# TNGS Learning Solutions INTRODUCTION TO CLOUD COMPUTING

# INTRODUCTION TO CLOUD COMPUTING

- What is Cloud computing?
- Why Cloud Computing?
- What are benefits of Cloud Computing?
- What are the disadvantages of Cloud Computing?

## **Definition of Cloud Computing**

- **Information technology** (**IT**) is the use of any computers, storage, networking and other devices, infrastructure and processes to create, process, store, secure and exchange all forms of electronic data.
- Cloud computing is the on-demand delivery of IT resources and applications through internet with pay-asyou-go pricing model.
- Whether you run applications or deliver services that support the critical operations of your business, the cloud provides rapid access to flexible and low-cost IT resources.
- With cloud computing, you don't need to make large upfront investments in hardware/software and spend a lot of time managing that resources.

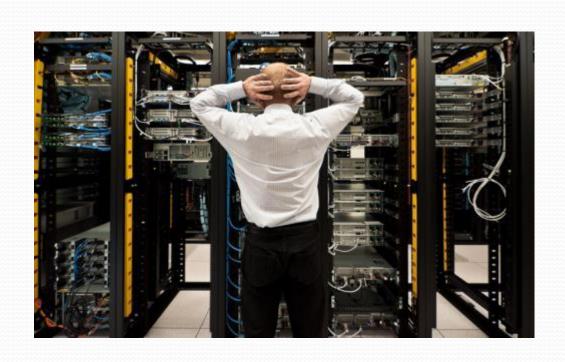
## **Definition of Cloud Computing**

The practice of using a network of remote servers hosted on the internet to store, manage, and process data, rather than a local server or a personal computer.

#### **On-Premises Data Center**



# We don't want to manage physical servers – Let's move to the cloud!



## **Cloud Computing Cont.....**

- Cloud computing provides an easy way to access servers, storage, databases, and a broad set of application services over the internet.
- Cloud computing providers such as AWS owns and maintain the network-connected hardware required for those application services, while you provision and use what you need for your workloads.

#### WHY CLOUD COMPUTING?

- Many businesses large and small use cloud computing today either directly (e.g. Google or Amazon) or indirectly (e.g. Twitter) instead of traditional on-site alternatives.
  - Reduction of costs
  - Universal access
  - Up to date software
  - Choice of applications
  - Potential to be greener and more economical
  - Flexibility

#### BENEFITS OF CLOUD COMPUTING

- Faster Deployments:
  - Because there's no wait for local computing resources
- Usage-based pricing:
  - Letting you pay only for what you use
- Less financial risk:
  - With lower up-front investment in hardware and software
- Easier upgrades:
  - With no on-premises software to update
- Reduced need for on-premises resources:
  - such as servers and IT staff

# DISADVANTAGES OF CLOUD COMPUTING

#### • Security Issues:

- Security is the major issue in cloud computing.
- The cloud services implement the best security standards and industry certifications.
  - However, storing data on an external service providers always bears a risk.

#### • Technical Issues:

 You always need to rely on the internet to uploading/downloading and migrating.