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Platform-as-a-Service (PaaS)

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Overview

Platform-as-a-Service (PaaS) is an environment in the Cloud with all the resources you need for development or deployment of Cloud-based applications.

Description

The resources are purchased on pay-as-you go basis, where access to them is granted through a secure internet connection.

PaaS is mainly targeted at developers.

PaaS is a stage above **Infrastructure-as-a-Service (IaaS)** - it includes all *IaaS* services with the addition of:

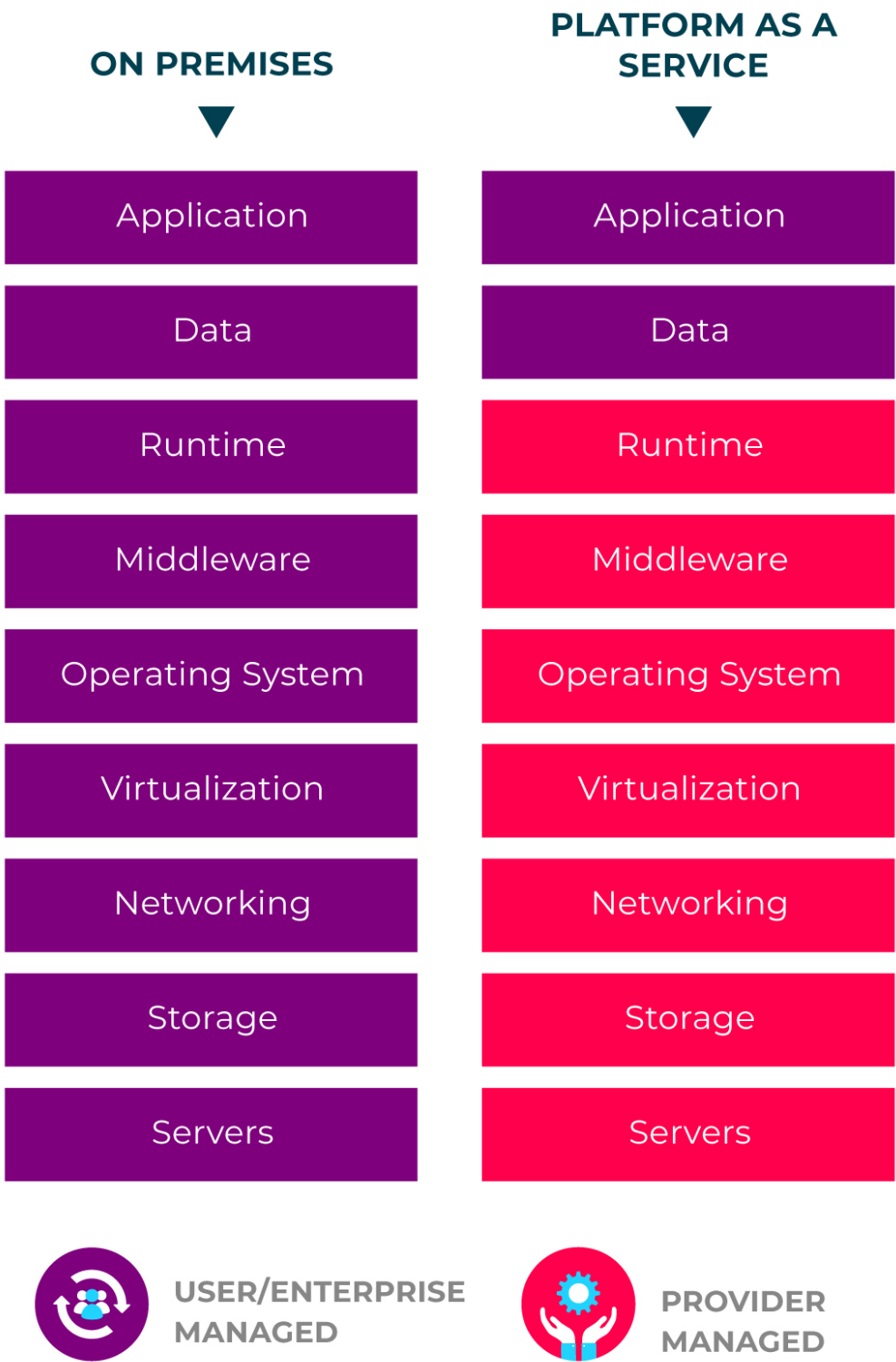
- middleware
- development tools
- business intelligence services
- database management systems

With *PaaS* you would avoid the hassle of paying for and managing:

- software licenses
- application infrastructure
- middleware
- container orchestration
- development tools

The applications and services that are being developed remain the responsibility of the user, while everything else is the responsibility of the Cloud provider.

<input checked="" type="radio"/> Infrastructure-as-a-Service (IaaS)
<input checked="" type="radio"/> Platform-as-a-Service (PaaS)
<input type="radio"/> Software-as-a-Service (SaaS)
<input type="radio"/> Public Cloud
<input type="radio"/> Private Cloud
<input type="radio"/> Hybrid Cloud
<input type="radio"/> Regions and Availability zones
AWS Foundations
AWS Intermediate
Linux
DevOps
Jenkins Introduction
Jenkins Pipeline
Markdown
IDE Cheatsheet



Business scenarios

Typical use case scenarios for *PaaS* are:

- **development framework** - a framework is provided for the development of Cloud applications. Applications can be created through the built in software components. Features such as: scalability, multi-tenancy, and high-availability are included and managed by PaaS.
- **business intelligence and analytics** - tools are provided for data mining, finding patterns, investment returns and for many more business related needs.
- **additional services** - additionally there are services that provide advice in regards to networking, security, scheduling, etc.

Advantages

As **PaaS** is built on top of *IaaS* it offers all of the advantages of the latter, as well as several of its own:

- improving coding efficiency through the use of in-built tools
- development options for multiple platforms
- sophisticated tools for development, business intelligence and analytics through the pay-as-you go model allows for even the smallest companies to utilise them and therefore save time
- remote teamwork is available, as all the resources are accessible over the internet
- all the capabilities which exist in a typical development environment lifecycle are included - namely building, testing, and deployment

Tutorial

Try answering the following questions:

- ▶ PaaS is aimed at what job role?
- ▶ What are your responsibilities when using PaaS?

Exercises

There are no exercises for this module.