

# Windows 11 - How to get there



*Workplace Ninja Summit 2022*



## Platin Sponsor



**Patch My PC**  
PATCH MANAGEMENT MADE EASY



**Microsoft**

## Gold Sponsor

**glueckkanja gab**

**baseVISION**  
SECURE & MODERN WORKPLACE



**RECAST SOFTWARE**

**LIQUIT**

**Lenovo**

## Silver and Special Sponsors



**sepago**® EPIC  **USION**



# About me...

## Ronni Pedersen

- Cloud Architect, APENTO
- Microsoft MVP: Enterprise Mobility
- MCSE/MCSA/MCITP/MCTS and more... 😊
- ITIL Foundation Certified
- Microsoft Certified Trainer (MCT)

## Contact Info

- Mail: rop@apento.com
- Twitter: @ronnipedersen



# About me...



## Jörgen Nilsson

- Principal Consultant, Onevinn
- Microsoft MVP: Enterprise Mobility
- MCSE/MCSA/MCITP/MCTS
- ITIL Foundation Certified
- Microsoft Certified Trainer (MCT)

## Contact Info

- Mail: [Jorgen.nilsson@onevinn.se](mailto:Jorgen.nilsson@onevinn.se)
- Twitter: [@ccmexec](https://twitter.com/ccmexec)





# Agenda

---

- Readiness
- Microsoft Intune (WUfB)
- Task Sequence
- Windows Servicing
- Customizations



# Windows 11 Readiness / Endpoint Analytics

www.wpninjas.eu

- Easy to start using (Tenant attach, Intune, Co-Management)
  - Requires Windows Enterprise E3 (Microsoft 365 E3, EMS E3 or better).

			Filter: All Devices
			< Previous
			Page 1 of 1
			Next >
Managed by ↑↓	OS version ↑↓	Windows 11 readiness sta... ↑↓	Windows 11 readiness reason
Co-managed	10.0.19042.1348	Capable	--
Intune	10.0.18363.1916	Not capable	System firmware
Intune	10.0.19043.1348	Not capable	TPM, System firmware
ConfigMgr	10.0.19043.928	Unknown	--
ConfigMgr	10.0.19041.208	Unknown	--



# Windows 11 Readiness / MEMCM

www.wpninjas.eu

- Microsoft provides a PowerShell script

```
HardwareReadiness.ps1 X
27 [int]$MinOSDiskSizeGB = 64
28 [int]$MinMemoryGB = 4
29 [uint32]$MinClockSpeedMHz = 1000
30 [uint32]$MinLogicalCores = 2
31 [uint16]$RequiredAddressWidth = 64
32
33 $PASS_STRING = "PASS"
34 $FAIL_STRING = "FAIL"
35 $FAILED_TO_RUN_STRING = "FAILED TO RUN"
36 $UNDETERMINED_CAPS_STRING = "UNDETERMINED"
37 $UNDETERMINED_STRING = "Undetermined"
38 $CAPABLE_STRING = "Capable"
39 $NOT_CAPABLE_STRING = "Not capable"
40 $CAPABLE_CAPS_STRING = "CAPABLE"
41 $NOT_CAPABLE_CAPS_STRING = "NOT CAPABLE"
42 $STORAGE_STRING = "Storage"

PS C:\WINDOWS\system32> C:\Users\RonniPedersen\Downloads\HardwareReadiness.ps1
{"returnCode":0,"returnReason":"","logging":"Storage: OSDiskSize=931GB. PASS; Memory: System_Memory=32GB. PASS; TPM: TPMVersion=2.0, 0, 1.16. PASS; Processor: {AddressWidth=64; MaxClockSpeed=3096; NumberOfLogicalCores=8; Manufacturer=GenuineIntel; Caption=Intel64 Family 6 Model 158 Stepping 9; PlatformId 8}. PASS; SecureBoot: Capable. PASS; ","returnResult":"CAPABLE"}

PS C:\WINDOWS\system32>
```

<https://techcommunity.microsoft.com/t5/microsoft-endpoint-manager-blog/understanding-readiness-for-windows-11-with-microsoft-endpoint/ba-p/2770866>





# Windows 11 Readiness

- A great community readiness report available:

## Asset - Windows 11 Readiness

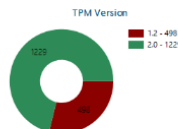
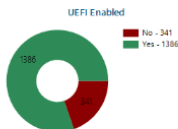
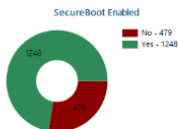
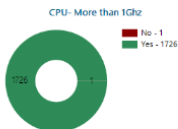
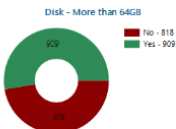
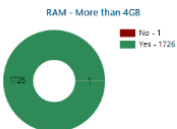
Description : List all Windows 10 devices and their hardware inventory status in order to plan a Windows 11 migration. Boxes in red flag any potential migration issues. Use search or collection parameter to narrow your results. Use the "Show Only Non-Ready" parameter to show only devices that are not ready to receive Windows 11.

Collection : All Systems | Search : % | Ready Only : 0

Total : 1727 | Page : 1 of 32

### Windows 11 Minimum Requirements

- Processor: 1 gigahertz (GHz) or faster with two or more cores on a compatible 64-bit processor
- RAM: 4 gigabytes (GB) or greater
- Storage: 64 GB or greater available storage
- System firmware: UEFI, Secure Boot capable
- TPM: Trusted Platform Module (TPM) version 2.0



Device Name	User Name	Client	Client Version	Type	OS Edition	OS Version	OS Build	OS Branch	CPU Name	CPU Speed	RAM	Free Space (GB)	Device Manufacturer	Device Model	SecureBoot Enabled	UEFI Enabled
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i7-3630QM CPU @ 2.40GHz	2400	8	23	LENOVO	24294V0	No	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	43	Dell Inc.	OptiPlex 3040	Yes	Yes
		No	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Celeron(R) CPU N3350 @ 1.10GHz	1100	4	17	Dell Inc.	Latitude 3180	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	43	HP	HP ProDesk 600 G2 SFF	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	162	HP	HP ProDesk 600 G2 SFF	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-10310U CPU @ 1.70GHz	1700	16	137	Dell Inc.	Latitude 7410	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	162	HP	HP ProDesk 600 G2 SFF	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	162	HP	HP ProDesk 600 G2 SFF	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	84	HP	HP ProDesk 600 G2 SFF	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-7500 CPU @ 3.40GHz	3400	8	166	Dell Inc.	OptiPlex 3050	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-8500 CPU @ 3.00GHz	3000	8	178	Dell Inc.	OptiPlex 5260 AIO	Yes	Yes
		No	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-8400 CPU @ 2.80GHz	2800	8	191	Dell Inc.	OptiPlex 3060	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i2 Quad CPU Q8900 @ 2.50GHz	2500	6	100	Dell Inc.	OptiPlex 755	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-4590 CPU @ 3.30GHz	3300	8	123	Dell Inc.	OptiPlex 9020	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	130	HP	HP ProDesk 600 G2 SFF	Yes	Yes
		No	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-9500 CPU @ 3.00GHz	3000	8	169	Dell Inc.	OptiPlex 3070	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5 CPU 650 @ 3.20GHz	3200	4	60	Hewlett-Packard	HP Compaq 8100 Elite SFF PC	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Celeron(R) N4120 CPU @ 1.10GHz	1100	4	17	Dell Inc.	Latitude 3190	Yes	Yes
		No	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-7500 CPU @ 3.40GHz	3400	8	65	Dell Inc.	OptiPlex 5250 AIO	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	133	HP	HP ProDesk 600 G2 SFF	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	135	Dell Inc.	OptiPlex 3040	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5 CPU 650 @ 3.20GHz	3200	4	69	Hewlett-Packard	HP Compaq 8100 Elite SFF PC	No	No
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	150	HP	HP ProDesk 600 G2 SFF	Yes	Yes
		Yes	5.00.8968.1021	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6400T CPU @ 2.20GHz	2200	8	163	HP	HP EliteDesk 800 G2 SFF	Yes	Yes
		Yes	5.00.9049.1010	x64-based PC	Microsoft Windows 10	21H1	10.0.19043	Semi-Annual (Targeted)	Intel(R) Core(TM) i5-6500 CPU @ 3.20GHz	3200	8	108	HP	HP ProDesk 600 G2 SFF	Yes	Yes

<https://systemcenterdudes.com/free-readiness-memcm-sccm-windows-11-report/>





# Remote Workers are the new normal...

[www.wpninjas.eu](http://www.wpninjas.eu)

- Network Considerations
  - VPN (Forced/Split Tunneling)
- Content Location
  - WU/MU
  - On-Prem Servers
  - Azure Shares
  - Cloud Management Gateway (DP)
  - Cloud Attached or not
- End User Support
  - What if upgrade fails?
  - Recovery/Re-provision/re-deploy?





