



# Enhanced Availability with Multi-AZ on Amazon RDS Custom for SQL Server

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# Agenda

- RDS Custom for SQL Server overview
- Use your existing SQL Server licenses with Bring Your Own Media (BYOM)
- How it works : Multi-AZ in RDS Custom SQL Server (Demo)
- Resources

# Service Overview



# Amazon RDS Custom

Amazon RDS Custom is a managed database service that allows administrative access to the underlying operating system and database environment.

Customers can leverage their own SQL Server installation media (BYOM), or choose the License Included (LI) model where AWS supplies the licenses.

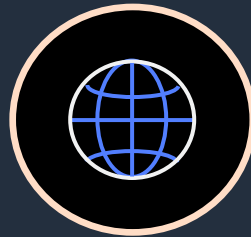


# Use Cases



## Bring Your Own Media (BYOM) or AWS-Supplied

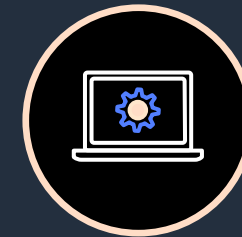
Customers looking to leverage their existing SQL Server license investments



## Lift and Shift Business Apps

Custom or packaged applications that need to be deployed with minimal changes

Example: Microsoft SharePoint, Microsoft Dynamics



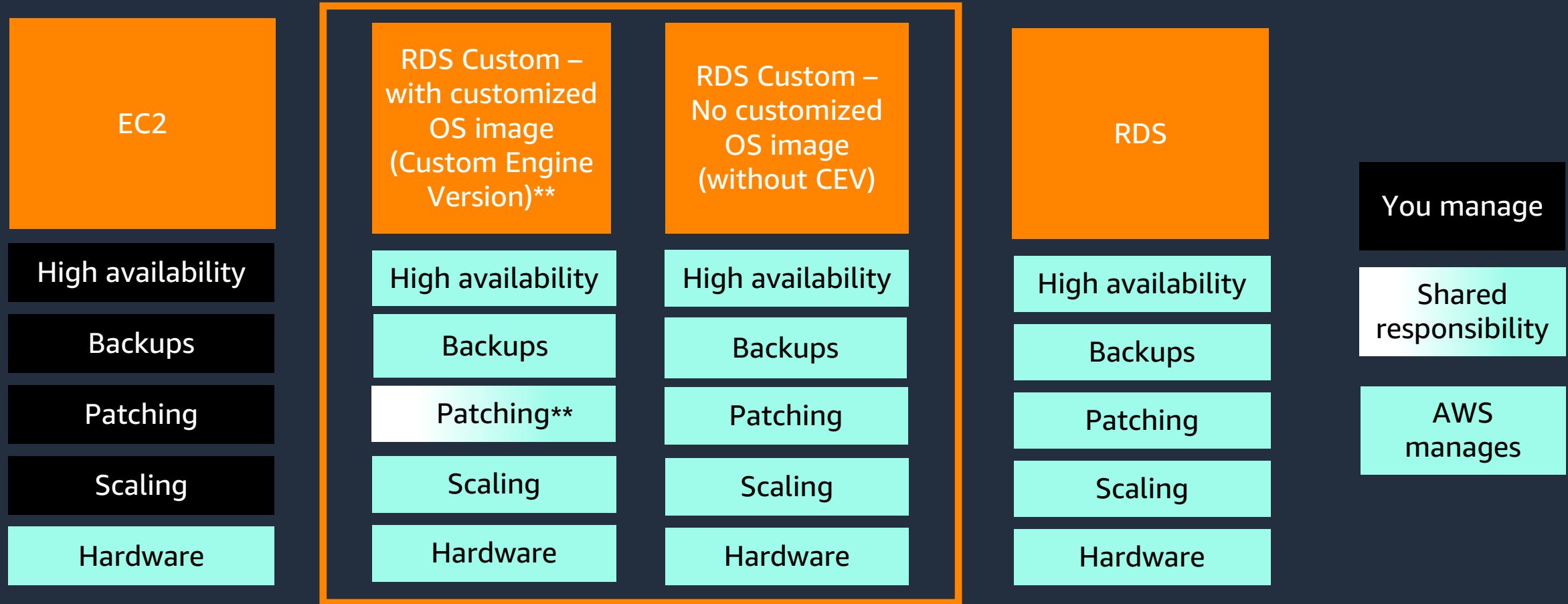
## Granular Control

Customers looking to install custom drivers, enable features or applications that require elevated privileges

Example: Linked Server, CLR, XP\_cmdshell

# Amazon RDS Custom for SQL Server

## Managed cloud database service



\*\*If you choose to use your own AMI via the Custom Engine Version feature, you will need to provide your own software updates. However, deploying the patched AMI across your fleet via rolling updates is automated. BYOM requires using a Custom Engine Version.

