Welcome

Office 365 – File, Data & Task Management and Migration Strategies

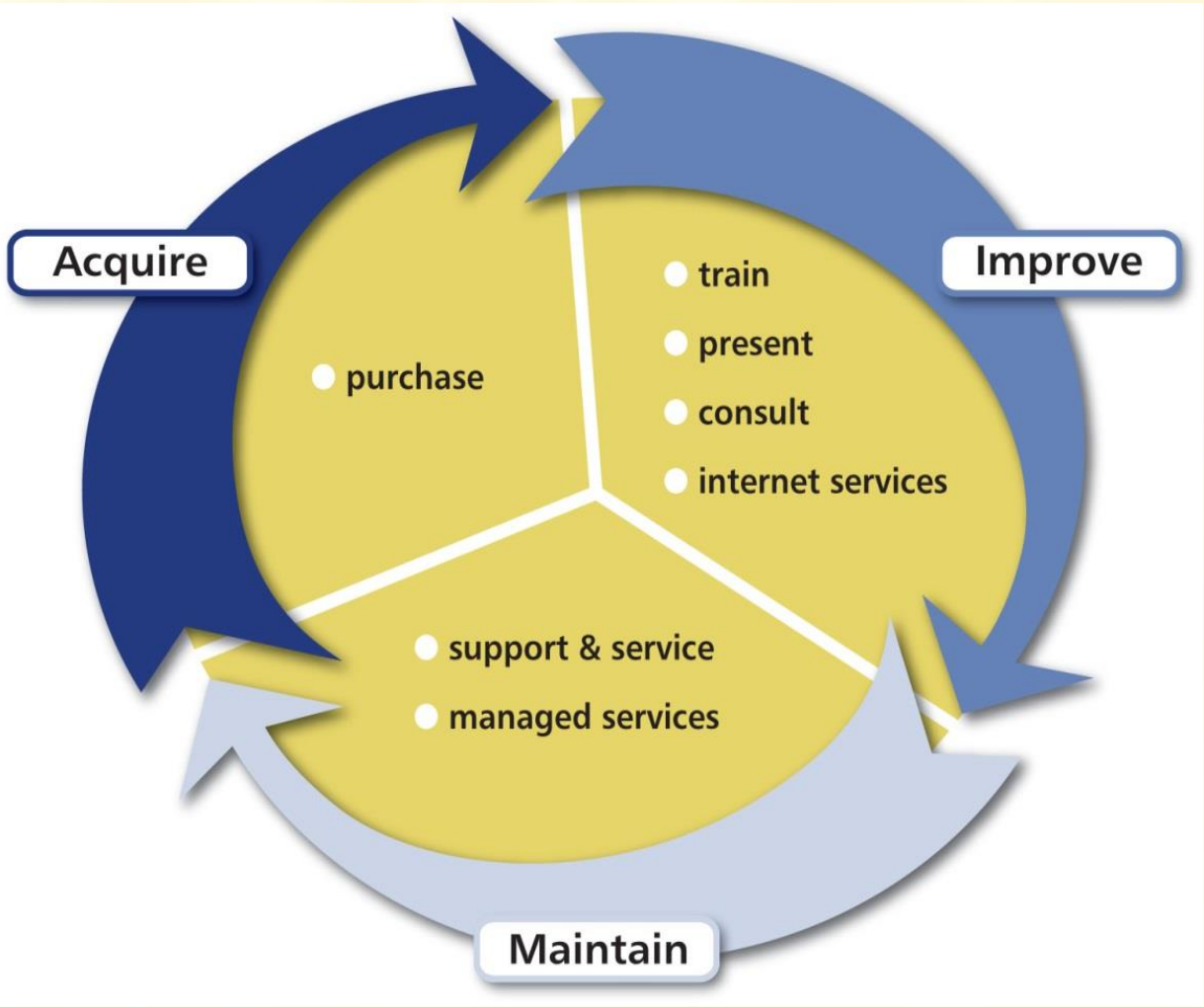
What do you hope to learn today?

Please take a moment to fill out the yellow cards.

Our presenters will review the cards to ensure that we cover the topics/areas of interest.

We will collect them before we get started.

Thanks!


Acquire
Improve
Maintain
purchase
train
present
consult
internet services
support & service
managed services

System Source & Mind Over Machines:

- **Leaders in Baltimore IT since 1980s**
  - **System Source since 1981**
  - **Mind over Machines since 1989**

- **Long-tenured, complementary relationship**

And they all wish they had come to Mind Over Machines first.

Since 1989, the business systems we've built, fixed, restored and upgraded have turned around failing businesses, saved millions, opened new markets, powered growth, and catapulted companies from obscurity to industry dominance.

APPLICATION DEVELOPMENT | CRM | BI/DATA | SHAREPOINT | IT ASSESSMENTS | HEALTHCARE IT

‘Learn Today’ Cards

What do you hope to learn today?

Please take a moment to fill out the yellow cards.

Our presenters will review the cards to ensure that we cover the topics/areas of interest.

We will collect them before we get started.

Thanks!

Agenda

- What is Office 365
- Office 365 Plans
- Identity and service management
- Email migration options

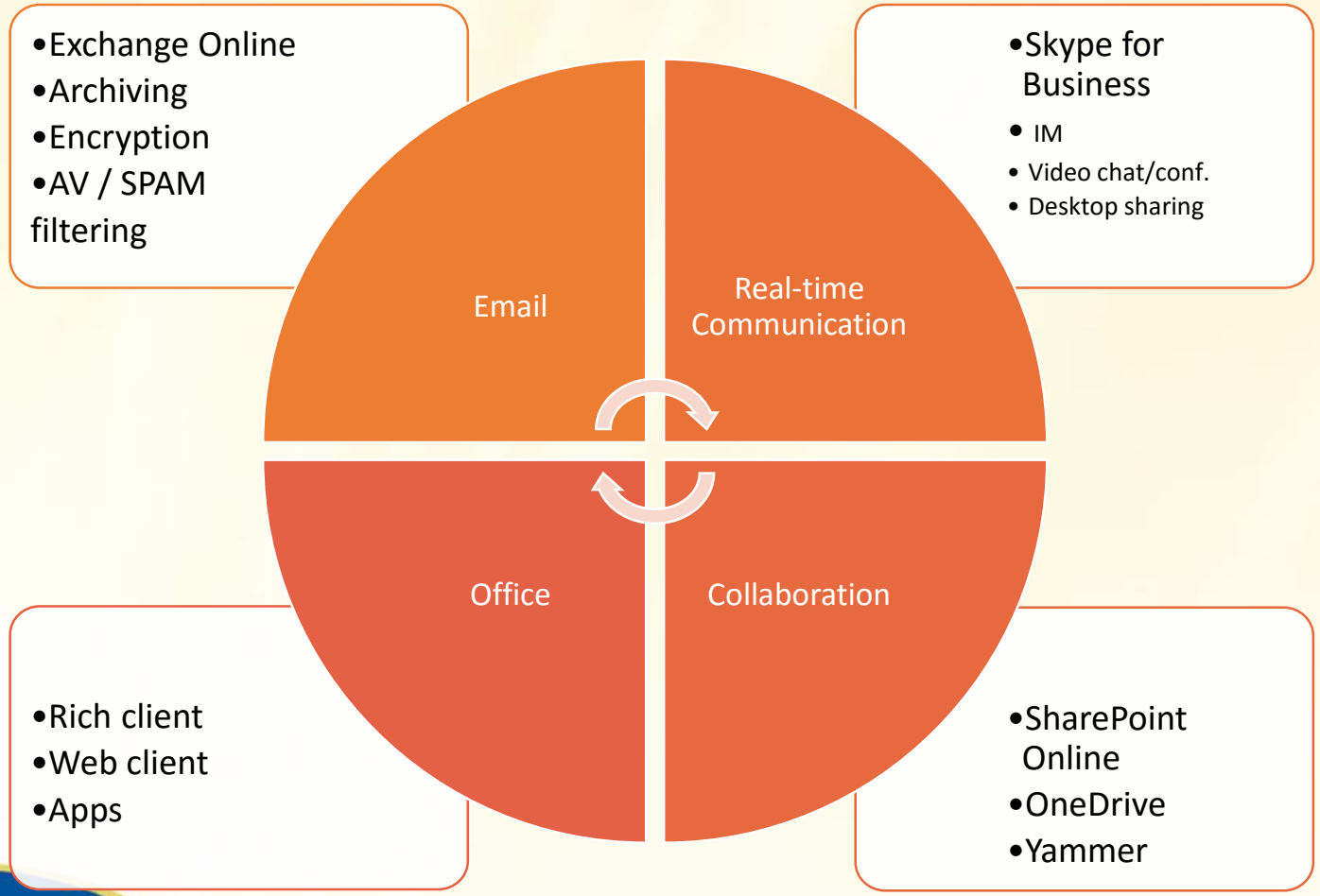
What is Office 365?

What is Office 365?

What is Office 365?