- Optimizing network traffic for remote workers

## Optimizing Office 365 traffic for remote workers with the native Windows 10 VPN client

04/07/2020 • 14 minutes to read •

This article describes how to configure the recommendations in the article [Optimize Office 365 connectivity for remote users using VPN split tunneling](#) for the *native Windows 10 VPN client*. This guidance enables VPN administrators to optimize Office 365 usage while still ensuring that all other traffic goes over the VPN connection and through existing security gateways and tooling.

This can be achieved for the native/built-in Windows 10 VPN client using a *Force Tunneling with Exclusions* approach. This allows you to define IP-based exclusions *even when using force tunneling* in order to "split" certain traffic to use the physical interface while still forcing all other traffic via the VPN interface. Traffic addressed to specifically defined destinations (like those listed in the Office 365 optimize categories) will therefore follow a much more direct and efficient path, without the need to traverse or "hairpin" via the VPN tunnel and back out of the corporate network. For cloud-services like Office 365, this makes a huge difference in performance and usability for remote users.

### Note

The term *force tunneling with exclusions* is sometimes confusingly called "split tunnels" by other vendors and in some online documentation. For Windows 10 VPN, the term *split tunneling* is defined differently as described in the article [VPN routing decisions](#).

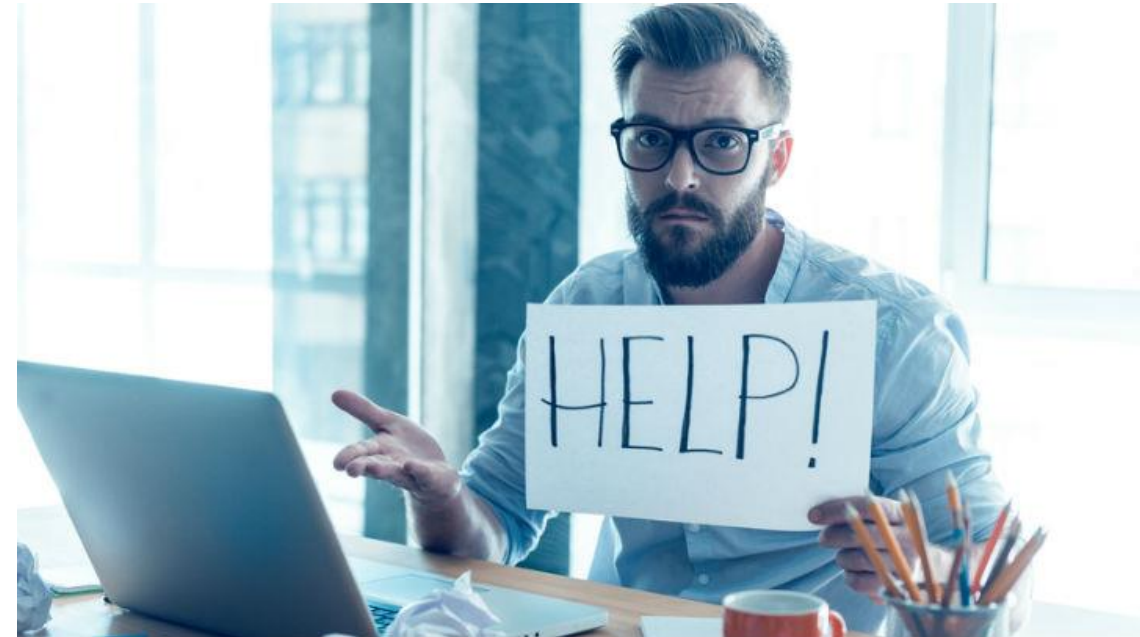
<https://docs.microsoft.com/en-us/windows/security/identity-protection/vpn/vpn-office-365-optimization>



# Challenges with Feature Updates

[www.wpninjas.eu](http://www.wpninjas.eu)

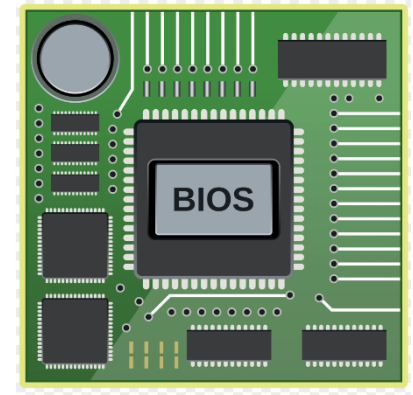
- BIOS and Drivers Updates
- Outdated and unsupported Applications
- Pending Reboots
- Missing updates (CU and Security)
- Language Packs





# Driver/BIOS Mangement

- Community Tool: MSEndpointMgr Modern Driver Management  
<https://msendpointmgr.com/modern-driver-management/>  
Modern Driver Management should soon support Intune standard alone
- HP are updating BIOS/Firmware using MU for example:  
<http://h10032.www1.hp.com/ctg/Manual/c06696094>
- Updates Drivers from Microsoft Update
  - Most major venders has now started to update drivers using MU





# MSEndpointMgr Intune BIOS Control

www.wpninjas.eu

Driver Automation Tool: Version 7.0.0

**MSEndpointMgr** **Driver Automation Tool**  
Automates the process of downloading, extracting and importing Driver and BIOS updates into Configuration Manager, Intune, MDT and other OS deployment solutions

Make & Model Selection | OEM Driver Catalogs | Common Settings | ConfigMgr Settings | MDT Settings | ConfigMgr Packages | ConfigMgr Web Service Diags  
Custom Package Creation | Intune BIOS Control | Process Log | About

**Intune BIOS Control**

BIOS Management | Onboarding

NB: At present we should now point out that this initial release supports HP only. We are adding additional OEM's and they will come on stream in the coming weeks.

Selected	OEM	Model			
<input type="checkbox"/>	HP	EliteBook 830 G8			
<input type="checkbox"/>	HP	EliteBook 840 G7 Notebook PC	1.06.01	1.06.01	8723
<input type="checkbox"/>	HP	Elite Dragonfly G2 Notebook PC	1.06.03	1.06.03	8716
<input type="checkbox"/>	HP	ZBook Firefly 14 G7 Mobile Workstation	1.06.01	1.06.01	8723
<input type="checkbox"/>	HP	ZBook Firefly 14 G7 Mobile Workstation	1.07.01	1.06.01	8724
<input type="checkbox"/>	HP	Elite Slice for Meeting Rooms	2.53	2.53	81c3
<input type="checkbox"/>	HP	Elite Slice for Meeting Rooms	2.53	2.53	8396
<input type="checkbox"/>	HP	EliteBook 855 G8 Notebook PC	1.06.03	1.06.03	8895
<input type="checkbox"/>	HP	EliteBook 735 G6 Notebook PC	1.17.00	1.17.00	8589

Select All | Select None | Refresh Azure XML Values

Tenant ID  
Storage Location  
Storage URL  
XML Control Actions  
Push Production Update(s)  
Push Latest To Production

Reset Tool | Start Download | Extract | Import

**UPDATE...**

time to update your BIOS!  
Update Notification

**Firmware update needed!**

For security reasons it is important that the firmware on your machine is up to date. This update requires a reboot of your device

Please save your work and restart your device today. Thank you in advance.

