

# Hadoop Administrator Course

100% Assurance to Get HDP Administrator certification

## Course Overview

This 40 hours Instructor lead training course is aimed at aspiring administrators to teach big data fundamentals and administration of Apache Hadoop cluster using Apache ecosystem tools like **Ambari**, **Knox** and **Ranger**. This course is designed for administrators who will be managing the Hadoop Platform (HDP) and services for the big data cluster. This course covers installation, configuration, and other typical cluster maintenance tasks.

Students will learn the details of Hadoop, YARN, the Hadoop Distributed File System (HDFS), MapReduce, and dive deep into HDP concepts like – configuration and deployment, troubleshooting, High Availability (HA), Security and Operations.

This training course is the best suited for certification aspirants (HDP/CCA Administrator certifications) and preparing Hadoop administrators for real-world challenges.

## Prerequisites

Students should be familiar with any programming language or scripting. SQL and basic Unix knowledge is helpful but not necessary. No prior Hadoop knowledge or experience is required.

## Course Outline

<p><b>Big Data Overview</b></p> <p><b>Introduction to Apache Hadoop</b></p> <ul style="list-style-type: none"> <li>Hadoop Overview</li> <li>Hadoop ecosystem projects overview</li> </ul> <p><b>Apache Hadoop file storage</b></p> <ul style="list-style-type: none"> <li>HDFS overview</li> <li>HDFS Architecture</li> </ul> <p><b>Apache Hadoop Data Processing framework</b></p> <ul style="list-style-type: none"> <li>MapReduce Overview</li> <li>MapReduce Architecture</li> <li>YARN overview</li> <li>YARN Architecture</li> <li>Demo on MapReduce Jobs</li> </ul> <p><b>Hadoop Installation using Ambari</b></p> <p><u>Apache Ambari</u></p> <ul style="list-style-type: none"> <li>Ambari Overview</li> <li>Configure a local HDP repository</li> <li>Install Ambari-server &amp; Ambari-agent</li> <li>Hadoop cluster Architecture overview</li> <li>Hadoop Data platform (HDP)</li> <li>Cluster Expansion and Maintenance</li> <li>Introducing new services in cluster</li> </ul>	<p><b>Hadoop Configuration</b></p> <ul style="list-style-type: none"> <li>Rack topology – Definition and Deployment</li> <li>Hadoop service configuration</li> <li>User permissions</li> <li>DataNode files configuration</li> </ul> <p><b>Troubleshooting</b></p> <ul style="list-style-type: none"> <li>How to Restarting Hadoop services</li> <li>Reading Service Logfiles</li> <li>How to configure and manage alerts</li> <li>Troubleshoot a failed job</li> </ul> <p><b>High Availability</b></p> <ul style="list-style-type: none"> <li>Setup HDFS high availability</li> <li>Setup YARN high availability</li> <li>Setup Hive Server2 high availability</li> </ul> <p><b>Security</b></p> <p><u>Apache Knox</u></p> <ul style="list-style-type: none"> <li>Knox Overview</li> </ul> <p><u>Apache Ranger</u></p> <ul style="list-style-type: none"> <li>Ranger overview</li> <li>Installation and Demonstration Lab</li> </ul> <p><b>Operations</b></p> <ul style="list-style-type: none"> <li>Access control Overview and Setup</li> <li>Snapshot overview</li> <li>Demonstration Lab</li> </ul>
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## Course Duration

40 hours (20 hours theory and concepts; 20 hours practical labs and demos)

This course is spread over 4 weekends (Saturday and Sunday)

## Cost

CAD 2,450 or USD 1,860 (includes taxes)

The costs include the training, material and cloud based lab costs.

Note: Please enquire with us for ongoing promotions, group and early bird prices.

## Registration and Enquiries

For registration and any other enquiries, please contact Big Data School at [info@bigdataschool.ca](mailto:info@bigdataschool.ca) or call us on **+1 647 948 9595**.

Visit us on [www.bigdataschool.ca](http://www.bigdataschool.ca)

### About us

We are a team of independent consultants offering Big Data consulting and transformation solutions. With an average Industry experience of over 15 years and currently working on several cutting-edge technology projects on Big Data, we have extensive experience in Big data projects across several industries such as Information Technology, Telecommunications, Finance, Insurance, Healthcare, Automobile, Energy etc.

We are experienced and certified Big data corporate trainers providing Industry-standard training to several industry leaders.

### Course design philosophy

We want to bring corporate quality and industry standard training to individuals seeking a career in Big Data.

Our courses are modelled based on extensive industry experience and cater to current Industry needs to provide relevant practical experience and real-time working knowledge. Our elite courses cover core concepts in Big data as offered by corporate solution partners-Horton Works, Cloudera and Pivotal.

For those looking to certify, the course has been designed specifically to help take the certification examination with ease. Also, the courses are designed with an ideal theory to practical ratio of 50:50, ensuring learning conceptual knowledge backed by practical applicable skills suited to make you an individual contributor at work from the first day.

The courses are delivered by professional trainers who offer corporate trainings to companies, and are working as consultants and architects on big data projects.