- Office 365 is a SaaS solution and is one of several cloud solutions offered by Microsoft.
- Your connectivity to, and your use of, Office 365 and other Microsoft cloud services are flexible.
  - Subscribe to one service only or a suite of services (organization wide or per user)
  - Subscription plans offer various levels of features
  - Separate or integrate on-premises and cloud identities
  - Integrate cloud services with on-premises services (Hybrid)

What is Office 365?

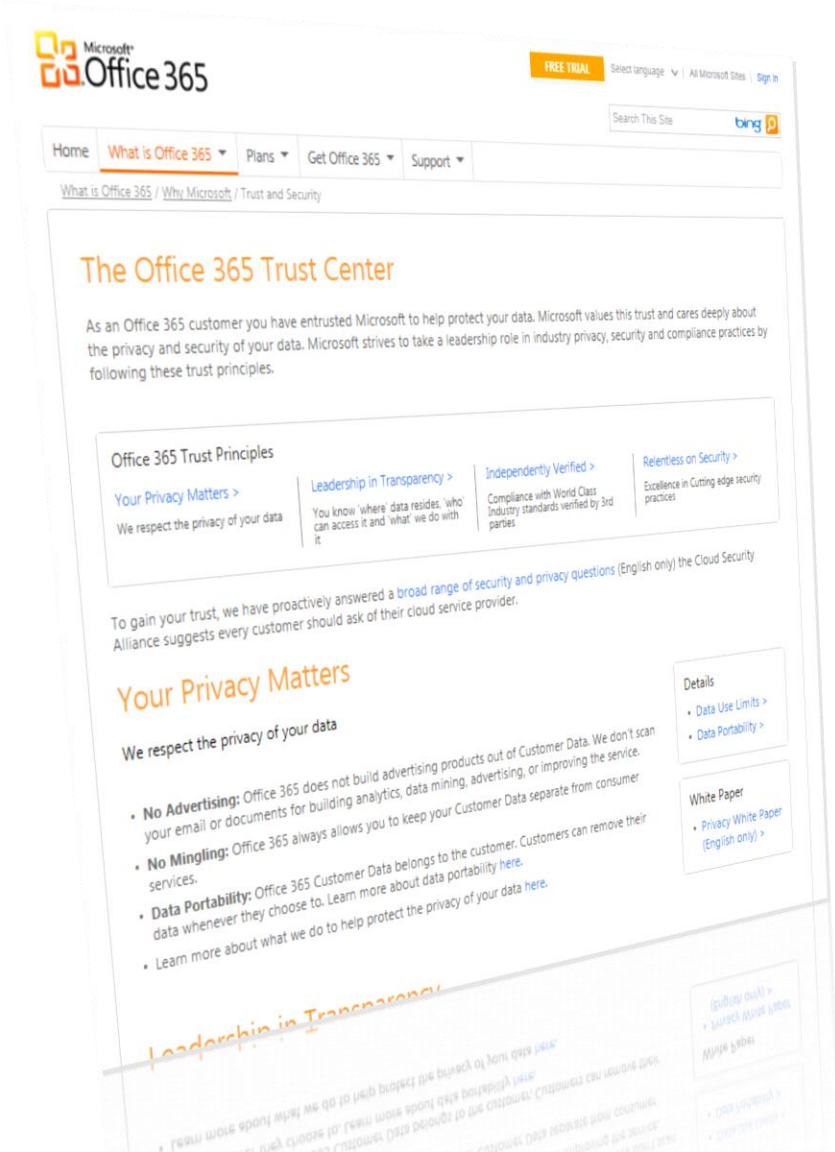


Other features:

- Groups / Clutter
- Document Conversations
- Video Portal
- Delve, Graph, Mix, Sway
- MDM
- MFA
- And more...

Service Descriptions - https://technet.microsoft.com/en-us/office/dn788955.aspx

Office 365 Trust Center



Clear messaging with plain English

Details for security experts

Links videos, whitepapers

http://trust.office365.com

Office 365 Plans

Enterprise

	Office 365 ProPlus	Office 365 Enterprise E1	Office 365 Enterprise E3	Office 365 Enterprise E5
	$12.00 user/month (annual commitment)	$8.00 user/month (annual commitment)	$20.00 user/month (annual commitment)	$35.00 user/month (annual commitment)
User maximum	Unlimited	Unlimited	Unlimited	Unlimited
Fully installed Office applications Word, Excel, PowerPoint, Outlook, Publisher, and OneNote on up to 5 PCs or Macs per user ⓘ Now includes the new Office 2016 apps for your PC and Mac. Now includes the new Office 2016 apps for your PC and Mac.	✓		✓	✓
Office on tablets and phones for the fully installed Office experience on up to 5 tablets and 5 phones per user ⓘ	✓		✓	✓
Online versions of Office including Word, Excel and PowerPoint	✓	✓	✓	✓
File storage and sharing with 1 TB storage per user	✓	✓	✓	✓
Business class email, calendar, and contacts with a 50 GB inbox per user ⓘ		✓	✓ Unlimited inbox	✓ Unlimited inbox

system | source 35 years

the one source for IT & AV

Enterprise

	Office 365 ProPlus	Office 365 Enterprise E1	Office 365 Enterprise E3	Office 365 Enterprise E5
	$12.00 user/month (annual commitment)	$8.00 user/month (annual commitment)	$20.00 user/month (annual commitment)	$35.00 user/month (annual commitment)
Unlimited online meetings, IM, and audio, HD video, and web conferencing.		✓	✓	✓
Intranet site for your teams with customizable security settings		✓	✓	✓
Corporate social network to help employees collaborate across departments and locations		✓	✓	✓
Work management tools to help teams create plans, organize, assign and collaborate around tasks		✓	✓	✓
Professional digital storytelling tools to create interactive reports, presentations, and more	✓	✓	✓	✓
Personalized search and discovery across Office 365 using the Office Graph		✓	✓	✓

Enterprise

	Office 365 ProPlus	Office 365 Enterprise E1	Office 365 Enterprise E3	Office 365 Enterprise E5
	$12.00 user/month (annual commitment)	$8.00 user/month (annual commitment)	$20.00 user/month (annual commitment)	$35.00 user/month (annual commitment)
Corporate video portal for uploading and sharing your corporate videos across the company		✓	✓	✓
Meeting broadcast on the Internet to up to 10,000 people, who can attend in a browser on nearly any device		✓	✓	✓
Enterprise management of apps with Group Policy, Telemetry, Shared Computer Activation	✓		✓	✓
Self-service Business Intelligence to discover, analyze, and visualize data in Excel	✓		✓	✓
Compliance solutions to support Archiving, Auditing and eDiscovery, mailbox and internal site search and legal hold capabilities depending upon subscription type		✓	✓	✓

Enterprise

	Office 365 ProPlus	Office 365 Enterprise E1	Office 365 Enterprise E3	Office 365 Enterprise E5
	$12.00 user/month (annual commitment)	$8.00 user/month (annual commitment)	$20.00 user/month (annual commitment)	$35.00 user/month (annual commitment)
Information Protection including Rights Management and Data Loss Prevention for emails	✓		✓	✓
Advanced eDiscovery with Predictive Coding and Text Analytics				✓
Advanced Threat Protection helps defend your data against malware and viruses and safeguard your messaging system. **Advanced Security Management** provides enhanced visibility and control into your Office 365 environment.				✓
Analytics tools for personal and organizational insights with Power BI Pro and Microsoft MyAnalytics				✓
PSTN conferencing to allow invitees to join Skype for Business meetings by dialing in from a landline or mobile phone				✓

Enterprise

	Office 365 ProPlus	Office 365 Enterprise E1	Office 365 Enterprise E3	Office 365 Enterprise E5
	$12.00 user/month (annual commitment)	$8.00 user/month (annual commitment)	$20.00 user/month (annual commitment)	$35.00 user/month (annual commitment)
Cloud PBX for cloud-based call management to make, receive, and transfer calls across a wide range of devices				✓
PSTN calling — subscribe to domestic and international calling plans from Office 365 and use existing phone numbers or get new ones. Learn more				Available for purchase as an add-on for $24.00 user/month*

Business

	Office 365 Business	Office 365 Business Premium	Office 365 Business Essentials
	$8.25 user/month (annual commitment)	$12.50 user/month (annual commitment)	$5.00 user/month (annual commitment)
Fully installed Office applications Word, Excel, PowerPoint, Outlook, Publisher, and OneNote on up to 5 PCs or Macs per user ⓘ Now includes the new Office 2016 apps for your PC and Mac.	✓	✓	
Office on tablets and phones for the fully installed Office experience on up to 5 tablets and 5 phones per user ⓘ	✓	✓	
Online versions of Office including Word, Excel and PowerPoint	✓	✓	✓
File storage and sharing with 1 TB storage per user	✓	✓	✓
Business class email, calendar, and contacts with a 50 GB inbox per user ⓘ		✓	✓

Business

	Office 365 Business	Office 365 Business Premium	Office 365 Business Essentials
	$8.25 user/month (annual commitment)	$12.50 user/month (annual commitment)	$5.00 user/month (annual commitment)
Unlimited online meetings, IM, and audio, HD video, and web conferencing ⓘ		✓	✓
Corporate social network to help employees collaborate across departments and locations		✓	✓
Work management tools to help teams create plans, organize, assign and collaborate around tasks		✓	✓
Professional digital storytelling tools to create interactive reports, presentations, and more	✓	✓	✓
User maximum	300	300	300