1 hour

Restart Now | Snooze






# Driver Updates using WUfB

- Drivers updates comes from the vendor
- Can cause many annoying reboots

Software Center

HOFFMANN A/S

## Windows Update

 **Genstart er påkrævet (anslået: 4 min)**  
Din organisation kræver, at din enhed genstartes inden 25-05-2022.  
[Planlæg genstarten](#) [Genstart nu](#)

HP Inc. - Firmware - 1.9.0.0 Ventende genstart

[RESTART](#) [SNOOZE](#)

## Driveropdateringer (50)

Intel - net - 22.110.1.1  
Installationen blev fuldført d. 25-05-2022

HP Inc. - Firmware - 1.9.0.0  
Installationen blev fuldført d. 24-05-2022

Intel Corporation - Display - 30.0.101.1404  
Installationen blev fuldført d. 23-05-2022

Intel - SoftwareComponent - 2130.1.16.40  
Installationen blev fuldført d. 23-05-2022

Intel - SoftwareComponent - 2143.64.70.0  
Installationen blev fuldført d. 18-05-2022



# Updates Drivers from Microsoft Update

www.wpninjas.eu

```
#search and list all missing Drivers
(New-Object -ComObject Microsoft.Update.ServiceManager).Services
$updateSvc = New-Object -ComObject Microsoft.Update.ServiceManager
$updateSvc.AddService2("7971f918-a847-4430-9279-4a52d1efe18d",7,"")

$Session = New-Object -ComObject Microsoft.Update.Session
$Searcher = $Session.CreateUpdateSearcher()

$Searcher.ServiceID = '7971f918-a847-4430-9279-4a52d1efe18d'
$Searcher.SearchScope = 1 # MachineOnly
$Searcher.ServerSelection = 3 # Third Party

$criteria = "IsInstalled=0 and Type='Driver' and ISHidden=0"
Write-Host('Searching Driver-Updates...') -Fore Green
$searchResult = $Searcher.Search($criteria)
$updates = $searchResult.Updates

#Show available Drivers

$updates | select Title, DriverModel, DriverVerDate, DriverClass, DriverManufacturer

#Download the Drivers from Microsoft

$updatesToDownload = New-Object -Com Microsoft.Update.UpdateColl
$updates | % { $updatesToDownload.Add($_) | out-null }
Write-Host('Downloading Drivers...') -Fore Green
$updateSession = New-Object -Com Microsoft.Update.Session
$downloader = $updateSession.CreateUpdateDownloader()
$downloader.Updates = $updatesToDownload
$downloader.Download()

#Check if the Drivers are all downloaded and trigger the Installation

$updatesToInstall = New-Object -Com Microsoft.Update.UpdateColl
$updates | % { if($_.IsDownloaded) { $updatesToInstall.Add($_) | out-null } }

Write-Host('Installing Drivers...') -Fore Green
$installer = $updateSession.CreateUpdateInstaller()
$installer.Updates = $updatesToInstall
$installationResult = $installer.Install()
if($installationResult.RebootRequired) {
    Write-Host('Reboot required! please reboot now..') -Fore Red
} else { Write-Host('Done..') -Fore Green }
```

```
PS C:\WINDOWS\system32> $updates | select Title, DriverModel, DriverVerDate, DriverClass, DriverManufacturer | fl
```

```
Title           : INTEL - System - 7/18/1968 12:00:00 AM - 10.1.14.4
DriverModel      : Intel(R) Host Bridge/DRAM Registers - 3ED0
DriverVerDate    : 18/07/1968 00.00.00
DriverClass      : OtherHardware
DriverManufacturer : INTEL
```

```
Title           : Intel - net - 22.20.0.6
DriverModel      : Intel(R) Wireless-AC 9560 160MHz
DriverVerDate    : 30/11/2020 00.00.00
DriverClass      : Networking
DriverManufacturer : Intel Corporation
```

```
Title           : Intel Corporation - Bluetooth - 22.20.0.3
DriverModel      : Intel(R) Wireless Bluetooth(R)
DriverVerDate    : 27/11/2020 00.00.00
DriverClass      : OtherHardware
DriverManufacturer : Intel Corporation
```

```
$updatesToDownload = New-Object -Com Microsoft.Update.UpdateColl
$updates | % { $updatesToDownload.Add($_) | out-null }
Write-Host('Downloading Drivers...') -Fore Green
$updateSession = New-Object -Com Microsoft.Update.Session
$downloader = $updateSession.CreateUpdateDownloader()
$downloader.Updates = $updatesToDownload
$downloader.Download()
Downloading Drivers...
```


```
HResult ResultCode
-----
0           2
```






# Pending Reboots / Notifications

[www.wpninjas.eu](http://www.wpninjas.eu)



 **Good afternoon Martin**  
Software Center • [www.imab.dk](http://www.imab.dk)


**Don't let your password expire!**


Your password for the imab.dk domain is about to expire. Save yourself the trouble and change your password today.

To change your password, press CTRL+ALT+DEL and choose 'Change a Password'.

Your password will expire on: 11. oktober 2019

[Settings](#) [Dismiss](#)



 **Good afternoon Martin**  
Software Center • [www.imab.dk](http://www.imab.dk)

**Windows 10 upgrade available!**


There's a new Windows upgrade available. Do yourself a favor and install it yourself... or we will do it for you :-)


Don't worry! You will receive an adequate amount of reminders before any actions are taken automatically.

**Your deadline is:**  
30. september 2019 08:00

Click snooze to be reminded again in:

[Install](#) [Snooze](#) [Dismiss](#)



 **Good evening Martin**  
Software Center • [www.imab.dk](http://www.imab.dk)

**Your computer needs to restart!**

For security and stability reasons, we kindly ask you to restart your computer as soon as possible.

Restarting your computer on a regular basis ensures a secure and stable Windows. Thank you in advance.

Your computer is required to restart due to having exceeded the maximum allowed uptime.

**Computer uptime: 0 days**

[Restart now](#) [Dismiss](#)

<https://www.imab.dk/windows-10-toast-notification-script/>

# Windows 11 Feature Updates

Windows Update for Business in Microsoft Intune





# Windows Update for Business

[www.wpninjas.eu](http://www.wpninjas.eu)

- Pros

- Devices access Windows Update directly for the updates
  - Simple infrastructure and Less work
- Simple Management
- Microsoft hold back updates for “bad” devices (Safeguard Hold)
- Included driver updates

- Cons

- Limited Control
- Maximum 1 year postpone
- Limited Reporting





# Optional: Custom Power BI Reports

[www.wpninjas.eu](http://www.wpninjas.eu)





# Windows 11 Feature Updates (Intune)

---

[www.wpninjas.eu](http://www.wpninjas.eu)

## This feature is still in public preview

- Telemetry must be turned on
  - Minimum setting of **Basic**.

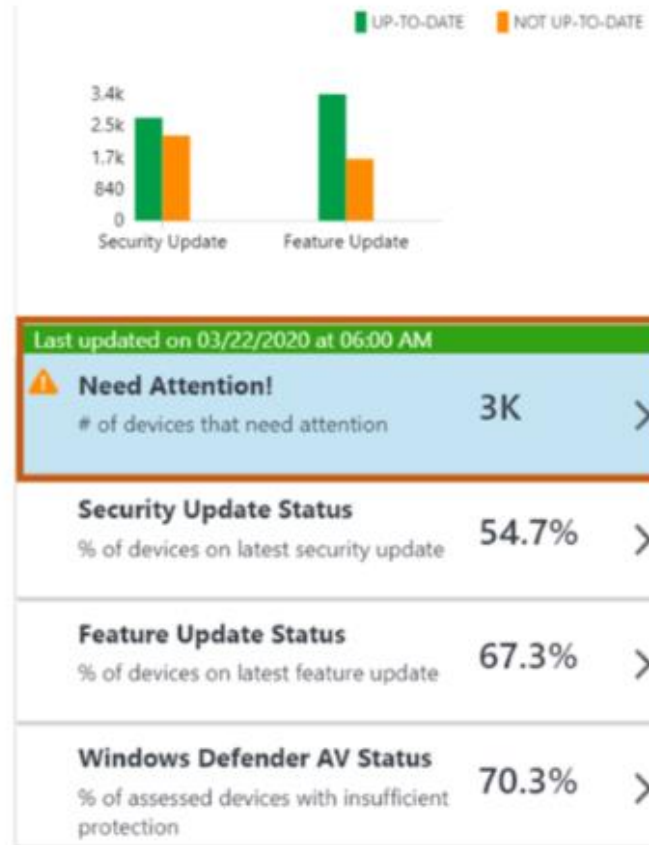
## Important

- The **Feature update deferral period (days)** must be set to **0**.
- **Windows Autopilot**: The feature updates policy cannot be applied during the out of box experience (OOBE). (Can take up to 1 day).



# Safeguard Holds

- Diagnostic Data is used to determine whether a devices are ready for a feature update...
- Goal: To ensure a smooth experience!



