Data Science, BS

LADATSCIBS

Are you curious about how data can be used to solve real-world issues? This program gives you the tools to become a critical analyst of data in business, research and government. Gain a strong background in data-related skills, in preparation for a dynamic career.

Program Description

Modern science and technology use sophisticated mathematical and computational tools to extract patterns from large, complex and often unordered data sets. Machine learning and data mining are invaluable technologies with applications as diverse as detecting fraudulent online credit-card transactions, understanding the dynamics of social movements, and personalizing medical treatments based on a tumor's unique genetic profile.

The BS degree program in data science prepares students to be critical analysts and users of data in a variety of areas such as business, research and government. This transdisciplinary program allows students to choose a focus area from a variety of fields to center their understanding of data science. With a mathematical core consisting of linear algebra, statistical inference and classification, data mining, machine learning and associated computer methods, students leave the program with a strong background in data-related skills that are useful in solving real-world issues.

At a Glance

- College/School: The College of Liberal Arts and Sciences
- Location: Tempe campus or online, ASU Local@Los Angeles
- Additional Program Fee: Yes
- Second Language Requirement: No
- **First Required Math Course**: MAT 270 - Calculus w/Analytic Geometry I or MAT 265 Calculus for Engineers I
- **Math Intensity**: Substantial

**Required Courses (Major Map)**

- 2021 - 2022 Major Map (On-campus)
- 2021 - 2022 Major Map (Online)
- Major Map (Archives)

**Admission Requirements**

**General University Admission Requirements:**

All students are required to meet general university admission requirements. [Freshman](#) | [Transfer](#) | [International](#) | [Readmission](#)

**Change of Major Requirements**

A current ASU student has no additional requirements for changing majors.

Students should refer to [https://changemajor.apps.asu.edu](https://changemajor.apps.asu.edu) for information about how to change a major to this program.

**Attend Online**

ASU offers this program in an online format with multiple enrollment sessions throughout the year. Applicants may view the program description and request more information [here](#).

**Transfer Options**

ASU is committed to helping students thrive by offering tools that allow personalization of the transfer path to ASU. Students may use [MyPath2ASU™](#) to outline a list of recommended courses to take prior to transfer.

ASU has transfer partnerships in Arizona and across the country to create a simplified transfer experience for students. These pathway programs include exclusive benefits, tools and resources, and help students save time and money in their college journey. Students may learn more about these programs by visiting the admission site: [https://admission.asu.edu/transfer/pathway-programs](https://admission.asu.edu/transfer/pathway-programs).

**Global Opportunities**

**Global Experience**
With over 250 programs in more than 65 countries (programs vary in length, from one week to one year), study abroad is possible for all ASU students wishing to gain a global perspective and knowledge in preparation for a 21st century career. Students earn ASU credit for completed courses, while staying on track for graduation, and may apply financial aid and scholarships toward program costs.

https://goglobal.asu.edu/

Career Opportunities

Glassdoor.com ranks data scientist as third in the top 50 Best Jobs in America. It reports that the average annual salary in 2020 for data scientists was $107,801. The McKinsey Global Institute projects a shortage of qualified workers with deep analytical skills.

In the data science program, students learn skills related to data analysis, data prediction models and ethical uses of research data, helping them prepare to meet the expressed needs of society.

Graduates of this program work in a variety of fields such as governmental research, education, health services and business. From predicting consumer behavior to extracting information from medical images, graduates are ready for a dynamic career that inspires global change.

Career examples include but are not limited to those shown in the following list. Advanced degrees or certifications may be required for academic or clinical positions.

<table>
<thead>
<tr>
<th>Career</th>
<th>*Growth</th>
<th>*Median Salary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Geologist</td>
<td>4.9%</td>
<td>$93,580</td>
</tr>
<tr>
<td>Neuropsychologist</td>
<td>2.3%</td>
<td>$105,780</td>
</tr>
<tr>
<td>Scientist/Biochemist</td>
<td>4.0%</td>
<td>$94,270</td>
</tr>
<tr>
<td>Software Developer</td>
<td>*</td>
<td>not available</td>
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<tr>
<td>Statistician</td>
<td>34.6%</td>
<td>$92,270</td>
</tr>
</tbody>
</table>

* Data obtained from the Occupational Information Network (O*NET) under sponsorship of the U.S. Department of Labor/Employment and Training Administration (USDOL/ETA).

Bright Outlook  Green Occupation

Contact Information

Schedule an advisor appointment
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