Non-Profit

	Office 365 Nonprofit Business Essentials	Office 365 Nonprofit Business Premium	Office 365 Nonprofit E1	Office 365 Nonprofit E3	Office 365 Nonprofit E5
	Donation	$2.00 user/month Free trial	Donation	$4.50 user/month Free trial	$10.00 user/month Free trial
User maximum	300	300	Unlimited	Unlimited	Unlimited
Fully installed Office applications Word, Excel, PowerPoint, Outlook, Publisher, and OneNote on up to 5 PCs or Macs ⓘ Now includes the new Office 2016 apps for your PC and Mac.		✓		✓ plus Access	✓ plus Access
Office on tablets and phones for the full, installed Office experience on up to 5 tablets and 5 phones ⓘ		✓		✓	✓
Online versions of Office including Word, Excel, and more	✓	✓	✓	✓	✓

system | source 35 years

the one source for IT & AV

Non-Profit

	Office 365 Nonprofit Business Essentials	Office 365 Nonprofit Business Premium	Office 365 Nonprofit E1	Office 365 Nonprofit E3	Office 365 Nonprofit E5
	Donation	$2.00 user/month Free trial	Donation	$4.50 user/month Free trial	$10.00 user/month Free trial
File storage and sharing with 1 TB storage/user ⓘ	✓	✓	✓	✓	✓
Business-class email, calendar, and contacts with a 50 GB inbox ⓘ	✓	✓	✓	✓	✓
Unlimited online meetings, IM, and audio, HD video, and web conferencing.	✓	✓	✓	✓	✓
Intranet site for your teams with customizable security settings	✓	✓	✓	✓	✓
Corporate social network to help employees collaborate across departments and locations	✓	✓	✓	✓	✓

Non-Profit

	Office 365 Nonprofit Business Essentials	Office 365 Nonprofit Business Premium	Office 365 Nonprofit E1	Office 365 Nonprofit E3	Office 365 Nonprofit E5
	Donation	$2.00 user/month Free trial	Donation	$4.50 user/month Free trial	$10.00 user/month Free trial
Professional digital storytelling tools to create interactive reports, presentations, and more	✓	✓	✓	✓	✓
Personalized search and discovery across Office 365 using the Office Graph	✓	✓	✓	✓	✓
Corporate video portal for uploading and sharing your corporate videos across the company			✓	✓	✓
Enterprise management of apps with Group Policy, Telemetry, Shared Computer				✓	✓
Self-service Business Intelligence to discover, analyze, and visualize data with Excel				✓	✓

Non-Profit

	Office 365 Nonprofit Business Essentials	Office 365 Nonprofit Business Premium	Office 365 Nonprofit E1	Office 365 Nonprofit E3	Office 365 Nonprofit E5
	Donation	$2.00 user/month Free trial	Donation	$4.50 user/month Free trial	$10.00 user/month Free trial
Compliance and information protection including Legal Hold, Rights Management and Data Loss Prevention for email and files				✓	✓
Information Protection including Rights Management and Data Loss Prevention for emails				✓	✓
Advanced eDiscovery with Predictive Coding and Text Analytics					✓
Advanced security for your data, that helps protect against unknown malware and viruses and provides better zero-day protection to safeguard your messaging system					✓

Non-Profit

	Office 365 Nonprofit Business Essentials	Office 365 Nonprofit Business Premium	Office 365 Nonprofit E1	Office 365 Nonprofit E3	Office 365 Nonprofit E5
	Donation	$2.00 user/month Free trial	Donation	$4.50 user/month Free trial	$10.00 user/month Free trial
Analytics tools for personal and organizational insights with Power BI and Microsoft MyAnalytics					✓
PSTN conferencing to allow invitees to join Skype for Business meetings by dialing in from a landline or mobile phone					✓
Cloud PBX for cloud-based call management to make, receive, and transfer calls across a wide range of devices					✓

Exchange Online

	Exchange Online Plan 1	Exchange Online Plan 2
	$4.00 user/month annual commitment	$8.00 user/month annual commitment
Large mailboxes Each user gets 50 GB of mailbox storage and can send messages up to 25 MB in size.	✓	✓
Outlook support Users can connect supported versions of Outlook to Exchange Online, so they can use the rich client application they already know.	✓	✓
Web-based access For web-client access, Outlook Web App provides a premium browser-based experience that matches the look and feel of the full Outlook client.	✓	✓
Mobility Mobile access is available from all phones that can receive email, including Windows Phone, iPhone®, Android, and Blackberry devices.	✓	✓
Shared calendar and contacts Users can compare calendars to schedule meetings and can access collaboration features, including shared calendars, groups, the global address list, external contacts, tasks, conference rooms, and delegation capabilities.	✓	✓
Apps for Outlook Users can spend less time switching between apps with an extension model that allows third-party web applications easy plug-in access for both Outlook and Outlook Web App.	✓	✓

Exchange Online

	Exchange Online Plan 1	Exchange Online Plan 2
	$4.00 user/month annual commitment	$8.00 user/month annual commitment
Security Every mailbox is protected with premier anti-malware and anti-spam protection via Exchange Online Protection.	✓	✓
In-Place Archive Reduce inbox clutter by automatically moving old messages to an In-Place Archive.	✓	✓
In-Place Hold Use In-Place Hold to preserve deleted and edited mailbox items from users' primary mailboxes and In-Place Archives.		✓
Unlimited storage Take advantage of unlimited storage (50 GB of storage in the user's primary mailbox, plus unlimited storage in the user's In-Place Archive).		✓
Hosted voicemail Take advantage of hosted Unified Messaging services that provide call answering, a dial-in user interface, and company automated attendant capabilities.		✓
Data loss prevention (DLP) Control sensitive business data with built-in DLP policies based on regulatory standards such as PII and PCI, which help to identify, monitor, and protect sensitive data through deep content analysis.		✓

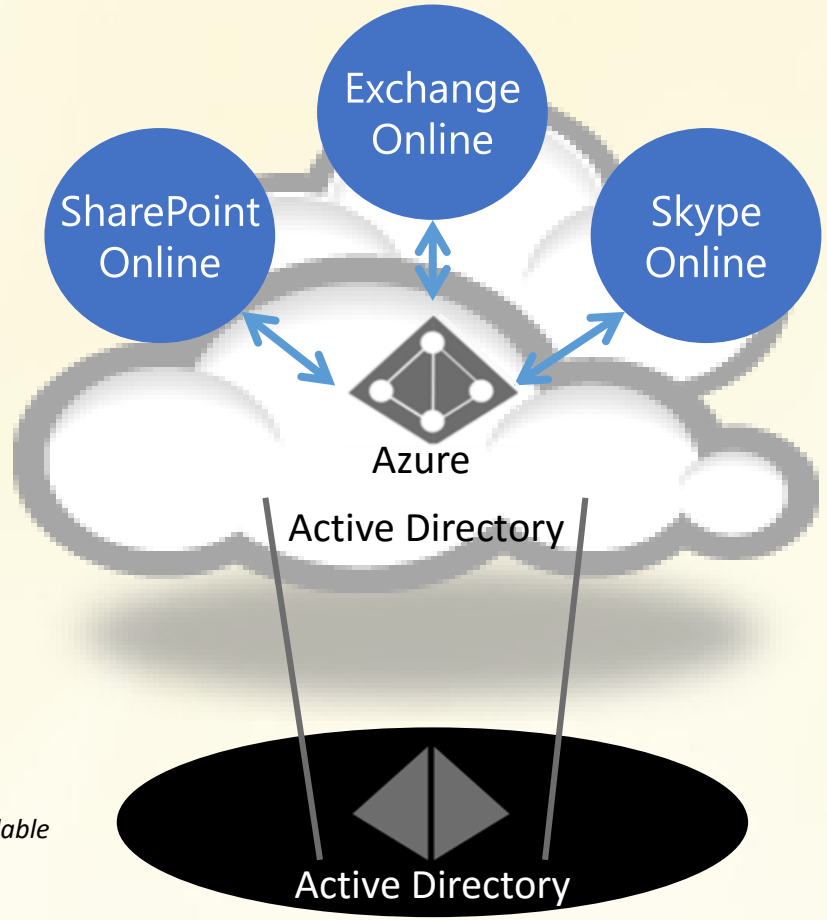
Identity and Service Management

Where are your Office 365 Identities?

Microsoft Azure Active Directory

- Azure Active Directory (Azure AD) is Microsoft's multi-tenant cloud based directory and identity management service.
- Azure AD also includes a full suite* of identity management capabilities including:
  - Multi-factor authentication
  - Device registration
  - Self-service password management
  - Self-service group management
  - Privileged account management
  - Role based access control
  - Application usage monitoring
  - Rich auditing and security monitoring and alerting.