## LIST OF QUERIES

- Feature Update deployment issues  
[WaaSDeploymentStatus | where UpdateCategory == "Feature" ...](#)
- Deferral configurations for Feature Update  
[WaaSUpdateStatus | summarize count\(ComputerID\) by Feature...](#)
- Pause configurations for Feature Update  
[WaaSUpdateStatus | summarize count\(ComputerID\) by Feature...](#)
- Devices pending reboot to complete feature updates  
[WaaSDeploymentStatus | where UpdateCategory == "Feature" ...](#)
- Devices with a safeguard hold  
[WaaSDeploymentStatus | where DetailedStatus == "Safeg..."](#)
- Target build distribution of devices with a safeguard hold  
[WaaSDeploymentStatus | where DetailedStatus == "Safeg..."](#)
- Security Update Deployment Issues  
[WaaSDeploymentStatus | where UpdateCategory == "Quality" ...](#)
- Deferral configurations for Quality Update  
[WaaSUpdateStatus | summarize count\(ComputerID\) by Quality...](#)
- Pause configurations for Quality Update  
[WaaSUpdateStatus | summarize count\(ComputerID\) by Quality...](#)
- Devices pending reboot to complete security updates  
[WaaSDeploymentStatus | where UpdateCategory == "Quality" ...](#)
- OS Edition distribution for the devices  
[WaaSUpdateStatus | summarize DeviceCount = count\(\) by OSE...](#)





# Requirements for Feature Updates in Intune

---

www.wpninjas.eu

- License: Intune + Windows Enterprise E3, VDA or Business Premium
- Windows 10/11 that remains in support
- Hybrid AD joined or Azure AD joined (enrolled in Intune MDM)
- Have Telemetry turned on
  
- *Windows 10/11 Enterprise LTSC is not supported*

<https://docs.microsoft.com/en-us/mem/intune/protect/windows-10-feature-updates>





# Make updates available gradually

www.wpninjas.eu

## New Rollout Options

- First group availability
- Final group availability
- Days between groups

## Example:

- Clients: 400
- First day: 1/1-2022
- Last day: 10/1-2022
- Days between: 3
- Result: **4 Rings** (1/1, 4/1, 7/1, 10/1)

1 Deployment settings 2 Review + save

**i** Enable Windows health monitoring and select Windows Update scope to get detailed device states and errors. [Learn more](#)

Name \* Windows 11 (21H2)

Description

Feature deployment settings

Feature update to deploy ⓘ Windows 11

**i** By selecting this Feature update to deploy you are agreeing that when applying this operating system to a device either (1) the applicable Windows license was purchased through volume licensing, or (2) that you are authorized to bind your organization and are accepting on its behalf the relevant Microsoft Software License Terms to be found here <https://go.microsoft.com/fwlink/?linkid=2171206>.

Rollout options \*

☐ Make update available as soon as possible

☐ Make update available on a specific date

☒ Make update available gradually

When would you like to make the update available in Windows Update?

First group availability \* 12/01/2021

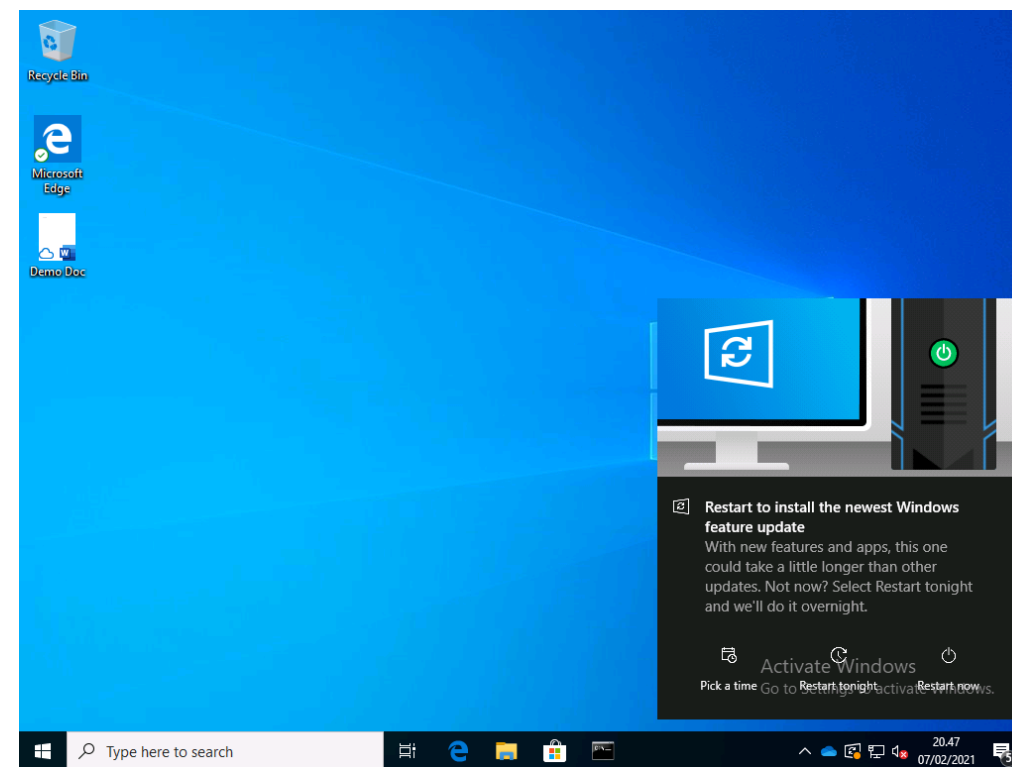
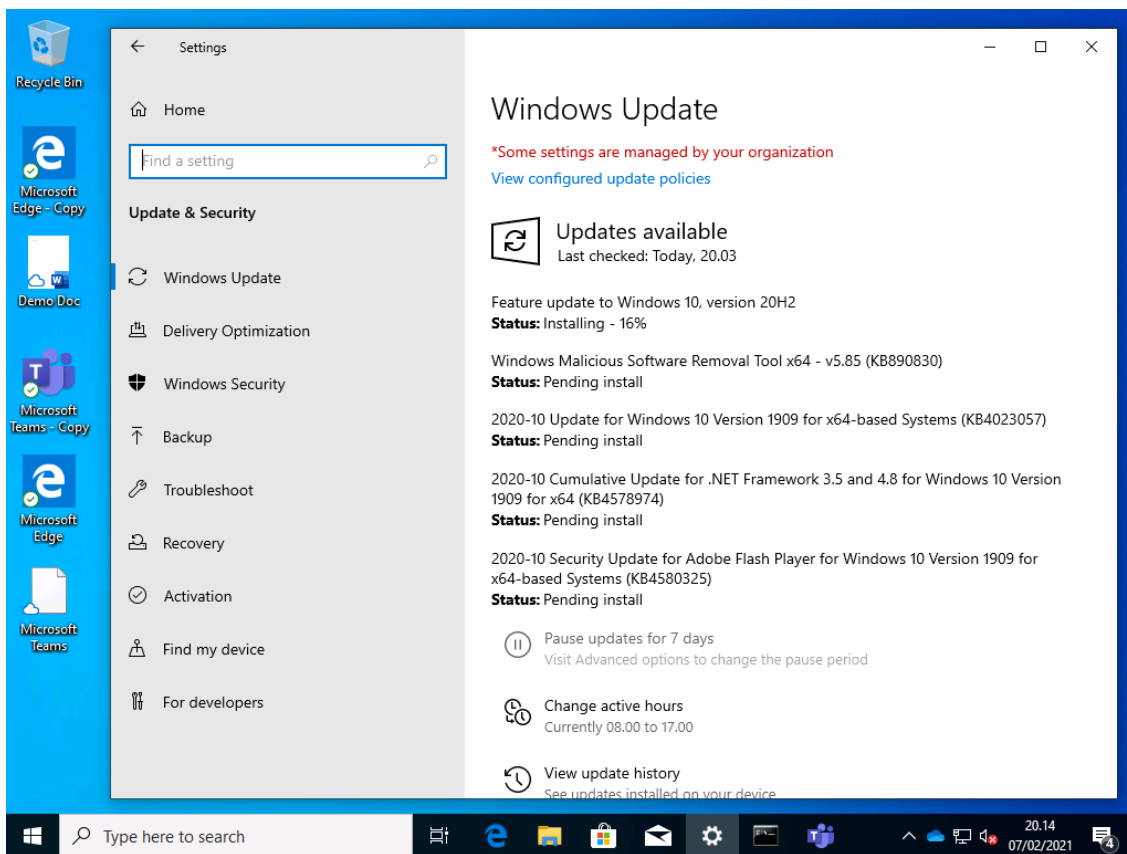
Final group availability \* 03/01/2022

Days between groups 10



# End User Experience (1909 → xxxx)

www.wpninjas.eu





# Reports: Windows updates (preview)

Home > Reports

## Reports | Windows updates (preview)

Search (Ctrl+ /) <<

Overview

### Device management

Device compliance

Group policy analytics (preview)

Windows updates (preview)

Cloud attached devices (preview)

