Total compensation, which includes benefits, would be considerably higher.

In interpreting these averages, it is important to note that employees in the Healthcare and Bioscience sector include not only well-paid healthcare providers and scientists, but also support staff of various types. Also, since the employment figures include both full-time and part-time employees, the average salary reported here is no doubt lower than that received by a typical full-time employee.
A CLOSER LOOK AT THE TWO SECTORS
The Health Services sector continues to be larger than the Related Industries sector.

THE HEALTHCARE SERVICES SECTOR
The Health Services sector includes a wide range of healthcare professionals and businesses providing direct care to patients. Within this sector, there are six major groups: hospitals; physicians; nursing and home health services providers; other providers of health services (dentists, therapists, optometrists, chiropractors and others); ambulatory and other services; and laboratories. In San Antonio, this sector includes both civilian and military medicine, a Veterans Administration medical center and a variety of governmental, for-profit and not-for-profit operations and facilities.

Impact of Health Services in 2019 - Billions
Comprehensive Estimates

<table>
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<th>Services</th>
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<td>Hospitals</td>
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<tr>
<td>Physicians</td>
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<td>Nursing Homes</td>
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<td>Other Services</td>
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<tr>
<td>Other Providers</td>
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<tr>
<td>Labs</td>
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</table>
Physicians and Hospitals, the two largest provider groups, have consistently made a substantial contribution to the San Antonio economy. Since 2009, both have grown substantially: The economic impact of hospitals has more than doubled, and that of physicians has risen by 71%.

### Economic Impact of Physicians & Hospitals

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<tr>
<th>Year</th>
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<tr>
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<tr>
<td>2019</td>
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Crown Scientific is a non-dilutive biotech incubator specialized in therapeutics, which serves small companies that need space, equipment or guidance to complete key experiments/product validation required to move forward, including in vitro (cell biology, biomaterials, stem cells, cell therapeutics, biologics, etc.) and in vivo (small rodent animal facility) capabilities for small companies to use as needed.
The Related Industries sector incorporates a variety of businesses that support and complement the direct provision of healthcare services. The chart below shows the economic impact of some of the major industry groups in this sector. A detailed breakdown of the lines of business represented in each industry group can be found in the list of NAICS codes at the end of this report.

**Impact of Related Industries in 2019 - Billions**

Comprehensive Estimates

- Equipment: $1.12
- Insurance: $2.43
- Miscellaneous: $2.56
- Education/Research: $2.61
- Pharmaceuticals: $3.11
- Social Services: $3.13

The Education and Research sector is buoyed considerably by the inclusion of the UT Health San Antonio and military medical training employees absent from the TWC data.
INFORMATION SOURCES

The information for the “traditional” estimates presented here is derived from the Texas Workforce Commission’s Covered Employment and Wages database. The data is aggregated by the TWC into the lines of business defined by the North American Industrial Classification System (NAICS) coding framework. It represents a 100% sample of all the businesses with employees in each NAICS subcode.

The specific subcodes included in this study are listed below. They cover both the healthcare and related industry segments in great detail.

The information necessary for the inclusion of the UT Health San Antonio, the Baylor College of Medicine and the military presence in San Antonio’s medical industry was derived from data supplied by these entities from their own financial reports. Since these data are compiled for a different purpose than that reported to the TWC, using different procedures, the additional contributions attributed to these activities must be understood as approximations. Still, their impact is so great that it would be a significant understatement to exclude them.

Details of the methodology used to create the estimates reported in this study may be found on The Chamber’s website: www.sachamber.org
**NAICS CODES (AND OTHER SOURCES) FOR HEALTHCARE AND BIOSCIENCE INDUSTRIES**

### HEALTH SERVICES

**Physicians**
62111............ Offices of physicians

**Other Healthcare Providers**
62121............ Offices of dentists
62131............ Offices of chiropractors
62132 ............ Offices of optometrists
62133............ Offices of mental health practitioners
62134............ Offices of specialty therapists
62139............ Offices of all other health practitioners

**Nursing Homes/Home Health**
62161............ Home healthcare services
62311............ Nursing care facilities

**Hospitals**
62211............ General medial and surgical hospitals
62221............ Psychiatric and substance abuse hospitals
62231............ Other hospitals
62133............ Offices of mental health practitioners

MTF ............. U. S. Department of Defense inpatient Medical Treatment Facilities – uniformed military (civilian employees included in 62211)

**Labs**
62151............ Medical and diagnostic laboratories

**Other Direct Services**
62191............ Ambulance services
62199............ All other ambulatory healthcare services

MTF ............. U. S. Department of Defense inpatient Medical Treatment Facilities – uniformed military (civilian employees included in 62199)
RELATED INDUSTRIES

Research & Education
54171 - Physical engineering and biological research
UTHSCSA - University of Texas Health Science Center at San Antonio
METC - Joint military medical education and training facilities
AMEDDC&S - Army medical education and training facilities
MIL RSCH - Military Medical Research
BAYLOR - Baylor College of Medicine operations at Children's Hospital of SA

Social Services
62141.......... Family planning centers
62142 .......... Outpatient mental health and substance abuse centers
62149.......... Other outpatient care centers
62321.......... Residential mental retardation facilities
62322.......... Residential mental health and substance abuse facilities
6233 .......... Community care facilities for the elderly
62399.......... Other residential care facilities
62412 .......... Services for the elderly and disabled
62431 .......... Vocational rehabilitation services

Pharmaceuticals
32541.......... Pharmaceutical and medicine manufacturing
42421.......... Druggists' goods merchant wholesalers

Equipment Manufacturing & Wholesaling
33911.......... Medical equipment and supplies manufacturing
42345 .......... Medical equipment merchant wholesalers
42346 .......... Ophthalmic goods merchant wholesalers

Insurance
524114.......... Direct health and medical insurance carriers

Miscellaneous
44611.......... Pharmacies and drug stores
44613 .......... Optical goods stores
44619 .......... Other health and personal care stores
92313 .......... Administration of public health programs