** Subscription level (Free, Basic or Premium) determines features available*



Azure AD Features

- Every paid subscription to Office 365 comes with a free subscription to Azure Active Directory.
- To activate this subscription and access the Azure management portal directly, you have to complete a one-time registration process.
- You can use Azure AD to manage your apps and to create and manage user and group accounts independent of Office 365.

		FREE	BASIC	PREMIUM
Common Features	Directory Objects [1]	500,000 Object Limit	No Object Limit	No Object Limit
	User/Group Management (add/update/delete)/ User-based provisioning, Device registration	✓	✓	✓
	Single Sign-On (SSO)	10 apps per user[2] (pre-integrated SaaS and developer-integrated apps)	10 apps per user[2] (free tier + Application proxy apps)	No Limit (free, Basic tiers +Self-Service App Integration templates[4])
	Self-Service Password Change for cloud users	✓	✓	✓
	Connect (Sync engine that extends on-premises directories to Azure Active Directory)	✓	✓	✓
	Security/Usage Reports	3 Basic Reports	3 Basic Reports	Advanced Reports
Premium + Basic Features	Group-based access management/provisioning		✓	✓
	Self-Service Password Reset for cloud users		✓	✓
	Company Branding (Logon Pages/Access Panel customization)		✓	✓
	Application Proxy		✓	✓
	SLA		✓	✓
Premium Features	Self-Service Group and app Management/Self-Service application additions/ Dynamic Groups			✓
	Self-Service Password Reset/Change/Unlock with on-premises writeback			✓
	Multi-Factor Authentication (Cloud and On-premises (MFA Server))	--[3]	--[3]	✓
	Microsoft Identity Manager user CAL[4]			✓
	Cloud App Discovery			✓
	Connect Health			✓
	Automatic password rollover for group accounts			✓
	Azure Active Directory Join – Windows 10 only features			
	Join a device to Azure AD, Desktop SSO, Microsoft Passport for Azure AD, Administrator Bitlocker recovery	✓	✓	✓
	MDM auto-enrolment, Self-Service Bitlocker recovery, Additional local administrators to Windows 10 devices via Azure AD Join			✓

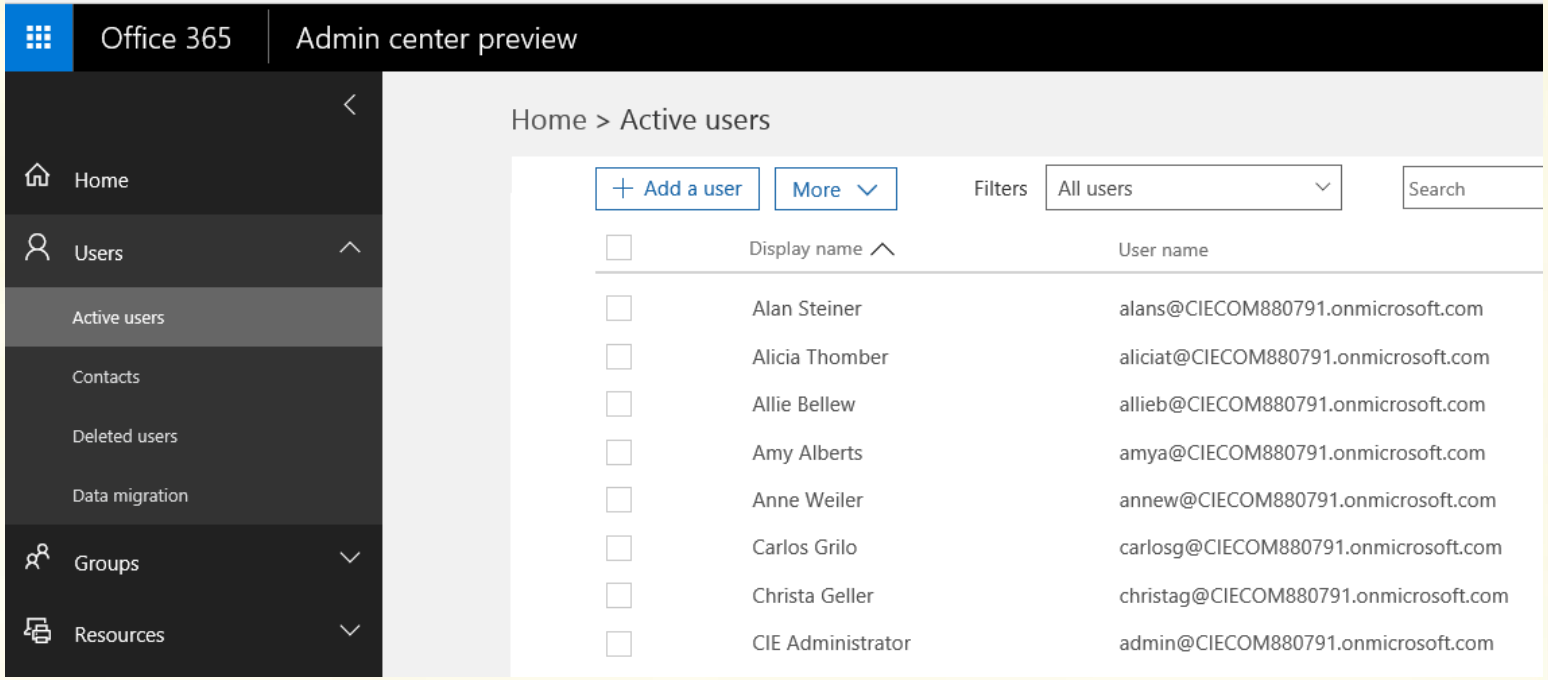
system | source 35 years

Identity Management with Office 365

Cloud identity

Windows Azure Active Directory

Single identity in the cloud Suitable for small organizations with no integration to on-premises directories



Identity Management with Office 365

Cloud identity

Windows Azure Active Directory

Single identity in the cloud Suitable for small organizations with no integration to on-premises directories

Cloud identity with directory synchronization

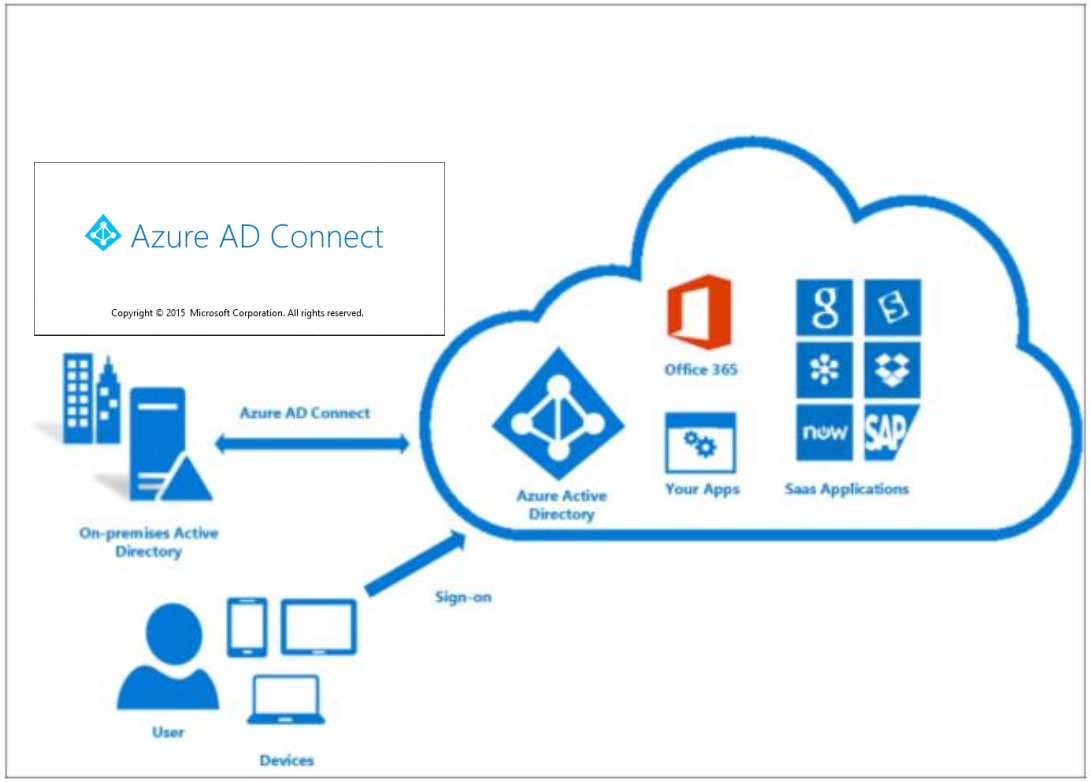
Windows Azure Active Directory

Directory Sync
(Azure AD Connect)

