

	Most commonly used tools	Possible Job Titles	Beginner Skill Level	Intermediate Skill Level	Advanced Skill Level	Yearly Salary Range*	Learn on DataCamp	Get Hired on DataCamp Jobs*
<h3>Data Consumers</h3> <p>Data consumers use data to make data-driven decisions, and actively have informed conversations with data practitioners.</p>	<b>Business Intelligence tools</b> Tableau or Power BI  <b>Spreadsheets</b> Excel or Google Sheets	<ol style="list-style-type: none"> <li>Chief Marketing Officer</li> <li>Human Resources Manager</li> <li>Head of Sales and Business Development</li> </ol>	<ol style="list-style-type: none"> <li>Understands what data scientists, machine learning scientists, and data engineers do</li> <li>Knows which questions can (and can't) be answered with data</li> <li>Interpret the results of data projects, including calculations and visualizations.</li> </ol>	<ol style="list-style-type: none"> <li>Is able to calculate descriptive statistics</li> <li>Can draw common data visualizations</li> <li>Understands the business applications of data</li> </ol>	<ol style="list-style-type: none"> <li>Has a strong grasp of the fundamentals of business intelligence</li> </ol>	<p>NA</p>	<b>SKILL TRACKS</b> <a href="#">Data Literacy Fundamentals</a> <a href="#">Data Skills for Business</a> <b>COURSES</b> <a href="#">Introduction to Power BI</a> <a href="#">Introduction to Tableau</a>	<div>Coming soon</div>
<h3>Business Analysts</h3> <p>Business Analysts are responsible for tying data insights to actionable results that increase profitability or efficiency. They have deep knowledge of the business domain and often use SQL alongside non-coding tools to communicate insights derived from data.</p>	<b>Business Intelligence tools</b> Tableau or Power BI  <b>Databases</b> SQL  <b>Spreadsheets</b> Excel or Google Sheets	<ol style="list-style-type: none"> <li>Business Analyst</li> <li>Marketing Analyst</li> <li>Data Analyst</li> <li>Supply Chain Analyst</li> </ol>	<ol style="list-style-type: none"> <li>Is able to calculate descriptive statistics</li> <li>Can draw common data visualizations</li> <li>Understands the business applications of data</li> </ol>	<ol style="list-style-type: none"> <li>Has a deep knowledge of the business domain</li> <li>Is able to report and communicate using data</li> </ol>	<ol style="list-style-type: none"> <li>Can create dashboards</li> <li>Organizes data to solve business questions</li> </ol>	<p>77K</p> <p>55K Average 108K</p>	<b>SKILL TRACKS</b> <a href="#">Intermediate Spreadsheets</a> <a href="#">Tableau Fundamentals</a> <a href="#">SQL for Business Analysts</a> <b>CAREER TRACKS</b> <a href="#">Data Analyst with Power BI</a> <b>COURSES</b> <a href="#">Analyzing Business Data with SQL</a>	<div>User Interviews</div> <div>Business Analyst</div>
<h3>Data Analysts</h3> <p>Similar to Business Analysts, Data Analysts are responsible for analyzing data and reporting insights from their analysis. They have a deep understanding of the data analysis workflow and report their insights through a combination of coding and non-coding tools.</p>	<b>Programming languages</b> R or Python  <b>Business Intelligence tools</b> Tableau or Power BI  <b>Databases</b> SQL  <b>Spreadsheets</b> Excel or Google Sheets	<ol style="list-style-type: none"> <li>Business Analyst</li> <li>Marketing Analyst</li> <li>Data Analyst</li> <li>Supply Chain Analyst</li> </ol>	<ol style="list-style-type: none"> <li>Is able to calculate descriptive statistics</li> <li>Can draw common data visualizations</li> <li>Understands the business applications of data</li> </ol>	<ol style="list-style-type: none"> <li>Perform the data analysis workflows, including importing, manipulating, cleaning, calculating, and reporting on business data</li> <li>Has a strong grasp of business intelligence tools</li> </ol>	<ol style="list-style-type: none"> <li>Can create dashboards</li> <li>Organizes data to solve business questions</li> </ol>	<p>69K</p> <p>46K Average 106K</p>	<b>SKILL TRACKS</b> <a href="#">Tableau Fundamentals</a> <b>CAREER TRACKS</b> <a href="#">Data Analyst with Python</a> <a href="#">Data Analyst with R</a> <a href="#">Data Analyst with SQL</a> <a href="#">Data Analyst with Power BI</a>	<div>Smartsheet</div> <div>Data Analyst - Demand Generation</div>
