

Managed VMWare Migration to Azure VMWare Service (AVS)

Move VMWare workloads to the Microsoft Azure with AVS



Benefits of Migrating Your Workloads to Azure

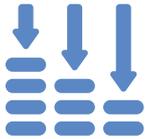
Realize the performance and feature gains of the commercial cloud by migrating your workloads!



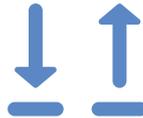
Strengthen Your Security and Compliance Posture



Improve Performance, Availability, and Uptime



Reduce and Control Costs



Meet Traffic Spikes with Dynamic Scaling



Increase Operational Efficiencies



Greater Flexibility and Agility to Scale

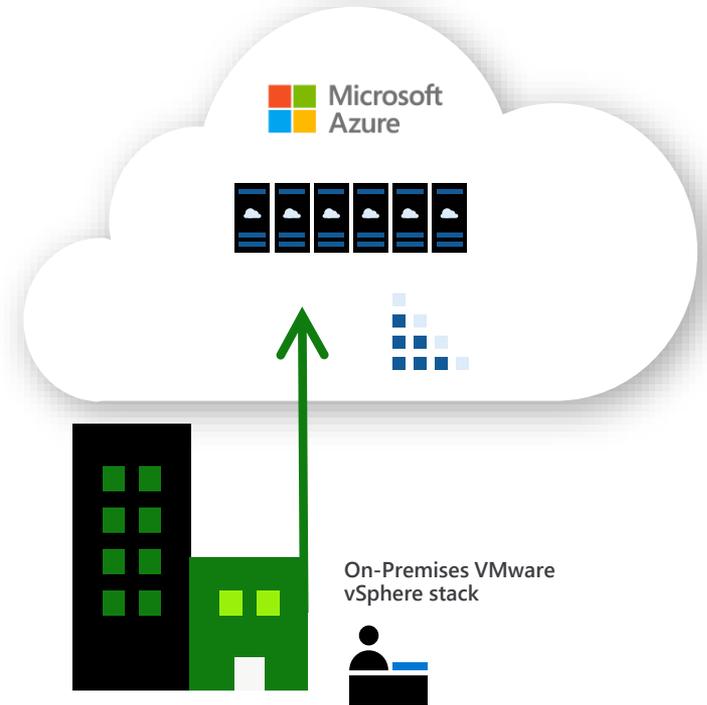
Why AVS?

- VMware is the most widely deployed server virtualization platform in data center environments
- Although there is a massive shift toward public cloud infrastructure, most enterprises still have significant on-premises vSphere environments
- These environments continue to require protection from several events ranging from simple hardware failures to application failures and large-scale disasters
- Technical professionals responsible for vSphere environments are unfamiliar with how to integrate the broader cloud adoption architecture
- AVS appears to have picked up, but many partners aren't yet transacting substantial deals due to lack of clear AVS channel program



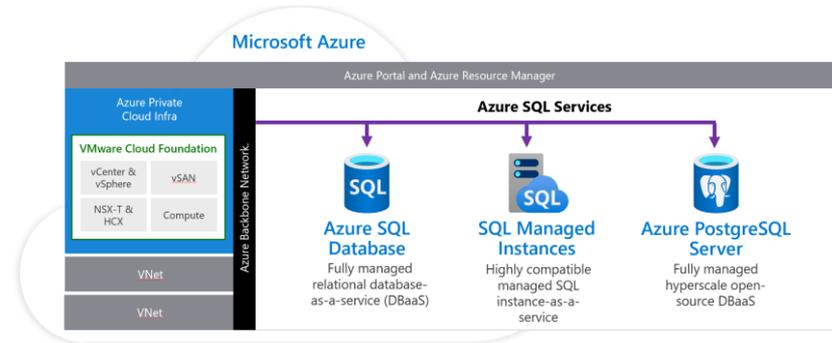
Azure VMware Solution

- It is a comprehensive VMware environment on dedicated Azure infrastructure, built by Microsoft and VMware
- It runs your VMware workloads natively on Azure, supported and operated by Microsoft
- It allows you to manage and secure applications across VMware environments and Microsoft Azure with a consistent operating framework



