**Assignment No 1:**

Title: Study the Google Cloud Platform.

Theory: link (<https://cloud.google.com/docs>) (<https://www.youtube.com/playlist?list=PLIivdWyY5sqIUkH9XhgMkAOyIwCN4H0As>)

**What Is Cloud Computing?**

[Cloud computing](https://intellipaat.com/blog/tutorial/amazon-web-services-aws-tutorial/definition-of-cloud-computing/), in simple words, is accessing and storing data over the Internet instead of doing it on your personal hard drive.

It offers services like [storage](https://intellipaat.com/blog/tutorial/amazon-web-services-aws-tutorial/storage-and-content-delivery/), database, networking, and more over the Internet to provide faster, innovative, and flexible resources to its customers. The customers get to pay only for the resources they use, hence helping them lower their operating costs and run their business infrastructure more efficiently.

Now, among various cloud providers like AWS, Microsoft, VMWare, IBM, etc., Google Cloud has been the talk of the town in recent years and there are enough reasons behind it. Let’s begin with starters and understand what Google Cloud is.

***Here is a blog on ‘***[***What is cloud computing***](https://intellipaat.com/blog/what-is-cloud-computing/)***‘.***

**What Is Google Cloud Platform?**

Google Cloud is a suite of Cloud Computing services offered by Google. The platform provides various services like compute, storage, networking, [Big Data](https://intellipaat.com/blog/tutorial/big-data-and-hadoop-tutorial/), and many more that run on the same infrastructure that Google uses internally for its end users like Google Search and YouTube.

Google server hasn’t gone down in years. So, if you are planning to run your application on the Google Cloud infrastructure, then you can be assured of your applications being safe and secure.

# About Google Cloud services (<https://cloud.google.com/docs/overview/cloud-platform-services>)

This overview introduces some of the commonly used Google Cloud services. For the full list of services, see the [Products and services page](https://cloud.google.com/products).

This overview covers the following types of services:

* [Computing and hosting](https://cloud.google.com/docs/overview/cloud-platform-services#computing-hosting)
* [Storage](https://cloud.google.com/docs/overview/cloud-platform-services#storage)
* [Databases](https://cloud.google.com/docs/overview/cloud-platform-services#databases)
* [Networking](https://cloud.google.com/docs/overview/cloud-platform-services#networking)
* [Big data](https://cloud.google.com/docs/overview/cloud-platform-services#big-data)
* [Machine learning](https://cloud.google.com/docs/overview/cloud-platform-services#machine-learning)

OUT of Google Product you have to study 3 services in detail:

* 1. Compute (<https://cloud.google.com/docs#section-7>)
     1. In compute write detail steps of how to create a Linux virtual machine instance in Compute Engine using the Google Cloud Console. ( Reference: <https://cloud.google.com/compute/docs/quickstart-linux> )

(Please add material here)

* + 1. Write detail steps for Deploy a simple Apache web server to learn the basics of running a server on a virtual machine instance. (Reference: <https://cloud.google.com/compute/docs/tutorials/basic-webserver-apache>)

(Please add material here)

# Google App Engine (Ref: <https://cloud.google.com/appengine/docs>)

(Please add material here)

* 1. Firebase database service (<https://firebase.google.com/docs/database/>)

(Please add material here)

Anything you want to add related to GCP.