### Endpoint security

Microsoft defender antivirus

Firewall

### Analytics

Endpoint analytics

### Intune data warehouse

Data warehouse

Summary Reports

Refresh

Last refreshed on: 2/8/2021, 2:08:18 PM

### Windows update

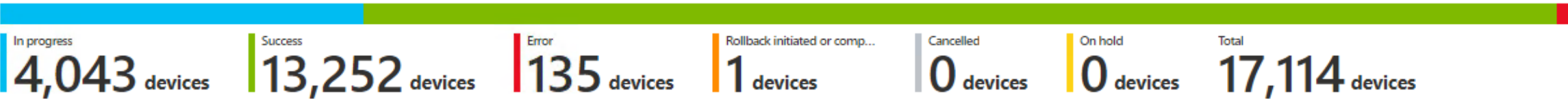


Devices ↑↓	UPN ↑↓	Intune Device ID ↑↓	AAD Device ID ↑↓	Last Event Time ↑↓	Update State	Update Substate	Update Aggregated S...
MININT-RLCM8T8	rop@techpreview.dk	4e1d242a-de6a-4f95-b9...	233486f3-1ceb-4b5a-a2...	2/9/2021, 10:00:00 AM	Installed	Update installed	Success
TPPC-0901	rop@techpreview.dk	b80efc22-e7d9-420b-9f...	03fb09da-8960-4e24-90...	2/7/2021, 2:45:06 PM	Pending	Scheduled	In progress
TPPC-2315	rop@techpreview.dk	c3c91379-f4d0-4d44-89...	b668834e-3a0f-49a7-90...	2/9/2021, 4:00:00 AM	Installed	Update installed	Success
TPPC-3826	rop@techpreview.dk	a8f7da64-241c-4948-92...	7cc7944c-88b6-49d9-94...	2/7/2021, 2:45:06 PM	Pending	Scheduled	In progress
TPPC-4085	rop@techpreview.dk	bda1191d-2388-47cd-a...	692baff1-f6fb-4ff9-af5d-...	2/8/2021, 10:45:21 PM	Offering	Offer ready	In progress
TPPC-7412	rop@techpreview.dk	ffab687d-1795-4565-ac8...	68d0fa2b-39ef-44c3-9b...	2/7/2021, 2:45:06 PM	Pending	Scheduled	In progress



# Customer after 60 days (gradually roll-out)

Windows Feature updates



Profile	↑↓	Versions	↑↓	Success	↑↓	Error	↑↓	In progress	↑↓	Rollback initiate...↑↓	Cancelled
Feature Update for devices running old versions of Windows		Windows 10, version 21H2		17		1		112		0	0
Feature Updates - Ring 0 (Windows 11 21H2)		Windows 11, version 21H2		32		1		15		0	0
Feature Updates - Ring 1 (Windows 10 21H2)		Windows 10, version 21H2		448		14		111		0	0
Feature Updates - Ring 2 (Windows 10 21H2)		Windows 10, version 21H2		945		4		189		0	0
Feature Updates - Ring 3 (Windows 10 21H2)		Windows 10, version 21H2		11810		115		3616		1	0



# Migrating from other solutions

www.wpninjas.eu



- Using Proactive Remediations and Log Analytics
- Ensure Windows Update Settings are Optimal and Compliant.

Edit - 🧑‍🔧 WU Device Settings Inventory ...

## Service Breaking Settings

Registry Key
Software\Policies\Microsoft\Windows\WindowsUpdate
Software\Policies\Microsoft\Windows\WindowsUpdate
Software\Policies\Microsoft\Windows\WindowsUpdate\AU

1 Settings 2 Review + save

1 This script will run in detect-only mode because there is no remediation script.

Create a custom script package from scripts you've written. By default, scripts will run on assigned devices every day.

Detection script file	Select a file
Detection script	<div>1</div> <pre>&lt;# .SYNOPSIS Inventory Windows Update device settings .DESCRIPTION This script is designed to be run as a Proactive Remediation. Registry keys are inventoried on the device and uploaded to Log Analytics. Admins are able to visualise the Windows Update settings in force across their</pre>
Remediation script file	Select a file
Remediation script	<div>Input script text</div>

Run this script using the logged-on credentials ☐ Yes ☒ No

Enforce script signature check ☐ Yes ☒ No

Run script in 64-bit PowerShell ☒ Yes ☐ No 

2

### General

- Workspace summary
- Workbooks
- Logs
- Solutions
- Usage and estimated costs
- Properties
- Service Map

- Alert
- AppCenterError
- AuditLogs
- ComputerGroup
- Operation
- SigninLogs
- Usage
- Custom Logs**
  - WUDevice\_Settings\_CL

<https://msendpointmgr.com/2022/05/13/windows-update-settings-compliance/>



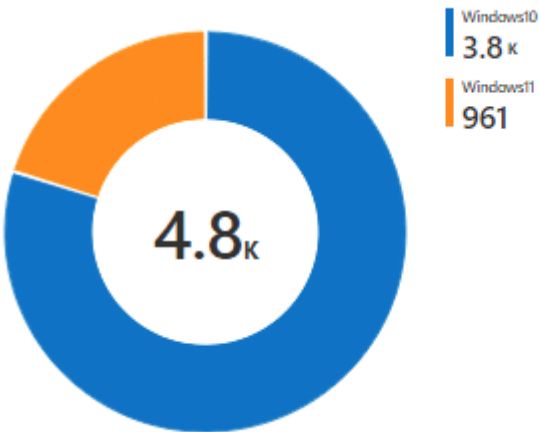
# Settings Summary



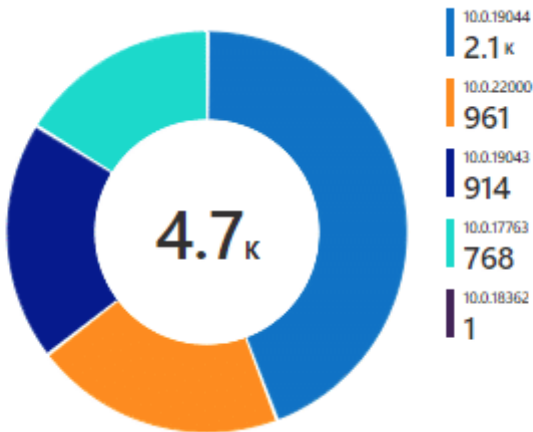
Dashboard Information WSUS Statistics Co-Management Details Script

