Mo Vid as Service



Tech Structure

**Q1. What cloud vendor is going to be used to host the Mo Vid Video SaaS solution?**

**Why is this vendor being chosen?**

**We choose Azure**

Considering that a large part of our technology stack is Microsoft technology stack（.NET /sqlserver/windows server …), the most suitable one is Microsoft's **azure** cloud service . Azure allows us to continue using the original .NET technology stack, which greatly reduces the time cost of having to deliberately learn other languages.

Assess and migrate the old users: Within the Azure , you can assess and migrate the following items:

Servers: Evaluate and migrate on-premises servers to Azure Virtual Machines or Azure VMware Solution (AVS).

Databases: Evaluate on-premises databases and migrate them to Azure SQL Database or SQL Managed Instance.

Wowza Streaming Engine/Video Transcoder, In Azure stack ,we can choose VM to replace it.

Data: Use the Azure Data product to quickly and cost-effectively migrate large amounts of data to Azure.

  

**Q2**

**What type of resources are going to be used by Mo Vid to produce their SaaS?**

**o   Are the current 4 servers going to be run as VM, If so why are you choosing this architecture.**

**o   Is the Mo Vid SaaS architecture going to need to be changed to include any services that specific to the cloud, If so what are they and why are you choosing them.**

**o   Are containers going to be used as part of the solution, If so what services are going to run in the container(s).**

We choose resources: Elastic computing, SLS, and ECS.

Elastic computing: Use multiple high-performance ECSs and optimize the front-end high availability through SLB and EIP.

Database: Split the self-built database and use the Azure high-availability version of RDS(current SQL Server is ok) and maybe the cluster version of Redis as an alternative to double the system TPS.

Business acceleration:

The user-visible website also has high requirements for the dynamic request response of the main site. According to the recommendation of azure, we separately configured DCDN to accelerate the whole site, which can meet about 10% of the dynamic HTTPS request response.

The main business field contains more than 500T videos that need to be accelerated for distribution. We decided to directly adopt the video-on-demand solution to solve video storage, downlink acceleration, transcoding and other problems in one step, greatly reducing the pressure on operation and maintenance.

We will not use current 4 servers artchitecture, become users did’t use os and vms, we don’t need IAAS.

Mo Vid SaaS architecture going to need to be changed: The SQL Server will be distribution version on cloud. And Wow Engine and Application Server will be containered in many ECSs.

We can completely control the overall business structure, which greatly relieves the pressure of development and operation and maintenance, and can ensure that the business structure can be stabilized and the business can be expanded with confidence under the ability of cloud elastic expansion.

And Decouple java (which used in Wow Engine) from the operating system, maybe replace the system with linux, better distributed java distribution, and get more flexible technology choices.

Yes, we can use docker/containers in ECSs which combine to replace old Wow Engine and Application Server.

**Q3**

**Itemize out which specific resources are going to be used to host the SaaS and sourced from the vendor above.**

**o   i.e. VM type, size, memory, cpu, price.**

Azure ECS Standard\_A1\_v2 type, size 64G, memory 8G, cpu 4core, 13dollar/month Azure Service Fabric ,choose according to ECS amount and visit count

Q4 What are the expected service uptimes offered by the cloud vendor for the resources that were selected?

99.99% uptime

Cloud computing offers 24/7 uptime (99.99% uptime). Azure and data centers are managed by the cloud service provided. Therefore, there is no need for employee management.

Q5 What if any guarantees are provided by the vendor?

We need to make sure: in most cases, the loss is either quantifiable (the value of users and data) or written explicitly into a policy (as with life insurance). Cloud computing server accident, we demand compensation

We are expected to put data protection plans in place rather than rely on the vendor. This concept makes sense because we know that public cloud service providers don’t have unlimited funds, and if any major outage or data loss did occur, there would be a long line of claimants wanting to be compensated. We can’t put all hopes in azure.

Do a good job of data backup every day, download the backup to the local regularly