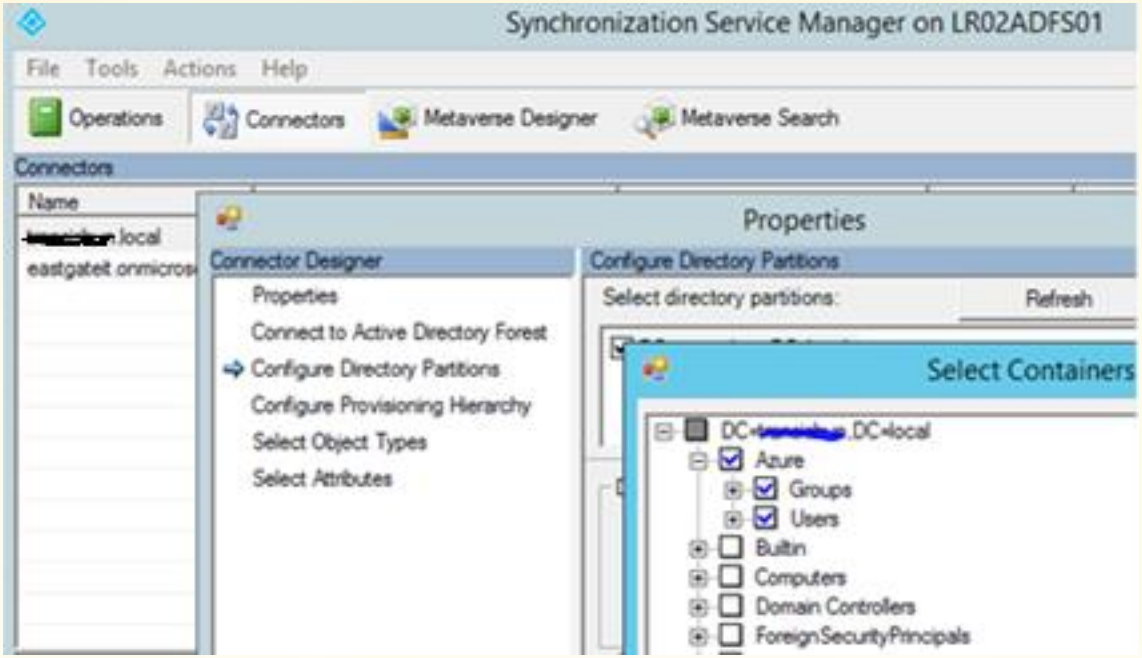
On-Premises Identity

Single identity
suitable for medium
and large organizations without
federation*

Directory Synchronization



- Install on a Windows 2008 R2 / 2012 R2 server
- Configure OUs to synchronize
- Optional – Configure attribute filtering



Directory Synchronization Considerations

- Microsoft requires an Exchange server on-premises to manage Exchange attributes
- Password synchronization requires password changes to occur in Active Directory (unless a Premium Azure AD license is purchased)
- Account management is done on-premises for most settings

Identity Management with Office 365

Cloud identity

Windows Azure Active Directory

Single identity in the cloud Suitable for small organizations with no integration to on-premises directories

Cloud identity with directory synchronization

Windows Azure Active Directory

Directory Sync
(Azure AD Connect)

On-Premises Identity

Single identity
suitable for medium
and large organizations without
federation*

Federated identity

Windows Azure Active Directory

Federation

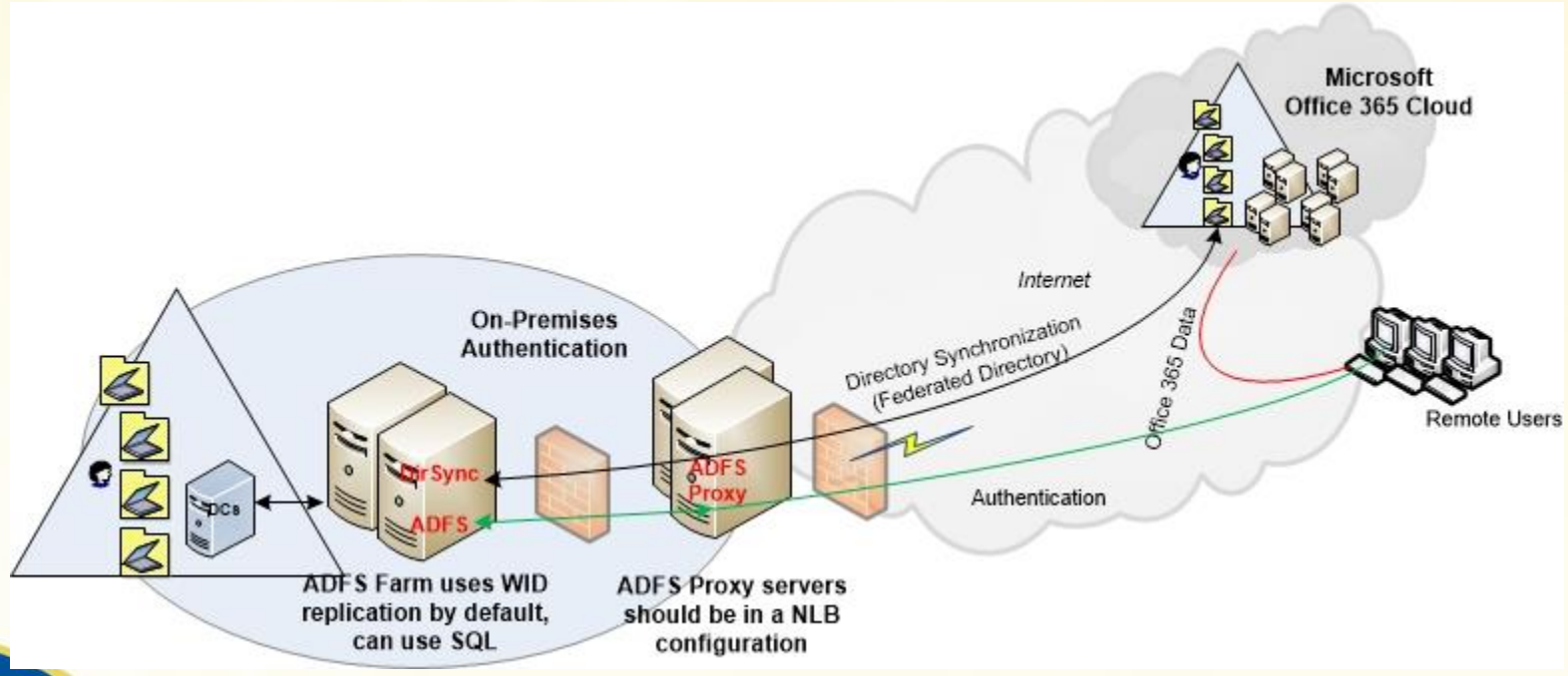
Directory Sync

On-Premises Identity

Single federated identity
and credentials suitable
for medium and large organizations

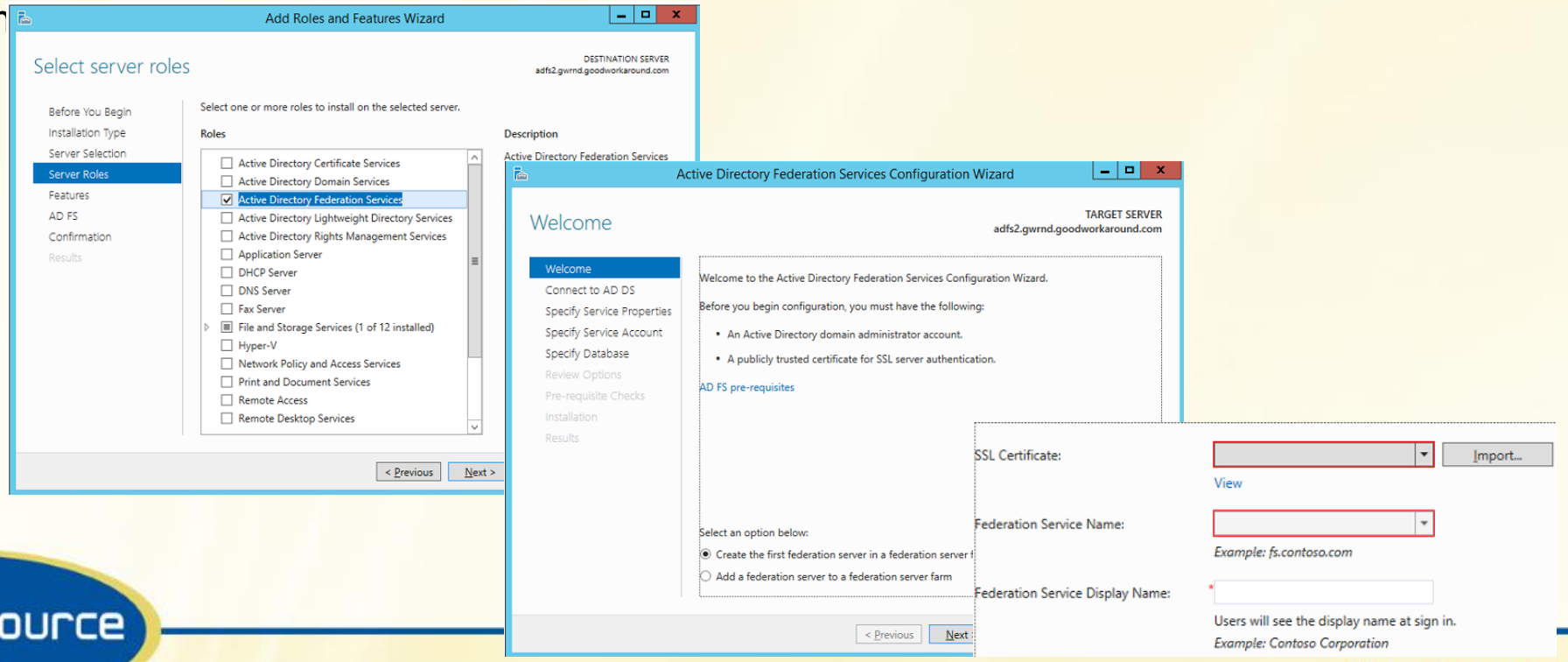
ADFS Implementation

- Multiple ADFS Servers and Proxy (Web Application Proxy)
- WID Replication and NLB for redundancy