Key differentiators for AVS

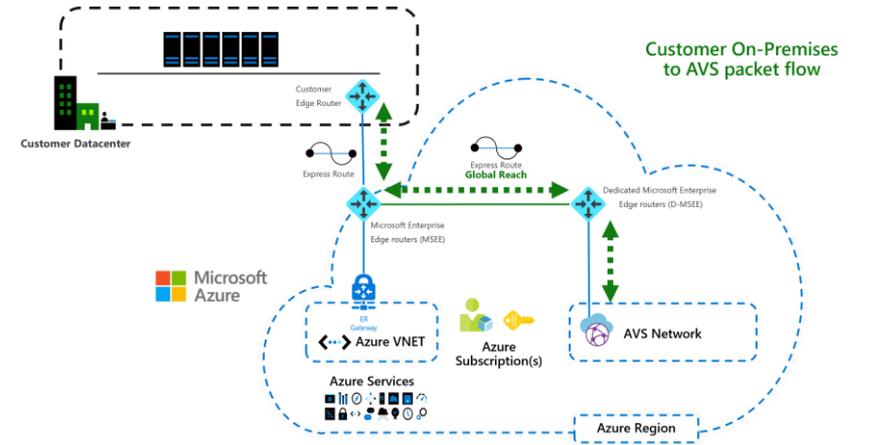
- **Azure VMware Solution is validated, supported, and certified by VMware and Microsoft.**
- Azure hybrid benefit & license mobility (not available on AWS)
- Takeout and cost recovery of VMWare licensing and support agreements: Microsoft provides enterprise VMWare licensing and support as part of the PaaS service
- Live migration without the cost, complexity or risk of refactoring
- Data encryption at rest using provider managed keys
- Global, Regional, Industry and Government certified compliance standards
- Integration with Azure Services (e.g., take advantage of managed SQL or PostgreSQL)



VMWare Native Migration

- Deploy a private cloud in Azure (for VMWare)
- Setup Enterprise Landing Zone (VNET, Jumpbox, Gateway)
- Establish Express Route for hybrid connectivity
- Large scale bulk
 - migration using HCX
 - Replication Assisted vMotion
 - Any vSphere to vSphere migration
- Setup application services Azure VNET (see diagram)
- Setup DR
- Parallel VM migration

Azure VMware Solutions – On Prem to SDDC using Global Reach



AIS Managed VMWare Migration: **Powered by RiverMeadow**

Our Technology Partnership with RiverMeadow

RiverMeadow is a Migration platform that helps bolster AIS migration capabilities.

The RiverMeadow platform has a relatively simple mission; to quickly deliver migration of servers from various sources (on-premises, co-location, Public Clouds: AWS, GCP, Azure) into preferred destination. It is resilient, cloud or on-premises based, and offers a much richer experience for AIS engineers than traditional Microsoft migration tools.



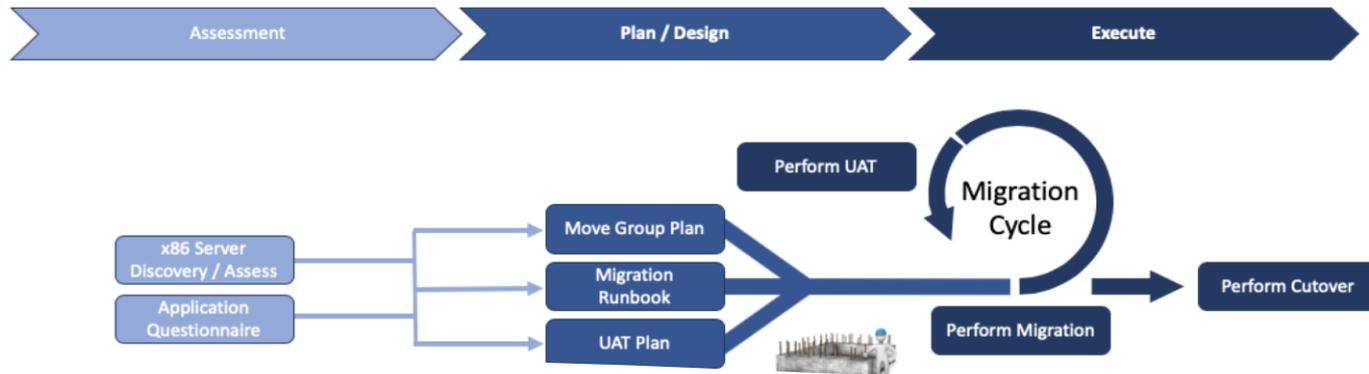
Migrate & Modernize

Multi-Cloud Migration Platform:

- RiverMeadow is a best of breed truly multi-cloud migration platform on the market today. The cloud agnostic approach means that you can leverage the different benefits of any cloud without needing to become an expert on each.

Automated In-Place OS Upgrade via Migration Platform:

- Capability to modernize the underlying Operating System with a 'Lift and Modernize' approach in which an automated in-place OS upgrade of the servers.