<h3>Data Scientists</h3> <p>Data Scientists investigate, extract, and report meaningful insights in the organization's data. They communicate these insights to nontechnical stakeholders and have a good understanding of machine learning workflows and how to tie them back to business applications. They work almost exclusively with coding tools, conduct analysis, and often work with big data tools</p>	<b>Programming languages</b> R or Python  <b>Databases</b> SQL  <b>Command line tools</b> Git or Bash  <b>Big data tools</b> Airflow or Spark	<ol style="list-style-type: none"> <li>Data Scientist</li> <li>Analytics Engineer</li> <li>Data Analyst</li> </ol>	<ol style="list-style-type: none"> <li>Perform the data analysis workflows, including importing, manipulating, cleaning, calculating, and reporting on business data</li> <li>Understands the business applications of data</li> </ol>	<ol style="list-style-type: none"> <li>Understands fundamental statistics, including distributions, modeling, and inference</li> <li>Designing simple experiments such as A/B tests</li> <li>Can create dashboards</li> </ol>	<ol style="list-style-type: none"> <li>Applies analysis to business applications such as finance, marketing, and healthcare</li> <li>Understands supervised and unsupervised machine learning workflows</li> <li>Work with non-standard data types, such as time series, text, geospatial, and images.</li> </ol>	<p>117K</p> <p>82K Average 167K</p>	<b>CAREER TRACKS</b> <a href="#">Data Scientist with Python</a> <a href="#">Data Scientist with R</a>	<div>Twilio</div> <div>Product Data Scientist</div>
<h3>Machine Learning Scientists</h3> <p>Machine Learning Scientists design and deploy machine learning systems that make predictions from the organization's data. They solve problems like predicting customer churn and lifetime value and are responsible for deploying models for the organization to use. They work exclusively with coding-based tools.</p>	<b>Programming languages</b> R or Python  <b>Databases</b> SQL  <b>Big data tools</b> Airflow or Spark  <b>Command line tools</b> Git or Bash	<ol style="list-style-type: none"> <li>Data Scientist</li> <li>Research Scientist</li> <li>Machine Learning Engineer</li> </ol>	<ol style="list-style-type: none"> <li>Perform the data analysis workflows, including importing, manipulating, cleaning, calculating, and reporting on business data</li> </ol>	<ol style="list-style-type: none"> <li>Performing supervised and unsupervised machine learning workflows including feature engineering, training models, testing goodness of fit, making predictions</li> <li>Applies analysis to business applications such as finance, marketing, and healthcare</li> </ol>	<ol style="list-style-type: none"> <li>Perform deep learning workflows</li> <li>Work with non-standard data types, such as time series, text, geospatial, and images</li> <li>Deploy machine learning models in production</li> </ol>	<p>137K</p> <p>97K Average 194K</p>	<b>SKILL TRACKS</b> <a href="#">Deep Learning for NLP in Python</a> <a href="#">Image Processing in Python</a> <b>CAREER TRACKS</b> <a href="#">Machine Learning Scientist with Python</a> <a href="#">Machine Learning Scientist with R</a>	<div>Twilio</div> <div>Data Scientist, Applied Research, Personalization</div>