Windows Update Settings Summary

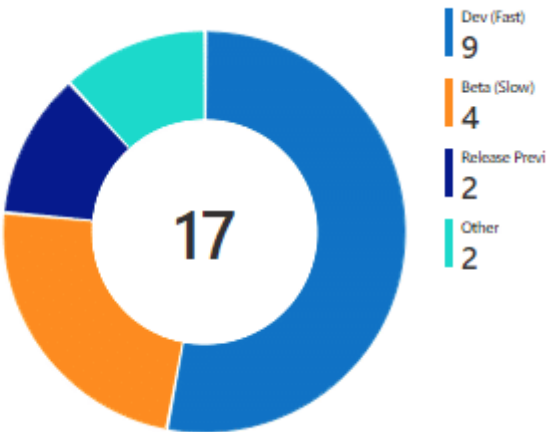
Windows OS Distribution



Windows Build Distribution



Preview Build Targeting

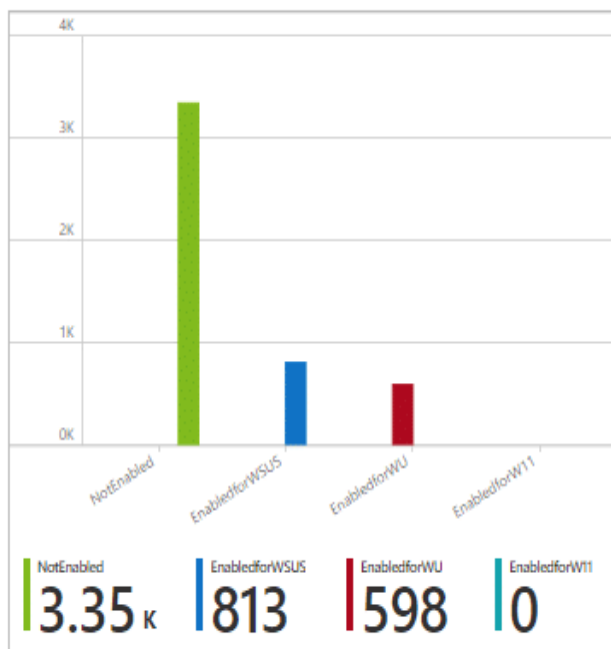




# Service Break Settings



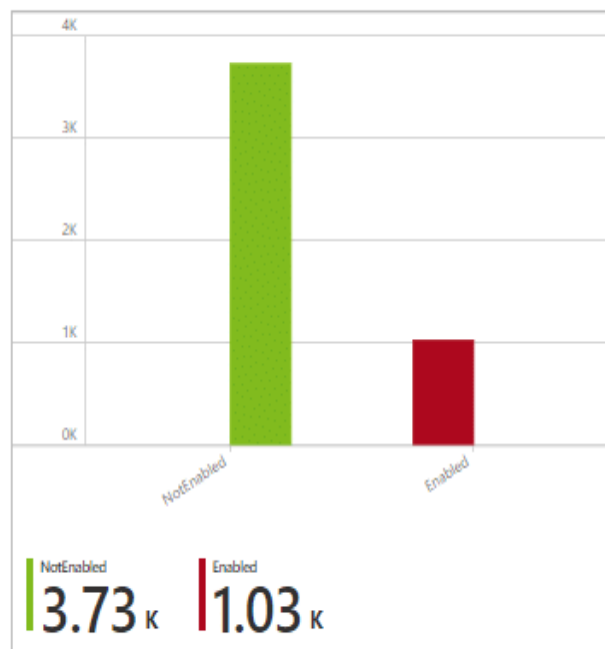
DisableDualScan



DisableDualScan

Setting	↑↓	Devices↑↓
NotEnabled		3346
Enabled (WU)		598
Enabled (WSUS)		813

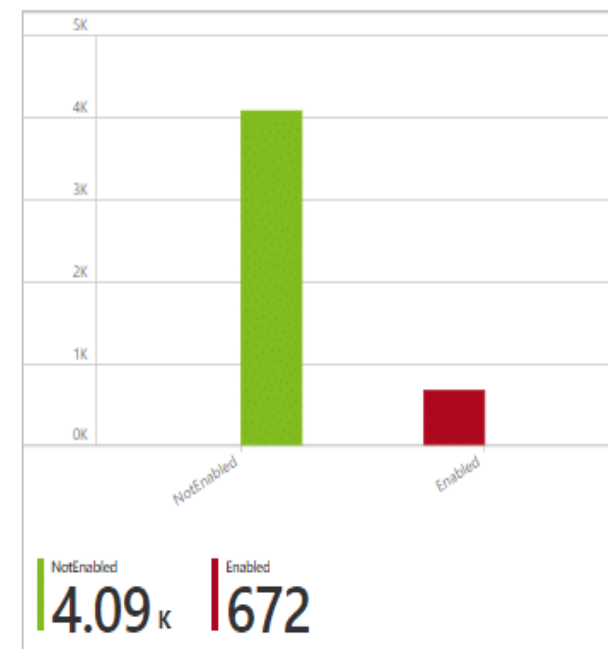
NoAutoUpdate



NoAutoUpdate

Setting	↑↓	Devices↑↓
NotEnabled		3729
Enabled		1028

DoNotConnectToWindowsUpdateInternetLocations



DoNotConnectToWindowsUpdateInternetLocations

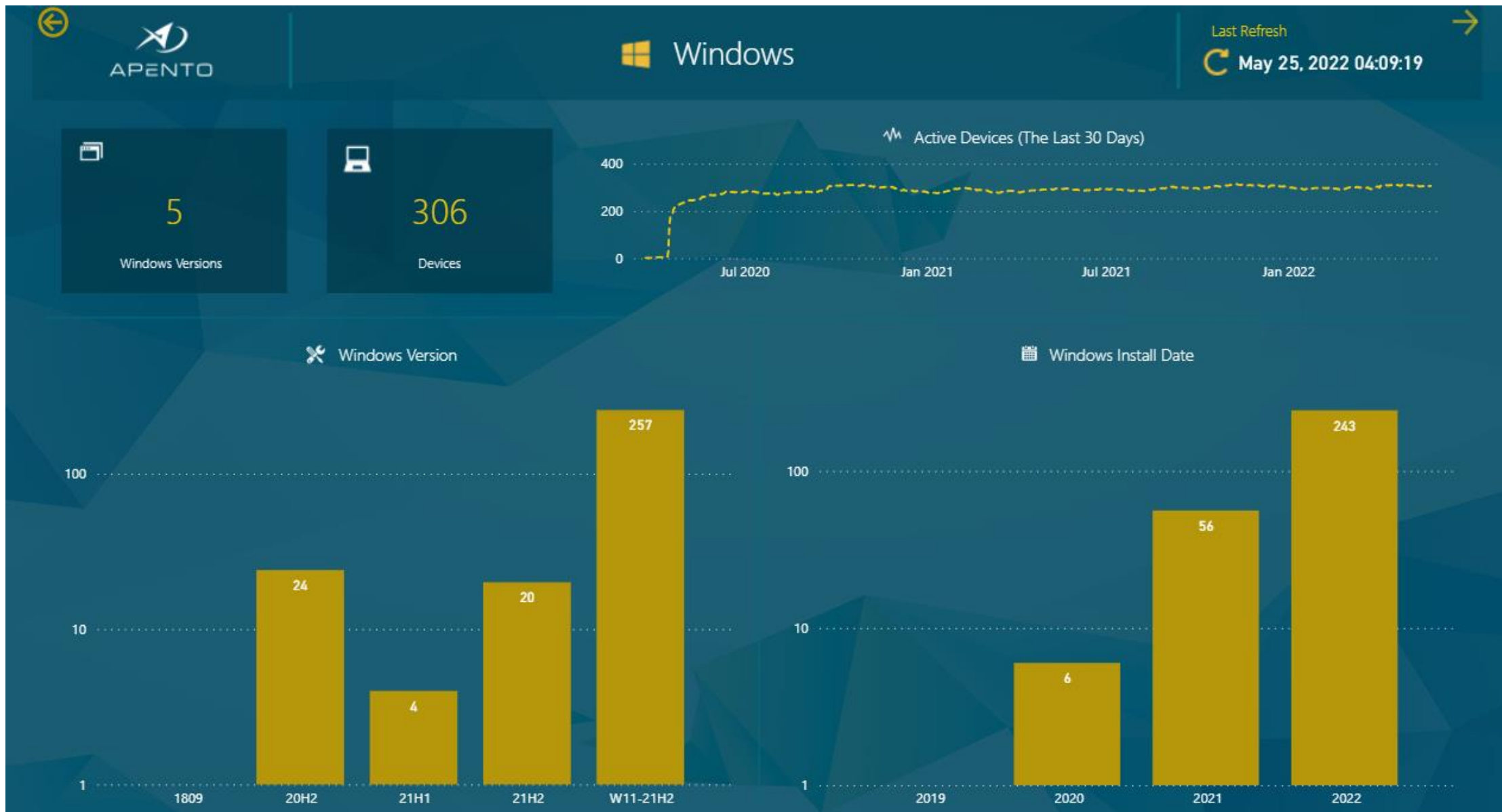
Setting	↑↓	Devices↑↓
NotEnabled		4085
Enabled		672





# Monitoring Feature Upgrades

[www.wpninjas.eu](http://www.wpninjas.eu)



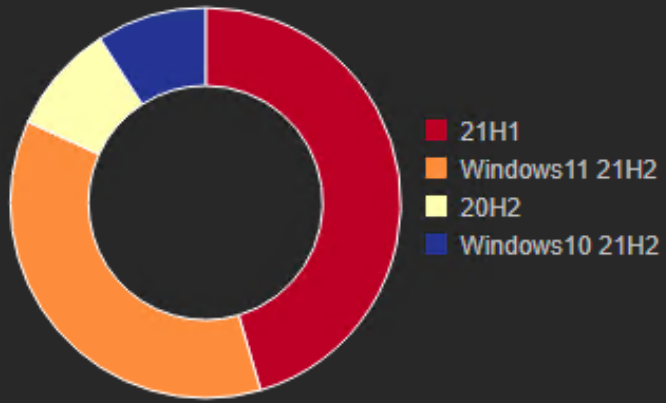
# Windows Servicing (MEMCM)





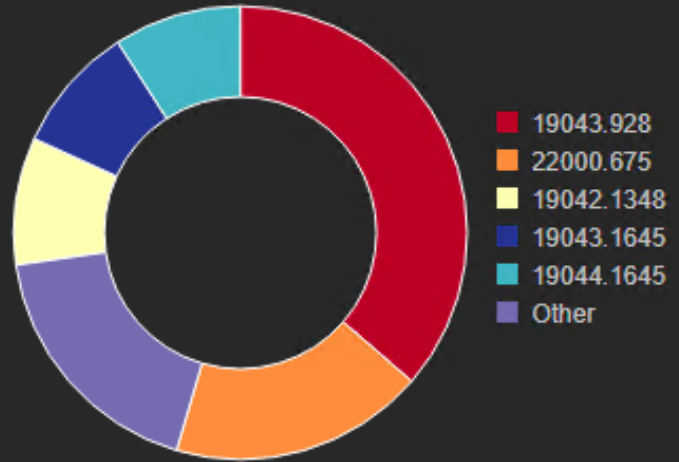
## Feature Update Versions

[Show Table](#)

