# AWS Storage Gateway

Amazon FSx File Gateway:  Fast, low-latency access on premises to fully managed file shares

# The hybrid cloud model:

**YOU HAVE ON-PREMISES DATA AND APPLICATIONS…**



Existing applications & data archives

New data sources

End users

…that want to use storage and services in the cloud

AWS

# Hybrid cloud storage challenges

On-premises

In-cloud

| | |
|---|---|
| I am running out of on premises storage capacity | …and need to use scalable, durable, and secure cloud storage |
| I want to run my existing applications without change (files, backups, archive)… | …but leverage the infinite scale of the cloud |
| I need low latency, on premises access to data in the cloud… | …while accessing the power of cloud compute and analytics |
| Compliance requires that I integrate with enterprise security and management tools… | …but I want to manage & monitor from a single pane of glass |

aws

# Storage Gateway



**Amazon S3 File Gateway**

Native file access, SMB or NFS, to Amazon S3 for backups, archives, and ingest for data lakes

**Amazon FSx File Gateway**

Replace on-premises Windows file shares with efficient, low-latency Amazon FSx for Windows based group file shares and home directories

**Tape Gateway**

Replace physical tape infrastructure leveraging Amazon S3 archive tiers for long-term retention
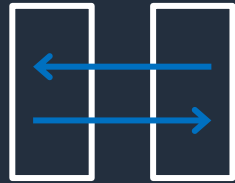
**Volume Gateway**

Block storage volumes with snapshots, AWS Backup integration, and cloud recovery

# Storage Gateway – benefits

**EASY ON-RAMP TO CLOUD BENEFITS**

### Standard protocols
No changes to existing apps

### Local caching
Low-latency access to frequently used data

### Optimized data transfers
Minimized network traffic

### Secure and compliant
FIPS, HIPAA, PCI, SOC*, ISO**, and encryption

### Cost-effective
Pay-as-you-go pricing

### AWS-integrated
Management, monitoring, and in-cloud workloads

*SOC (1, 2, 3) **ISO (9001, 27001, 27017, 27018)

# Amazon FSx for Windows File Server

**FULLY MANAGED, HIGHLY RELIABLE, AND SCALABLE SMB-ACCESSIBLE FILE STORAGE BUILT ON WINDOWS SERVER**

Home directory

Content management

Virtual desktops

Windows and Linux Applications

## Fully managed, built on Windows Server

- No need to manage hardware infrastructure
- Feature parity with on-premises NAS

## Flexible price and performance options

- SSD or HDD
- Single-AZ or Multi-AZ
- Scale throughput and storage independently
- Data deduplication and compression

## Easy migration to AWS

- SMB to SMB with AWS DataSync
- No need to re-platform or re-architect
- Integrates with DFS namespaces

# Accessing Amazon FSx from on-premises

**CUSTOMERS TOLD US THEY WANT TO:**

- Access FSx for Windows File Server from on-premises for latency and performance sensitive desktop applications

- Provide file services to multiple locations and retire legacy file servers but maintain data protection and security features