<h3>Statisticians</h3> <p>Similar to Data Scientists, Statisticians work on highly rigorous analysis, which involves designing and maintaining experiments such as A/B tests and hypothesis testing. They focus on quantifying uncertainty and presenting findings that require exceptional degrees of rigor, like in finance or healthcare</p>	<b>Programming languages</b> R Python Scala  <b>Databases</b> SQL	<ol style="list-style-type: none"> <li>Quantitative Analyst</li> <li>Inference Data Scientist</li> <li>Clinical Data Analyst</li> </ol>	<ol style="list-style-type: none"> <li>Perform the data analysis workflows, including importing, manipulating, cleaning, calculating, and reporting on business data</li> <li>Understands the business applications of data</li> </ol>	<ol style="list-style-type: none"> <li>Perform statistical modeling workflows, including feature engineering, training models, testing goodness of fit, and inferring significance</li> <li>Test hypotheses and design simple experiments such as A/B tests</li> </ol>	<ol style="list-style-type: none"> <li>Design more complex experiments and understand Bayesian statistics</li> <li>Understand specialist models, such as survival models, generalized additive models, mixture models, structural equation models</li> </ol>	<p>89K</p> <p>61K Average 131K</p>	<b>SKILL TRACKS</b> <a href="#">Applied Finance in Python</a> <a href="#">Statistics Fundamentals with R</a> <b>CAREER TRACKS</b> <a href="#">Statistician with R</a> <a href="#">Quantitative Analyst with R</a>	<div>Brainbridge Health</div> <div>Clinical Data Analyst</div>
<h3>Programmers</h3> <p>Programmers are highly technical individuals that work on data teams and work on automating repetitive tasks when accessing and working with an organization's data. They bridge the gap between traditional software engineering and data science and have a thorough understanding of deploying and sharing code at scale.</p>	<b>Programming languages</b> R Python Scala  <b>Databases</b> SQL  <b>Command line tools</b> Git or Shell	<ol style="list-style-type: none"> <li>Software Engineer</li> <li>Data Scientist</li> <li>Dev-Ops Engineer</li> </ol>	<ol style="list-style-type: none"> <li>Write functions to avoid repetitive code</li> <li>Benchmark and optimize code to improve performance</li> </ol>	<ol style="list-style-type: none"> <li>Develop best practices for testing code</li> <li>Work with web APIs</li> <li>Develop packages for sharing code</li> </ol>	<ol style="list-style-type: none"> <li>Develop data pipelines and work with parallel programming</li> <li>Understanding programming paradigms, such as functional programming and object-oriented programming</li> </ol>	<p>108K</p> <p>75K Average 160K</p>	<b>COURSES</b> <a href="#">Unit Testing for Data Science in Python</a> <b>CAREER TRACKS</b> <a href="#">Python Programmer</a> <a href="#">R Programmer</a>	<div>Coming soon</div>
<h3>Data Engineers</h3> <p>Data Engineers are responsible for getting the right data in the hands of the right people. They create and maintain the infrastructure and data pipelines that take terabytes of raw data coming from different sources into one centralized location with clean, relevant data for the organization.</p>	<b>Programming languages</b> R Python Scala  <b>Databases</b> SQL  <b>Command line tools</b> Git or Shell  <b>Big data tools</b> Airflow or Spark  <b>Cloud platforms</b> AWS GCP Azure	<ol style="list-style-type: none"> <li>Data Engineer</li> <li>Software Engineer</li> <li>Dev-Ops Engineer</li> </ol>	<ol style="list-style-type: none"> <li>Efficiently extract, transform, and load data</li> </ol>	<ol style="list-style-type: none"> <li>Process data and automate data flows using the command line</li> <li>Process data in the cloud</li> </ol>	<ol style="list-style-type: none"> <li>Manage, optimize and process big datasets and large databases</li> </ol>	<p>112K</p> <p>76K Average 166K</p>	<b>CAREER TRACKS</b> <a href="#">Data Engineer with Python</a> <b>SKILL TRACKS</b> <a href="#">SQL Server for Database Administrators</a>	<div>Coming soon</div>

\* Salary data sourced in USD from Glassdoor in the USA \* At the time of publishing, DataCamp Jobs provides access to data scientist and data analyst roles, with support for more roles coming in the future