Empowering Your Digital Transformation
Microsoft, Cloud and Open Source

Open Source Software 전략 총괄
한국마이크로소프트 최주열 이사
Microsoft + Open Source Momentum

- SQL Server on Linux (Preview today, GA in mid-2017)
- Red Hat - Microsoft Partnership (Nov 2015)
- HD Insight PaaS on Linux GA (Sep 2015)
- Microsoft joins Eclipse Foundation (Mar 2016)

In partnership with the Linux Foundation, Microsoft releases the Microsoft Certified Solutions Associate (MCSA) Linux on Azure certification.

- Ross Gardler: President Apache Software Foundation
- Wim Coekaerts: Oracle’s Mr Linux

Azure Marketplace

- 60% of all images in Azure Marketplace are based on Linux/OSS

Windows Subsystem for Linux

- Run Linux on Windows natively (March 2016)

C:\Users\markhill> bash
root@localhost: #

1 out of 4 VMs on Azure runs Linux, and getting larger every day
- 28.9% of all VMs are Linux
- >50% of new VMs

493,141,677

Microsoft Open Source Hub
Our Open Source Strategy

1. Meet where customers are

2. Deliver the most productive and trustworthy cloud services platform that enables developers using any framework on any device or OS to create and power the world's apps and services that run anywhere

3. Best cloud platform for partners to succeed
Any app, language, device or OS works with Azure

One in Four VMs on Azure
Run Linux Today!
(>50% of new VMs)
1. **Red Hat solutions available natively to Microsoft Azure customers**
   - Through Red Hat Cloud Access subscription mobility or
   - Red Hat Enterprise Linux images On-Demand (pay-as-you-go) available in the Azure Marketplace
   - Red Hat Enterprise Linux Virtual Machines, and
   - Red Hat JBoss Enterprise Application Platform; Red Hat JBoss Web Server; Red Hat Gluster Storage; OpenShift (Red Hat PaaS)

2. **Management tooling integration across hybrid cloud deployments**

3. **Microsoft Windows supported on Red Hat Enterprise Linux OpenStack Platform and Red Hat Enterprise Virtualization**

4. **Microsoft .NET integration and availability with Red Hat Enterprise Linux**

5. **Integrated enterprise-grade support: Co-location of support teams (unique to MS)
Cloud is a new way to think about your datacenter

**Traditional model**
- Dedicated infrastructure for each application
- Purpose-built hardware
- Distinct infrastructure and operations teams
- Customized processes and configurations

**Cloud model**
- Loosely coupled apps and micro-services
- Industry-standard hardware
- Service-focused DevOps teams
- Standardized processes and configurations
This graphic shows OSS and partner products that are integrated with the Microsoft DevOps solution.
Docker Integration
Joint strategic investments to drive containers forward

Docker Client
- **Windows Server**
  - Docker Engine (Daemon)
  - Windows Server Container Support
- **Linux**
  - Docker Engine (Daemon)
  - Linux Container Support (LXC)

Docker.exe
Examples:
- docker run
- docker images

Docker Remote API
Examples:
- GET images/json
- POST containers/create
• Streamlined provisioning of Apache Mesos Clusters
• Layered support of Swarm, Marathon, and Chronos
• Docker tooling and API support
• Integrated app management and scaling
• Linux and Windows Server containers
• Public and Private cloud
Write once, deploy any Microsoft Cloud

Virtual machines | Containers | Azure Service Fabric

Windows Server | Linux | Azure Resource Manager

Microsoft Azure Stack | Microsoft Azure
Cloud is a New Way to Think About Your Datacenter

Virtual Machines
Windows and Linux
.Net, Java, Python, PHP, Ruby, GO, NodeJS

Scale Sets

Container Service
Docker Swarm
Mesos, etc.

Service Fabric
Cloud Foundry, Marathon, Deis, OpenShift etc.

Azure is open at every layer

System Administrator
Azure Resource Manager
Developer
Microsoft Azure Stack is a new hybrid cloud platform product that enables organizations to deliver Azure services from their own datacenter thereby helping them achieve more.
What does a hybrid cloud platform look like?

- End-user experiences
- Cloud application model
- Infrastructure services
  - Platform services
- Cloud infrastructure

Private | Hosted | Public
Microsoft hybrid IT management

Simplified guest and workload management, both on-premises and in the cloud

Public cloud
Azure or AWS

Private or hosted third-party cloud, Rackspace, etc.

On-premises with System Center

Microsoft Operations Management Suite
One Azure ecosystem

Jump-start your Azure Stack efforts with the rich Azure ecosystem

- Azure Resource Manager templates
- Windows Server and Linux VM images
- Third-party services and extensions
- GitHub to store and share above application components