# Progress Report - Bytewise limited

Submitted by:

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#### **Table of Content**

#### Learning

#### **Achievements**

- HackerRank
- Databricks
- Microsoft

#### Courses

- DatabricksAzure

  - **AWS**

#### **Sessions + Tools** Sessions + Tools and technology

- Azure Databricks
- **AWS**

# **Learning Progress**

**Learning Progress throughout three months** 

# **Learning Week 1 - 2**

Week	Topic	Learning
1	SQL (Basic to Advance)	<ul> <li>SQL Functions (multiple SQL functions built-in and advanced)</li> <li>Joins &amp; Unions in SQL</li> <li>SQL Group By &amp; Sum Over()</li> <li>DML, DQL and DDL, sub-queries, Views &amp; stored Procedures</li> <li>UDF (user defined functions) in SQL.</li> </ul>
2	Data Engineering concepts (basics to advance)	<ul> <li>Data Engineering basics, End-to-end architecture</li> <li>Role of a Data Engineer</li> <li>Data Warehouse, Data Lakes, and Delta lakes</li> <li>Bronze / Silver / Gold layers</li> <li>ETL tools</li> <li>Data Staging layer, Data Curation layer, Data presentation layer</li> </ul>

### **Learning Week 3 - 6**

Week	Topic	Learning
3	Udemy Databricks Course	<ul> <li>Azure Databricks</li> <li>Databricks Clusters, Notebooks</li> <li>Mounting Data Lake Container to Databricks</li> <li>Spark Cluster</li> <li>Data Ingestion – CSV, JSON, Multiple files</li> <li>Practical implementation</li> </ul>
4	Udemy Databricks Course	<ul> <li>Databricks Workflows</li> <li>Filter &amp; Join Transformations</li> <li>Aggregation</li> <li>Spark SQL – Database, Tables, Views, Filters, Joins, Aggregations, Analysis</li> </ul>

### **Learning Week 5 - 6**

Week	Topic Learning	
5	Databricks	<ul> <li>Databricks Machine Learning - completion Certificate</li> <li>Databricks Lakehouse Platform - Completion Certificate</li> <li>Databricks SQL - completion Certificate</li> <li>Databricks Accredited Lakehouse Fundamentals - Certificate</li> </ul>
6	Slowly changing dimensions	<ul> <li>Slowly changing dimensions (SCD)</li> <li>Types of SCD</li> <li>Change data capture (CDC)</li> <li>Implementations of SCD solution</li> </ul>

# **Learning Week 7 - 8**

Week	Topic	Learning
7	AWS Course videos	<ul> <li>AWS Certified Cloud Practitioner Training 2020 - Full Course</li> <li>Registration for Azure certification</li> <li>Working with AWS Glue Studio</li> </ul>
8	AWS practical implementation	<ul> <li>AWS account creation</li> <li>Ingest Data to s3 bucket</li> <li>ETL on data stored in s3</li> <li>concepts of Glue Studio</li> <li>HackerRank SQL (Basic and intermediate Level) Certificates</li> </ul>

# **Learning Week 9 - 10**

Week	Topic	Learning
9	AWS Glue Services	<ul> <li>ETL using Glue.</li> <li>Custom SQL transformation</li> <li>Job using Multiple Source and its transformation using join</li> <li>Azure Fundamentals Session Day 1 and Day 2</li> </ul>
10	Azure Sessions	<ul> <li>Azure Data Fundamentals Session Day 1 and Day 2</li> <li>Databricks Platform Administrator Accreditation Session</li> <li>Az-900 Course</li> </ul>

# **Learning Week 11 - 12**

Week	Topic
11	Microsoft Certified-Azure Fundamentals
12	Microsoft Certified-Azure Data Fundamentals

# **Achievements**

**Achievements throughout three months** 

#### **Achievements**

- Data Lakehouse Fundamentals Certificate
- HackerRank SQL Basic Level Certificate
- HackerRank SQL intermediate Level Certificate
- Microsoft Certified-Azure Fundamentals
- Microsoft Certified-Azure Data Fundamentals

# Sessions + Tools and technology

**Sessions throughout three months** 

#### **Sessions**

- Microsoft Azure Virtual Training: Data Fundamentals (2 day session)
- Microsoft Azure Virtual Training: Fundamentals (2 day session)
- Databricks Platform Administrator ILT Training

#### **Technology and Tools**

- SQL
- Spark
- Azure Databricks
- AWS + AWS Glue

#### **Courses**

**Courses throughout three months** 

#### **Courses**

- Azure Databricks for Data Engineers Udemy
- Databricks Machine Learning completion Certificate
- Databricks Lakehouse Platform Completion Certificate
- Databricks SQL completion Certificate
- Databricks Accredited Lakehouse Fundamentals Certificate
- Microsoft Azure Fundamentals (AZ-900) Full Course Adam Marczak -Azure for Everyone
- AWS Certified Cloud Practitioner Training 2020 Full Course

# **Thank You!**