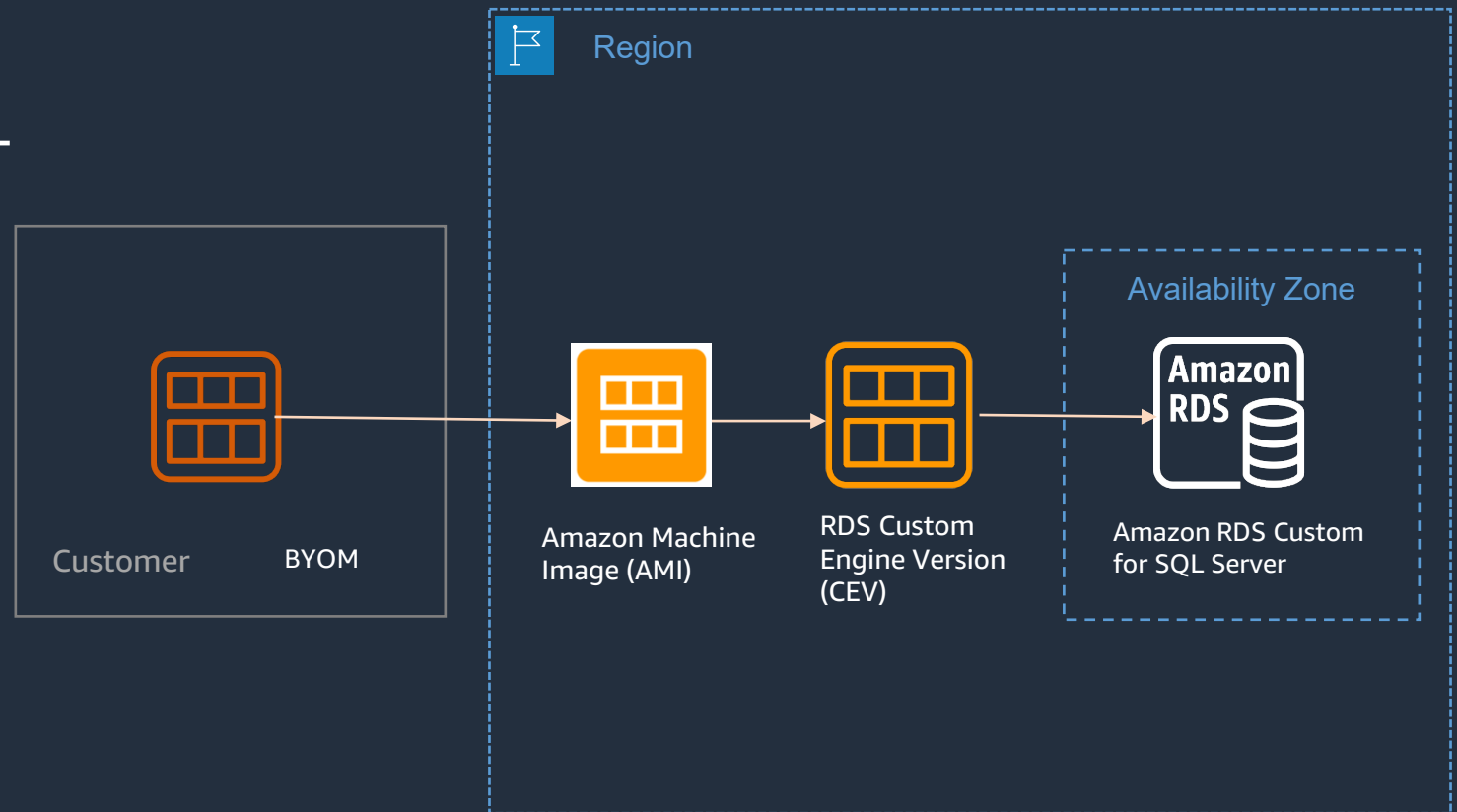
# Amazon RDS Custom for SQL Server features