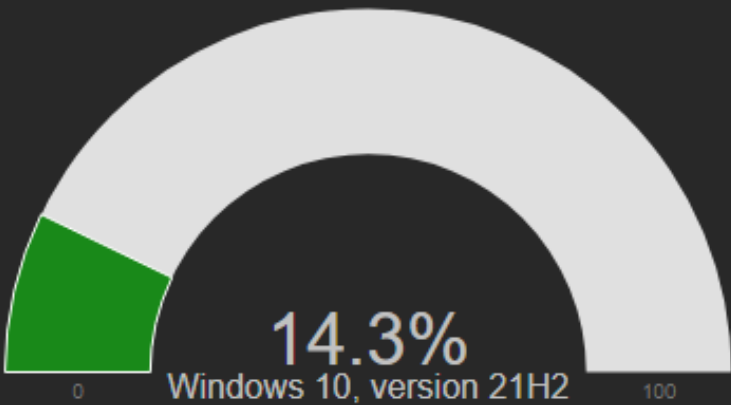


## Quality Update Versions

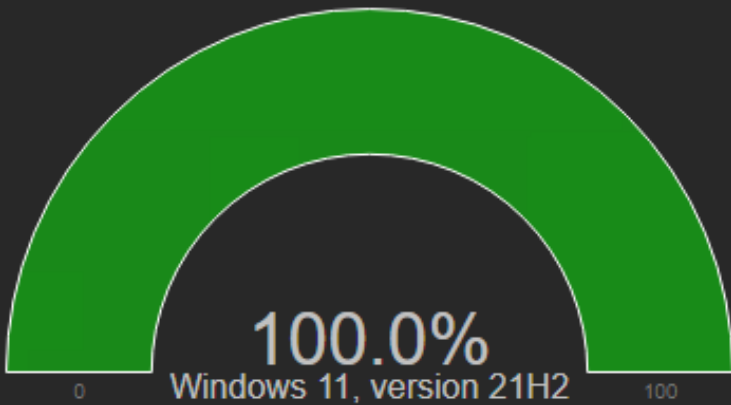
[Show Table](#)



## Windows 10 Latest Feature Update



## Windows 11 Latest Feature Update





# Windows Servicing (MEMCM)

[www.wpninjas.eu](http://www.wpninjas.eu)

- Error messages show up in the dashboard







# MEMCM Windows 11 servicing

www.wpninjas.eu

- Windowsupdatebox.exe + .esd file
- Content can come from Microsoft Update
- Can be run from an application instead
  - WindowsUpdateBox /Update /PreDownload /quiet
  - WindowsUpdateBox /Update /Install /quiet
  - WindowsUpdateBox /Update /Finalize /quiet

Name	Date modified	Type	Size
 22000.132.210809-2349.co_release_svc_refresh_CLIENTBUSIN...	2021-09-03 11:13	ESD File	3 558 713 KB
 WindowsUpdateBox.exe	2021-09-03 10:59	Application	22 968 KB

[SCCM/MEMCM: Windows 10 Feature Update Rollouts via Application Deployment - TechNet Articles - United States \(English\) - TechNet Wiki \(microsoft.com\)](#)



# Dynamic Updates

- Servicing will always trigger Dynamic Updates

- **Setup DU:** Fixes to Setup binaries or any files that Setup uses for feature updates.
- **SafeOS DU:** Fixes for the 'safe OS' that we use to update Windows recovery environment (WinRE).
- **Servicing Stack Update (SSU)/Critical DU:** Fixes that are necessary to address the Windows 10 servicing stack issue and thus required to complete the feature update.
- **Latest Cumulative Update (LCU)/General Distribution Release (GDR) DU:** Installs the latest cumulative quality update.
- **Language Pack (LP) and Feature On Demand (FOD) DU:** Preserves users' installed language packs and optional features by reinstalling them.
- **Driver DU:** Latest version of applicable drivers that have been already published by manufacturers (OEMs and/or IHVs) into Windows Update and specifically targeted for Dynamic Update.

Name	Date modified	Type	Size
boot	11/20/2020 1:30 AM	File folder	
Drivers	2/5/2021 9:40 AM	File folder	
DUImageSandbox	2/5/2021 9:40 AM	File folder	
DUSetupSandbox	2/5/2021 9:25 AM	File folder	

Name	Date modified	Type	Size
boot	11/20/2020 1:30 AM	File folder	
Drivers	11/19/2020 12:54 AM	File folder	
DUImageSandbox	2/5/2021 9:45 AM	File folder	
DUSetupSandbox	2/5/2021 9:45 AM	File folder	
boot	11/20/2020 1:30 AM	File folder	
Drivers	2/5/2021 9:47 AM	File folder	
DUImageSandbox	11/20/2020 1:26 AM	Setup Information	1

DUSetupSandbox, ... Properties

General Customize

1,369 Files, 7 Folders

Type: All of type File folder

Location: All in C:\\$WINDOWS.~BT

Size: 530 MB (556,340,509 bytes)

Size on disk: 535 MB (560,988,160 bytes)

Attributes ☐ Read-only

Installation Progress

CCMEXECP

Running: Windows 10 20H2 IPU

Running action: Upgrade Operating System



# How can we run commands pre/post Feature Update?

www.wpninjas.eu

**Option 1:** Setupconfig.ini

**Option 2:**

- %windir%\System32\update\run\{GUID}\preinstall.cmd
- %windir%\System32\update\run\{GUID}\precommit.cmd
- %windir%\System32\update\run\{GUID}\failure.cmd
- %windir%\System32\update\run\{GUID}\success.cmd (2004)
- %windir%\System32\update\run\{GUID}\postuninstall.cmd (2004)

Use Runonce instead of Run for = runonce ;-)

<https://docs.microsoft.com/en-us/windows-hardware/manufacture/desktop/windows-setup-enable-custom-actions>

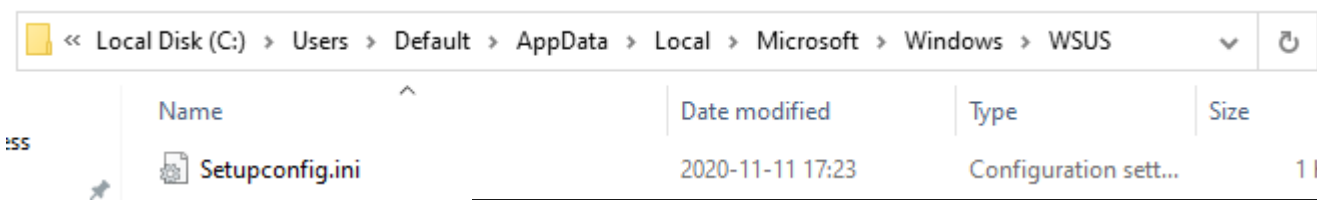




# Setupconfig.ini = your new best friend

www.wpninjas.eu

- Drivers, commands and more = total control!



```
[Setupconfig]
BitLocker=AlwaysSuspend
Compat=IgnoreWarning
Priority=Normal
DynamicUpdate=Enable
ShowOOBE=None
Telemetry=Enable
PostOOBE=C:\Windows\AdvancedIPU\SetupComplete.cmd
PostRollBack=C:\Windows\AdvancedIPU\ErrorHandler.cmd
PostRollBackContext=System
```