ADFS Implementation

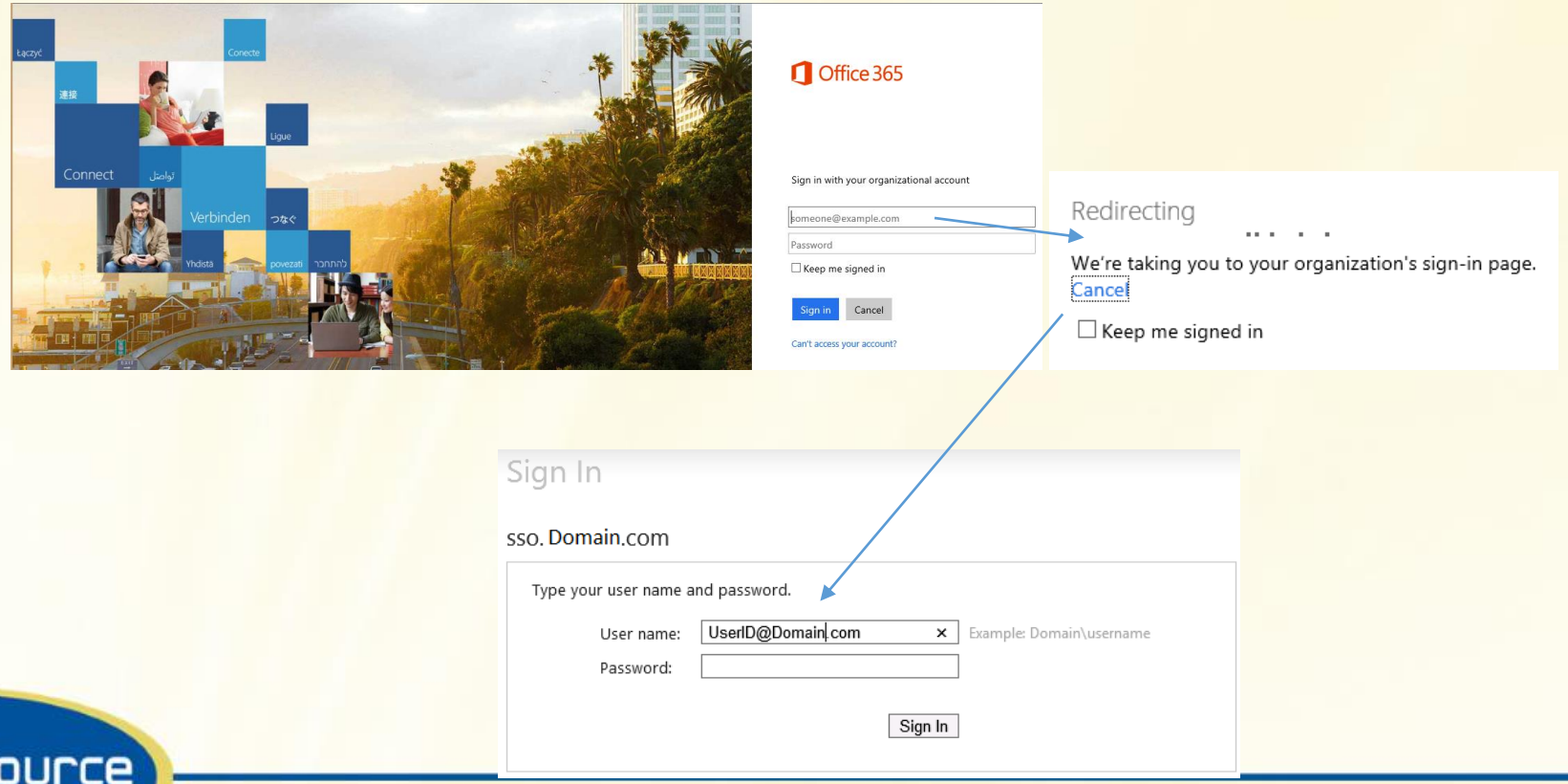
- Install the ADFS service (recommend creating a farm)
  - Requires an SSL certificate
  - Cor



ADFS Implementation

- Users are redirected to the ADFS server for authentication

  Portal.microsoftonline.com

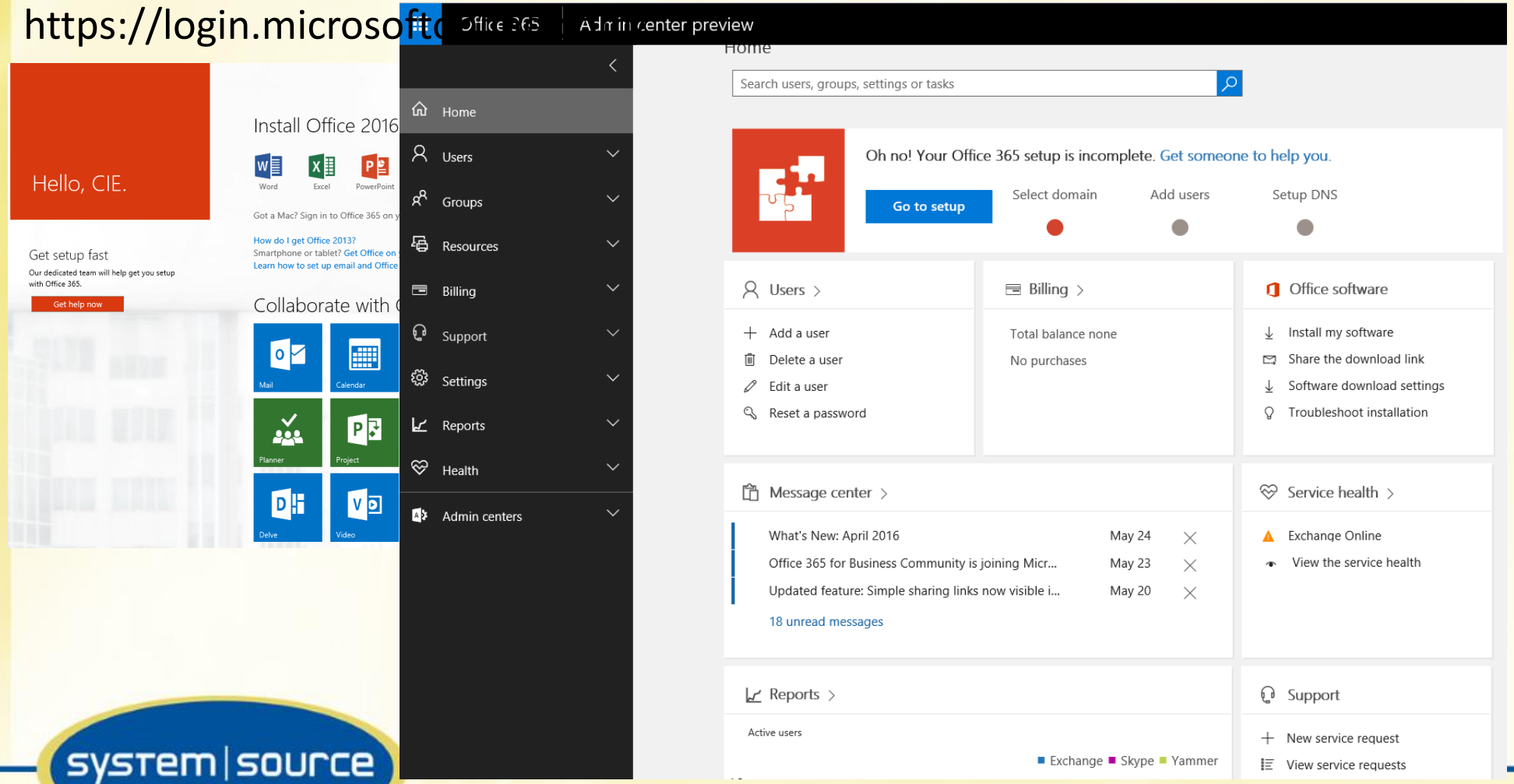


Federated Identity Considerations

- Microsoft requires an Exchange server on-premises to manage Exchange attributes
- All authentication and password resets occur on-premises. If the on-premises AD is not available the Office 365 resources will not be available.
  - Consider a fault tolerant design for your ADFS servers