Amazon RDS for SQL Server	
Versions Supported:	2019
Editions Supported:	Standard, Enterprise, Web
Licensing Options:	BYOM, License Included
High Availability:	AWS-managed
Monitoring:	AWS-managed
Authentication:	Windows & SQL Authentication
Backup / Recovery:	Managed automated backups, Native SQL Server backup, PiTR**
Maintenance:	Managed software patching for RPEV, One-click patching for CEV
Access & Permissions	Full admin access to OS, sysadmin
Business Intelligence Features	SSAS, SSRS, SSIS
Other Native SQL Server Features	Linked Server, xp_cmdshell, CLR, FILESTREAM

# Bring Your Own Media (BYOM)

Customers can bring their own SQL Server media and utilize it to run their SQL Server workload on Amazon RDS Custom for SQL Server.

Customers can leverage existing SQL Server Licenses\* on Amazon RDS Custom for SQL Server while maximizing the value of managed database services.



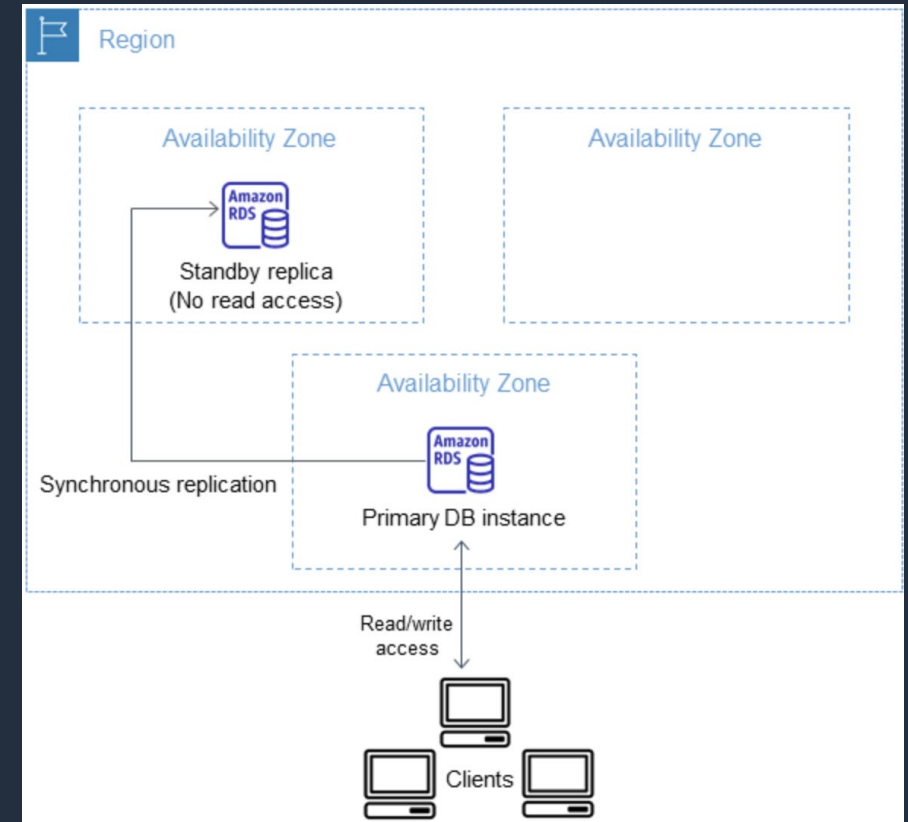
\*According to Microsoft licensing terms. Learn more about [AWS license mobility terms](#)