RiverMeadow vs HCX

	HCX Limitation	RiverMeadow
1.	Requires ExpressRoute or Internet – no support for S2S VPN	Supports any connectivity provided (ExpressRoute, S2S VPN, Internet, Reverse Proxy)
2.	Requires Access to Source vSphere hypervisor	Does not require access to Source hypervisor – helpful in “Hostile” migrations; out of existing CSP/Colo
3.	No support for non-vSphere based machines (Physical, Virtual, Cloud) ** OSAM doesn’t work.	Support for migrations of ANY machine to any native cloud or hybrid cloud
4.	Only works to AVS. For projects going to AVS and Azure, 2-3 different tools may be required (HCX, Azure Migrate, ASR). All with different requirements.	Support for migrations to VMware on <i>any</i> native cloud or hybrid cloud – single pane of glass
5.	No Support for < vSphere 6.0	Support for migrations off of vSphere 5.5 and or any vSphere version
6.	No Support for VM Hardware 18 and 19 nor backwards support for older VMware hardware on target	Support for migrations to or from any VMware Hardware version. Also provides support for backwards compatible VMware Hardware version (AVS uses version 15)
7.	Conflicts with VMware SRM (vSphere Replication)	OS-based nor VM-based migrations conflict with VMware SRM or vSphere Replication
8.	Large infrastructure footprint required in both Source and Target vSphere environments. Scaling requires multiples of 3 in both source and target.	Tiny infrastructure footprint
9.	Next to no migration telemetry in the product – too much guesswork when planning cutover windows	Detailed migration telemetry. Plan migration windows down to the minute
10.	No fine-tuned control over sync’ing / target is offline until cutover	Target is available in isolation for UAT ahead of cutover. Fine-tuned sync allows just files or folders to sync / multiple forms of sync for great flexibility
11.	No ability to resize disks as part of migration	Ability to resize disks as part of migration to reduce target storage footprint (Usable storage in AVS is a big problem today)
12.	No ability to modernize the OS as part of migration	Ability to modernize versions of Windows Server starting from 2003 up to 2019 today (2022 is WIP) as well as Windows Desktop from 7 to 10. Reduce technical debt as part of migration.

- RiverMeadow platform allows AIS to accelerate AVS migrations from months to weeks.
- Use cases that RiverMeadow’s Platform supports vs VMWare’s native HCX:

AIS Service Offering & Per Unit Pricing

Managed VMWare Migration Offering:

Challenges Addressed	Data Center Evacuation, Reduce TCO, Gain BCDR Resiliency
Pre-requisites	Landing Zone; BYO or AIS Professional Services (Governance and Operations)
Requirement	Solution Assessment
Next Steps	After rehosting, refactor, optimize, modernize, etc.
Owner	Jonathan Works, M&O Team
Competition	Market Competitors TBD
Tooling	Movere, UnifyCloud CloudRecon, RiverMeadow, VMware HCX
Base Duration	8 Weeks
Contract	FFP – Standard SOW

New PER UNIT (VM) Pricing

- Fixed Price
- \$1000 per VM/Server + \$3,500 / Week Project Management
- HCX Native Installation additional \$10,000
- Delivered by M&O Team Migration Services Group with leveraged staffing (Onshore & Offshore available)

Managed Server Migration



PHASE ONE

Discover & Assess

Rapidly collect infrastructure and application data to provide a holistic view of the technical requirements, the business needs, desires of stakeholders and workload owners. This data will provide improved visibility of mixed, complex IT environments while delivering critical insights into resource utilization for driving intelligent infrastructure capacity decisions.



PHASE TWO

Intake & Planning

Will run in parallel of the Discovery and Assessment phase so move groups and migration schedules are agreed to (this is a sprint-based exercise in order to accelerate concurrent tasks). During this phase AIS will facilitate the installation of core common migration infrastructure and Azure Landing Zone readiness to support the migration of servers.



PHASE THREE

Execute

Managed Migrations performed by AIS staff (the migration factory) and will utilize the best enabling migration technology available to achieve the objectives and timelines agreed to. Migration factory will perform a Pre-Flight migration check and validate Intake and wave move-group scheduling and coordination.

- This engagement delivers a Managed Migration for a low-risk "Lift & Shift" move of servers (Physical and Virtual) into an Azure "Landing Zone" as a fast path to operationalize in the cloud.
- A successful migration requires thorough discovery, careful assessments, designs based on best practices and a solid implementation plan.
- With our AIS proven framework and expert approach, we deliver comprehensive methodologies to help smooth your transformation, whether you migrate a single application or a large portfolio to the cloud.

Azure VMware Migration



CHALLENGE

The 160-branch bank wanted to transition its IT infrastructure to the cloud without compromising the customer experience. They needed a platform and infrastructure to enable the digital-forward, omnichannel strategy that worked for its customer experience team.

AIS SOLUTION

AIS helped the bank leverage Azure VMware Solution to seamlessly migrate its data center to new virtual machines in private clouds. The approach included assessments, change management, and stress-testing for workload migrations.



Christopher Blotto

Executive Vice President and Chief Information Officer

Blotto explains that, in partnership with Applied Information Sciences (AIS) the bank was able to begin the journey with minimal impact to users and improved collaboration and agility in response to evolving business needs.

Get Started

Ready to migrate your workloads to the cloud?

- Contact AIS today at **sales@ais.com**
- We'll follow up to help you determine the next steps
- This will help define the project scope and next steps