Office 365 Admin Console

https://login.microsoft



system | source 35 years

the one source for IT & AV

Demo – Office 365 Management / Monitoring

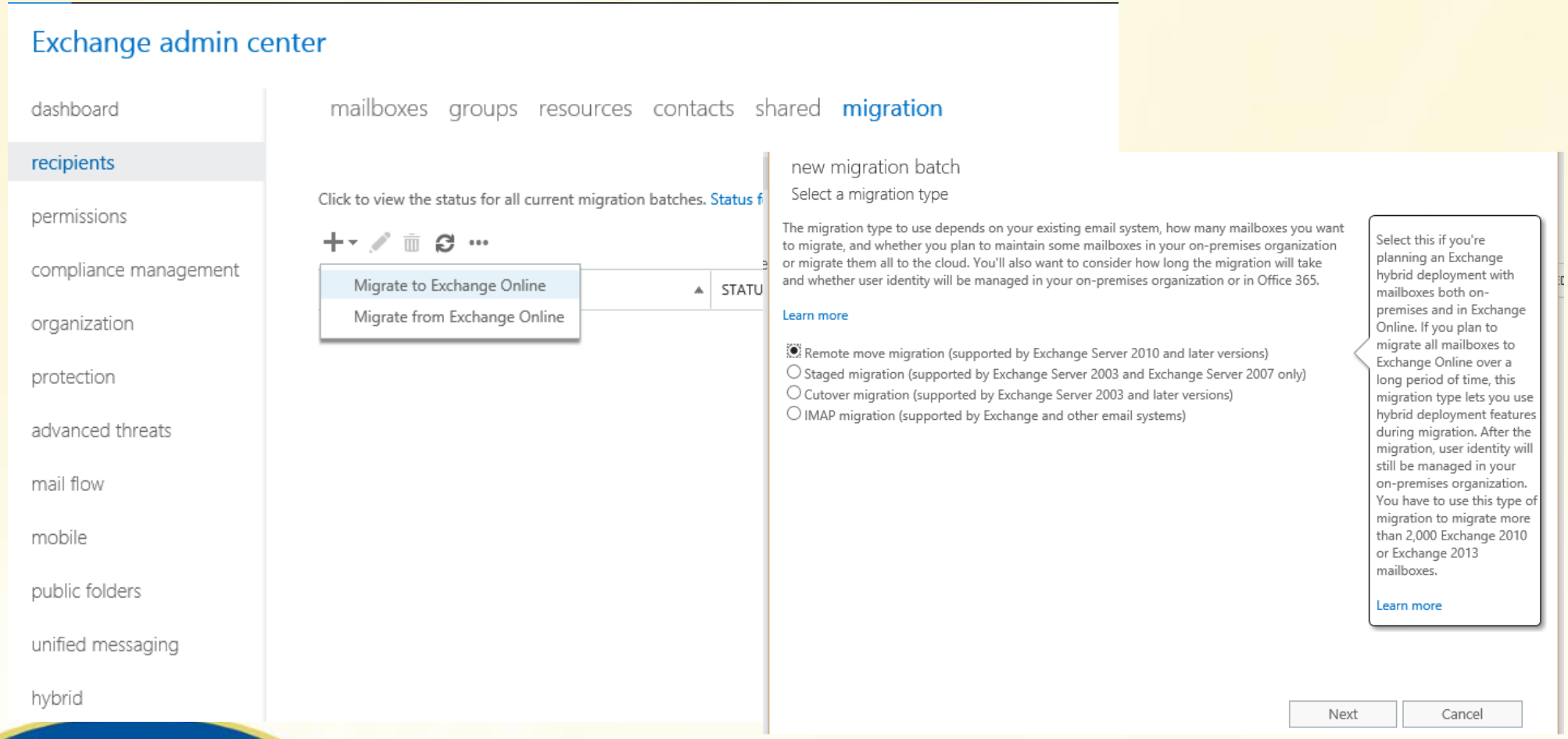
Email Migration Options

Mailbox Migration Options

Migration option	Source messaging system	Comments	Can keep mailboxes on-premises?
Cutover migration	Exchange 2016, Exchange 2013 Exchange 2010, Exchange 2007 Exchange 2003	Supports up to 2000 mailboxes; best for 150 or fewer.	No
Staged migration	Exchange 2007 Exchange 2003	Requires directory synchronization. Recommended if more than 150 mailboxes.	Yes
Hybrid	Exchange 2016 Exchange 2013 Exchange 2010	Requires directory synchronization. Provides seamless functionality across environments.	Yes
IMAP	Exchange 2000 Server or previous versions; non-Exchange messaging systems	Does not move calendar items or tasks. 500,000 item maximum.	Yes
Office 365 Import Service	Available if mail is saved in PST format. You can ship the files or upload them over the network.	If you have more than 10TB of data, shipping the drives is faster than uploading it over the network.	Yes
Third-party	For example: Lotus Notes, Novell Groupwise.	Consult your Microsoft partner for migration options.	No

More information can be found here
http://technet.microsoft.com/en-us/library/jj863291(v=exchg.150).aspx

Microsoft Migration Tools



Cutover

- Features and Benefits
  - **Simple and quick** migration solution
  - **High-fidelity** solution – all mailbox content is migrated
  - Typically best suited to **small and medium** organizations
  - Users are **provisioned automatically** during migration
  - Works with **Exchange 2003 and newer**
  - Works with **on-premises or hosted** Exchange systems
  - Identity management in the cloud (at least initially)
  - On-premises migration tool is **not** required
- Requirements and Limitations
  - **Up to 2000 mailboxes** in source system (Recommended for <150 mailboxes)
  - **Outlook Anywhere** service on source system (must have SSL cert issued by a public CA)
  - Migration Account with **Full Access** or **Receive-As** permissions to all
  - **Azure AD Conncet** tool **disabled** in O365 tenant
  - **SMTP domains** configured in O365 tenant

Cutover

- **Accounts Provisioning**
  - Migration creates users, mailboxes, DLs and contacts
  - Migration enables replies to migrated messages
    (i.e. provision process brings over the Legacy DNs)
- **Passwords**
  - No access to **passwords from source directory so New passwords** created for all users
  - A link to download passwords is sent to **admin**
  - Users must **change password** on their first login
- **User Experience**
  - Admin needs to **distribute new passwords** to users
  - **Users create their new Outlook profile** using O365 username and new passwords (Autodiscover)
  - All mail is downloaded from the Office 365 mailbox
    (i.e. the **OST** file must be recreated)

MigrationWiz by BitTitan

- A third party tool that can perform cutover migrations for mailboxes and Public Folders
- Allows Directory Synchronization to be configured
- Works with preexisting Office 365 accounts
- Enhanced data and folder filtering
- Bandwidth throttling
- Enhanced reporting
- Approximately $12 per mailbox

https://www.bittitan.com/products/migrationwiz

Staged

- Features and Benefits
  - **Simple and flexible** migration solution
  - **High-fidelity** solution – all mailbox content is migrated
  - Typically best suited to **medium and large** organizations
  - Users are provisioned with **Azure AD Connect** prior to migration
  - **No limit** on the **number of mailboxes,** users can be migrated in **batches**
  - Works with **Exchange 2003 and 2007** only, **on-premises or hosted**
  - Identity management on-premises
- Requirements and Limitations
  - **Outlook Anywhere** service on source system (must have SSL cert issued by a public CA)
  - Migration Account with **Full Access** or **Receive-As** permissions to all mailboxes
  - **Azure AD Connect** tool **enabled** in O365 tenant
  - **SMTP domain(s)** configured in O365 tenant
  - An on-premises Exchange Server must remain post-migration for management