# Multi-AZ with RDS Custom for SQL Server

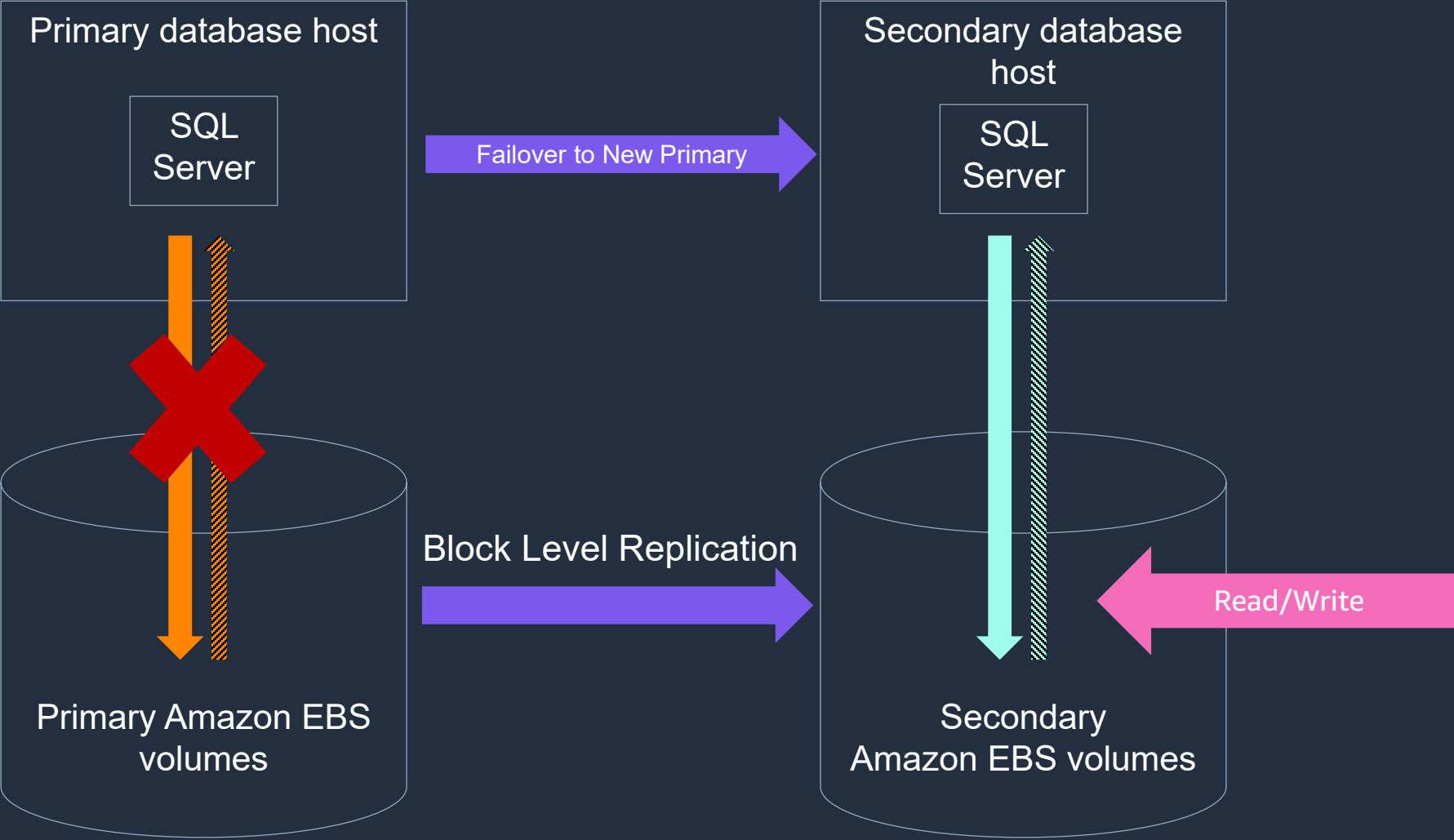
# Managed High Availability with RDS Custom SQL Server

- Fully-managed
- Multi-AZ deployment allows **synchronous replication**
- Physically distinct, independent infrastructure
- The replication **uses block-based replication technology**, instead of AlwaysOn
- **Automatic failover**
- Creates a standby in a different Availability Zone (AZ) to provide **data redundancy**
- Supported for **SQL Server 2019 CU17** & above



For more information, visit the [Multi-AZ documentation page](#).

# Multi-AZ in Action



# Prerequisites for a Multi-AZ deployment with RDS Custom for SQL Server

- Update the RDS security group inbound and outbound rules to allow **port 1120**.
- Add a rule in your private network Access Control List (ACL) **that allows TCP ports 0-65535 for the DB instance VPC**.
- Create new **Amazon SQS VPC endpoints** that allow the RDS Custom for SQL Server DB instance to communicate with SQS.
- Update the **SQS permissions** in the instance profile role.

*Documentation guide : <https://docs.aws.amazon.com/AmazonRDS/latest/UserGuide/custom-sqlserver-multiaz.html#custom-sqlserver-multiaz.prerequisites>*

# DEMO



# Resources



# Resources and Contacts

- [Multi-AZ for RDS Custom for SQL Server](#)
- [RDS Custom Public Site](#)
- [RDS Custom Pricing](#)
- [RDS Custom FAQ](#)
- [RDS Custom Product Documentation](#)



# Thank you!

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