- Reduce physical NAS infrastructure

- Improve bandwidth efficiency

aws

# Amazon FSx File Gateway
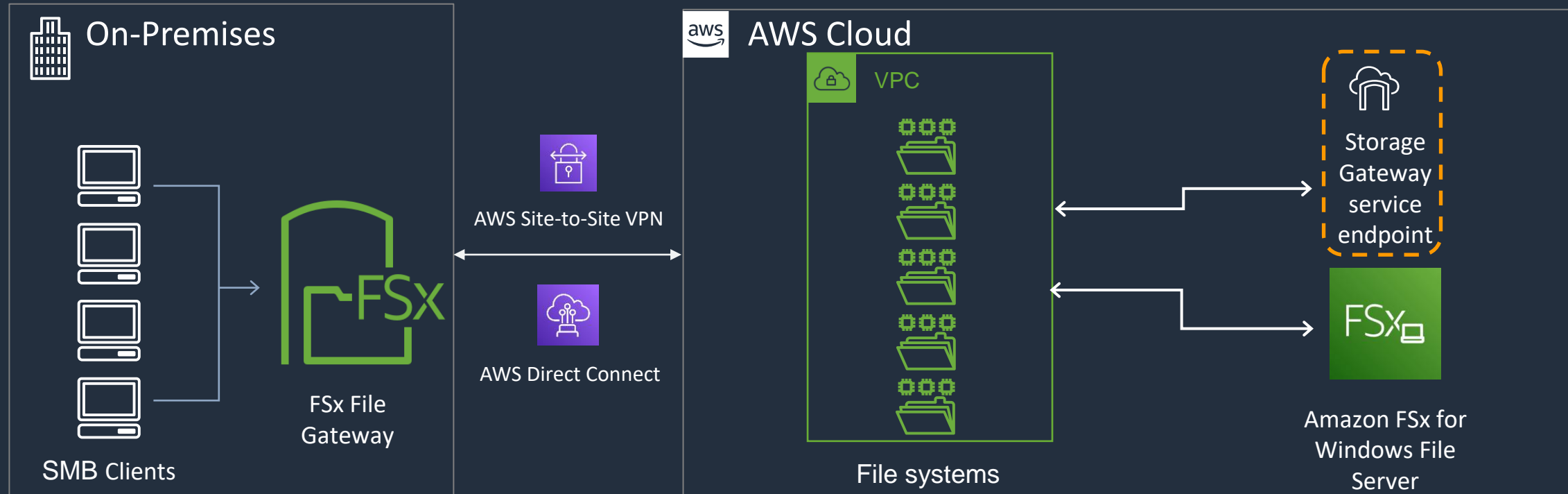
**LOW-LATENCY ACCESS TO AMAZON FSX FILE SHARES**
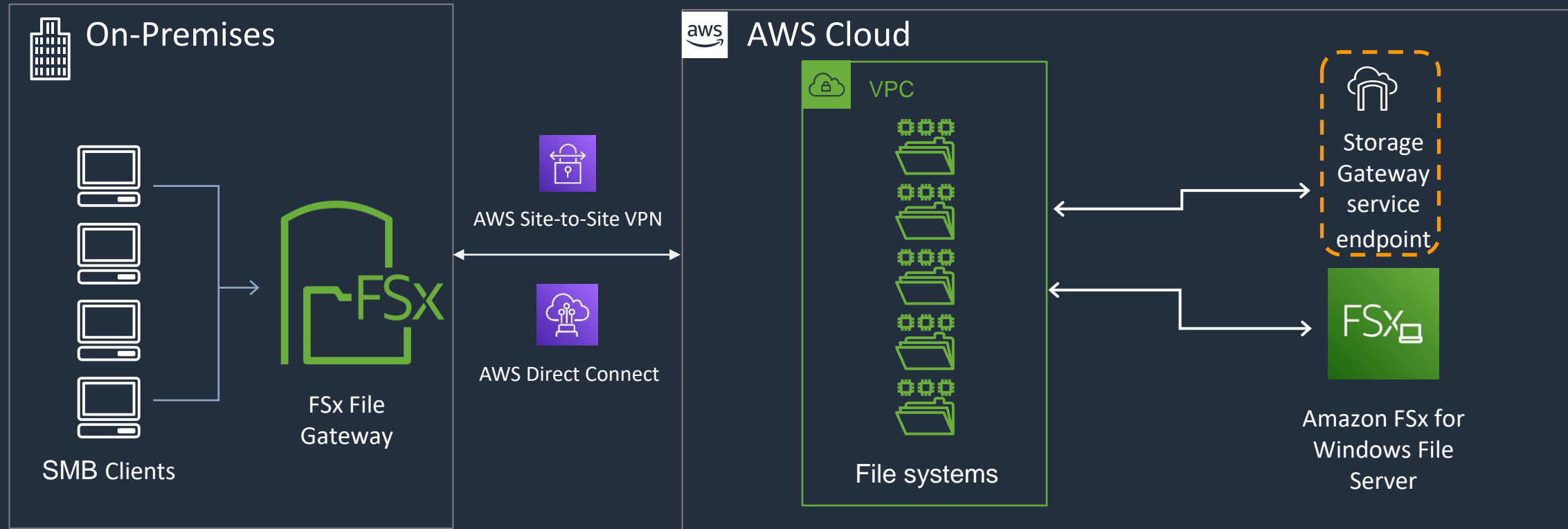


**Use Cases:** Multi-user interactive file sharing such as group shares, project shares, home directories, media editing, CAD/CAM

# Amazon FSx File Gateway

**LOW-LATENCY ACCESS TO AMAZON FSX FILE SHARES**

On-Premises

SMB Clients

FSx File
Gateway

AWS Site-to-Site VPN

AWS Direct Connect

AWS Cloud

VPC

File systems

Storage
Gateway
service
endpoint

Amazon FSx for
Windows File
Server

**Features**

On-premises cache of commonly accessed files backed by Amazon
FSx for Windows File Server

Deploy multiple FSx File Gateways in offices or remote sites with
full-sized Windows ACLs

Up to 64TB cache and 500 active clients per gateway

High availability with on-premises cache on VMware

**Benefits**

Fast and efficient access

Maintain on-premises user experience

Reduce infrastructure management