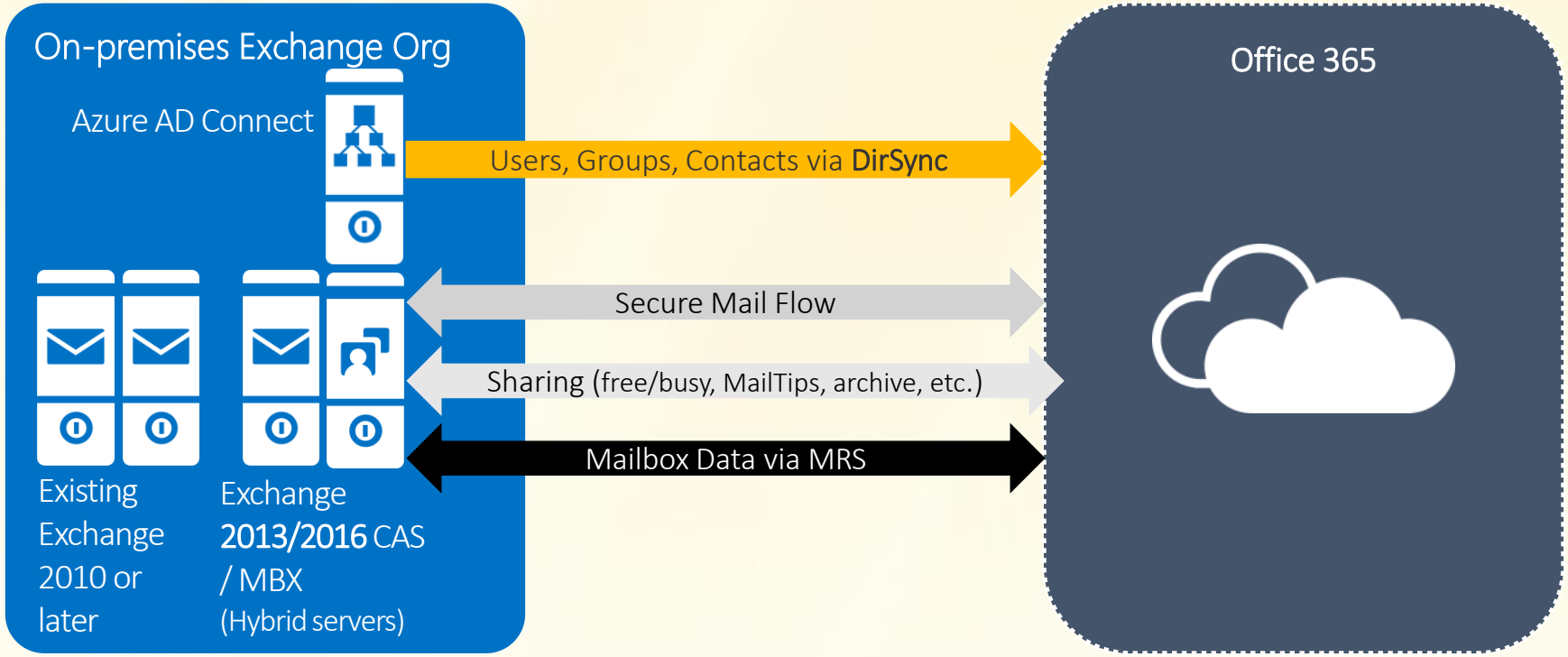
Staged

- **Accounts Provisioning**
  - For every on-premises mailbox to be migrated there needs to be a MEU or Mailbox in O365
  - Migration tool relies on Azure AD Connect to do provisioning
- **Passwords**
  - Target mailbox **passwords must be specified** for all the users
  - Administrators can force users to **change passwords** on first login
- **User Experience**
  - Admin needs to **distribute new passwords** to users
  - **Users create their new Outlook profile** using O365 username and new passwords (Autodiscover)
  - All mail is downloaded from the Office 365 mailbox (i.e. the **OST** file must be recreated)

system | source 35 years
the one source for IT & AV
Office 365

Exchange 2013/2016 Hybrid – Architecture

- Hybrid servers to host connectors to O365
- Hybrid servers control mail flow to/from the two sites (OWA, SMTP, etc)
- Hybrid servers need to remain post-migration for management



Hybrid Coexistence Feature Comparison

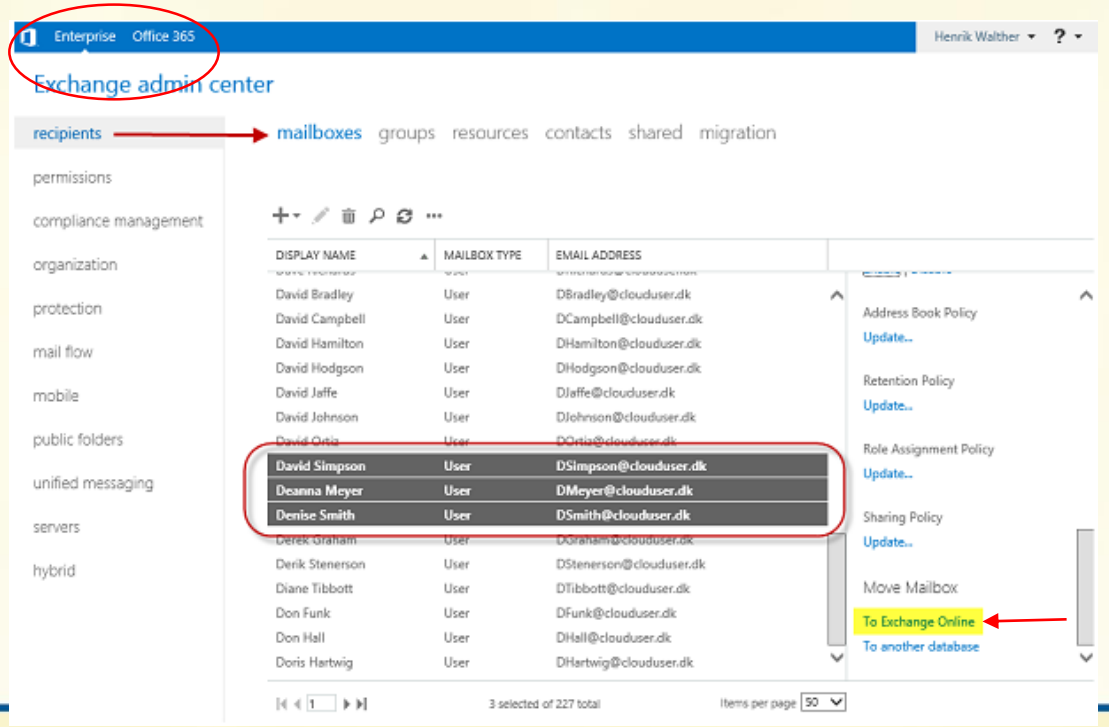
Feature	Simple	Hybrid
Mail routing between on-premises and cloud (recipients on either side)	●	●
Mail routing with shared namespace (if desired) on both sides	●	●
Unified GAL	●	●
Free/Busy and calendar sharing cross-premises		●
Out of Office understands that cross-premises is "internal" to the organization		●
Mailtips, messaging tracking, and mailbox search work cross-premises		●
OWA redirection cross-premise (single OWA URL for both on-premises and cloud)		●
Single tool to manage cross-premises Exchange functions (including migrations)		●
Mailbox moves support both onboarding and offboarding		●
No outlook reconfiguration or OST resync required after mailbox migration		●
Preserve auth header (ensure internal email is not spam, resolve against GAL, etc.)		●
Centralized mail flow , ensures that all email routes inbound/outbound via on-prem		●

Hybrid Mailbox Moves

- Mailbox migrations can go to/from Exchange online
- User's current Outlook profile is updated with the Exchange Online server name via Autodiscover.

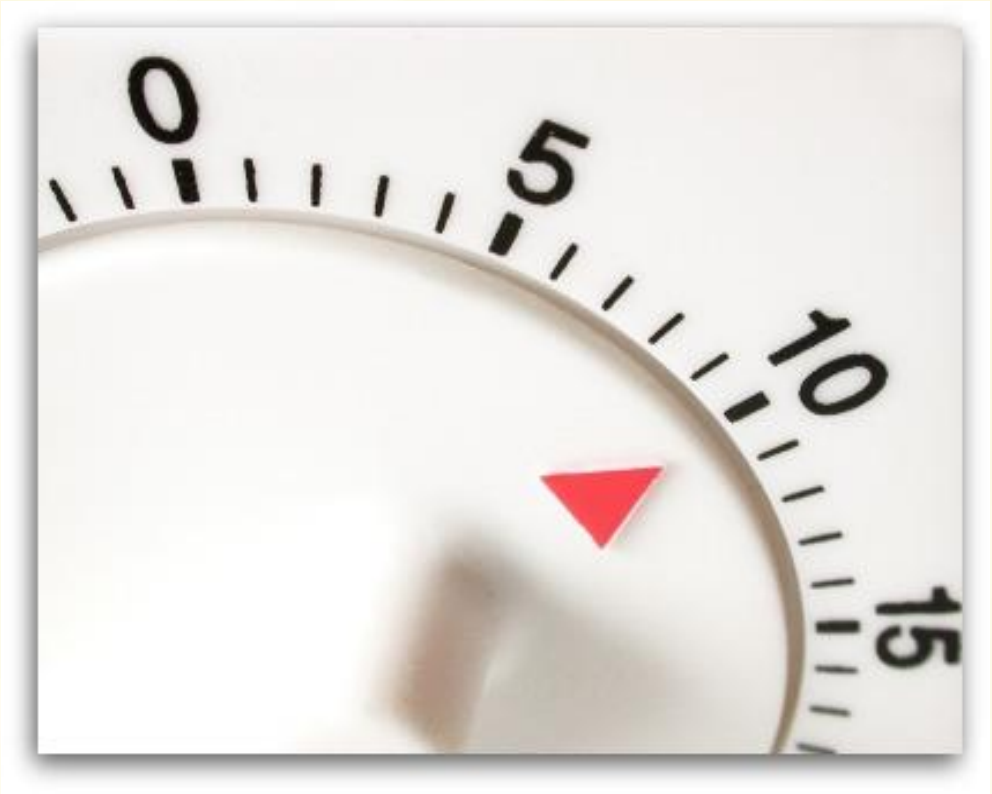
- Offline files (OST files) do not have to be recreated.

User Experience
Depending on the Outlook version, users may be unaware of the migration. Outlook will update when the migration is completed. Best experience with Outlook 2013 or better.



Questions?

Lunch Orders & :10 Break



Dustin Sitton

Evaluations & Door Prizes
Learning Center Offer
Lunch

THANK YOU!

today's slides available @
www.syssrc.com/seminar_slides