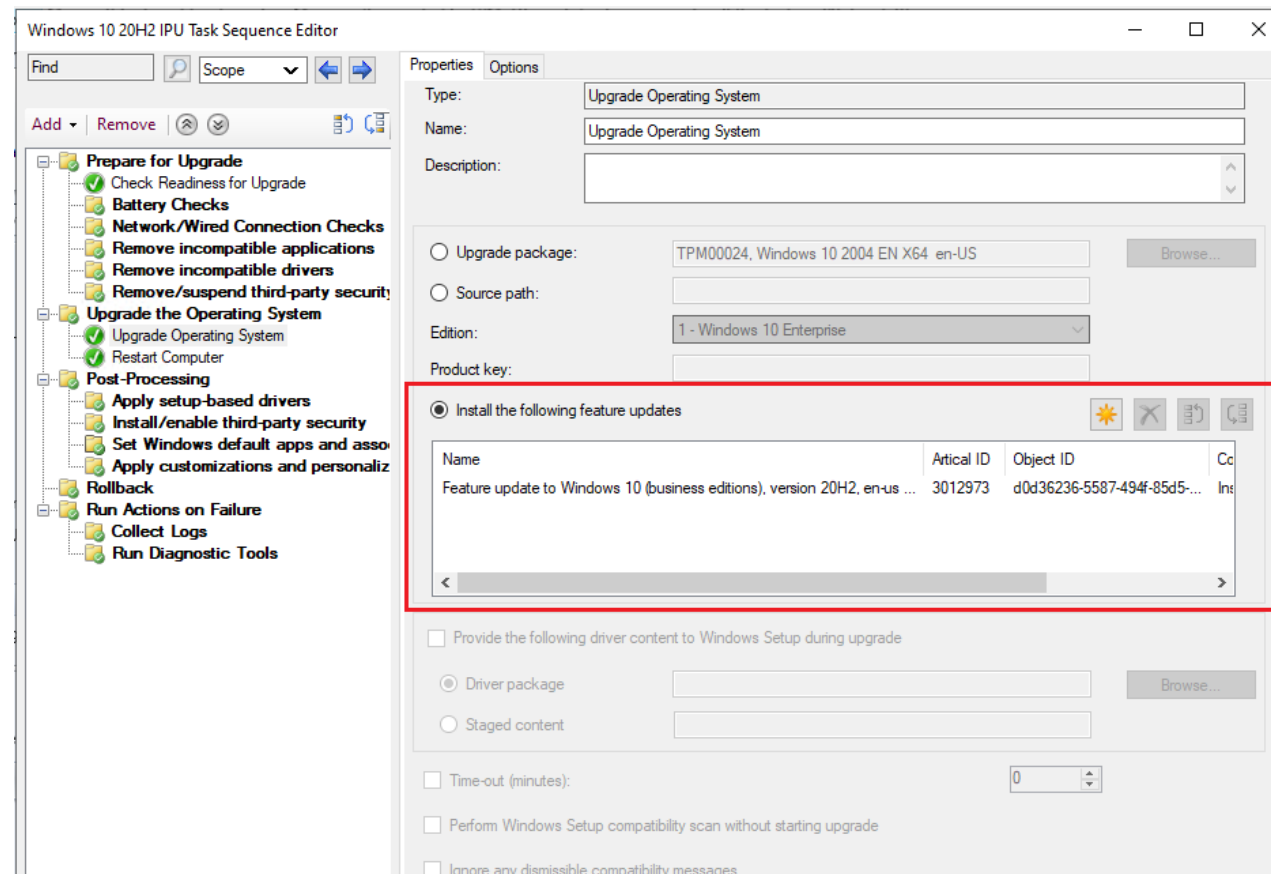
Name	Date modified	Type	Size
Branding	2021-03-09 15:12	File folder	
Removeapps	2021-09-08 08:27	File folder	
RemovePersonalTeams	2022-08-08 16:00	File folder	
Brand_Win10.cmd	2020-02-10 23:29	Windows Comma...	4 KB
RunSilent.exe	2020-10-06 14:18	Application	14 KB
RunSilent.ini	2022-08-08 16:02	Configuration sett...	1 KB

<https://www.asquaredozen.com/2019/08/25/windows-10-feature-updates-using-setupconfig-ini-to-manage-feature-updates-in-the-enterprise/>



# Feature update in Task Sequence

- Feature update in Task Sequence
- Why you ask?
  - IPU Source = 5,1 GB
  - \*.ESD = 3.8 GB
- Will always run Dynamic Updates
- Need to use setupconfig.ini





# Advanced Windows Servicing (MEMCM)

www.wpninjas.eu

- Community Tool
- DeploymentScheduler + IPUInstaller – by Johan Schrewelius
- Either patched Media or .Esd
- Post commands
- Driver updates

Name	Date modified	Type
ErrorHandler	2021-02-07 13:43	File folder
Media	2021-02-07 21:29	File folder
SetupComplete	2021-02-07 14:56	File folder
IpuInstaller.exe	2021-02-09 11:46	Application

<https://onevinn.schrewelius.it/>

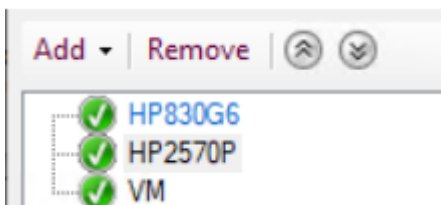
his PC > New Volume (E:) > Sources > OS Upgrades > IPU-JN > IPUApplication > SetupComplete >				
Name	Date modified	Type	Size	
Branding	2021-02-07 13:43	File folder		
DefaultApps	2021-02-07 13:43	File folder		
Edge	2021-02-07 13:43	File folder		
RemoveApps	2021-02-07 13:44	File folder		
RemoveEdgeWelcome	2021-02-07 13:44	File folder		
StartMenu	2021-02-07 13:44	File folder		
StartMenuFiles	2021-02-07 13:44	File folder		
Brand_Win10.cmd	2020-02-10 23:29	Windows Comma...	4 KB	
ChangeSearchbarFor1903AndLater.ps1	2020-11-19 10:27	Windows PowerS...	2 KB	
CleanUp.ps1	2021-02-02 17:01	Windows PowerS...	1 KB	
DefaultApps.ps1	2020-02-10 23:29	Windows PowerS...	11 KB	
Importlayout.ps1	2020-02-10 23:29	Windows PowerS...	10 KB	
RemoveApps.ps1	2020-02-10 23:29	Windows PowerS...	13 KB	
RunSilent.exe	2020-10-06 14:18	Application	14 KB	
RunSilent.ini	2021-02-07 14:57	Configuration sett...	1 KB	



# IPIInstaller - drivers

www.wpninjas.eu

- Driver Package
- IPUDrivers.WIM anywhere in CCMCache



This group/step will run if the following conditions are met:

If All the conditions are true:

..... WMI Query SELECT \* FROM Win32\_ComputerSystem WHERE Manufacturer='Hewlett-Packard' AND Model='HP EliteBook 2570p'

Properties Options

Type: Download Package Content

Name: HP2570P

Description:

	Name	Type	Size (MB)	Package ID
1	HP2570P	Package	443	EKX00518

Place into the following location:

☐ Task sequence working directory

☐ Configuration Manager client cache

☒ Custom path: %ProgramData%\~IPUDrivers

☐ Save path as a variable:

Refer to the variable in subsequent steps using %mycontent02% or %mycontent03%, package Content step

packages in the list



Recycle Bin



Google Chrome



Microsoft Edge



Microsoft Teams



Deployment scheduler



**A Windows upgrade is available.**  
Please, schedule the upgrade.

Schedule

Postpone



Type here to search



13°C Molnigt



9:31 AM  
11/19/2021





# Why move to Servicing?

- User experience / productivity
- Content from Microsoft Update?
- Better WFH experience
- Windows 10 20h2 -> Windows 11 21h1 (Fujitsu Lifebook)

Technology	Installation	Reboot	User Downtime	Total time
Task Sequence	14	9	25	23
Windows Servicing	38	4	4	42
IPUInstaller	12	3	3	15

# Customizations Windows 11







# Windows Display version has not changed!

[www.wpninjas.eu](http://www.wpninjas.eu)

- ProductName and ReleaseID is “**Deprecated**”
- Great for compatibility
- Bad for CM queries, scripts etc..

Name	Type	Data
(Default)	REG_SZ	(value not set)
BaseBuildRevisionNumber	REG_DWORD	0x00000001 (1)
BuildBranch	REG_SZ	co_release
BuildGUID	REG_SZ	ffffffff-ffff-ffff-ffff-ffffffffffff
BuildLab	REG_SZ	22000.co_release.210604-1628
BuildLabEx	REG_SZ	22000.1.amd64fre.co_release.210604-1628
CompositionEditionID	REG_SZ	Enterprise
CurrentBuild	REG_SZ	22000
CurrentBuildNumber	REG_SZ	22000
CurrentMajorVersionNumber	REG_DWORD	0x0000000a (10)
CurrentMinorVersionNumber	REG_DWORD	0x00000000 (0)
CurrentType	REG_SZ	Multiprocessor Free
CurrentVersion	REG_SZ	6.3
DigitalProductId	REG_BINARY	a4 00 00 00 03 00 00 00 30 33 33 30 2d 38 30 30 3...
DigitalProductId2	REG_BINARY	f8 04 00 00 04 00 00 00 30 00 33 00 36 00 31 00 32 00...
DisplayVersion	REG_SZ	21H2
EditionID	REG_SZ	Enterprise
EditionSubManufacturer	REG_SZ	
EditionSubstring	REG_SZ	
EditionSubVersion	REG_SZ	
InstallationType	REG_SZ	Client
InstallDate	REG_DWORD	0x615c0f7e (1633423230)
InstallTime	REG_QWORD	0x1d7b9c4a780a85e (132778968305674334)
PathName	REG_SZ	C:\Windows
PendingInstall	REG_DWORD	0x00000000 (0)
ProductId	REG_SZ	00330-80000-00000-AA438
ProductName	REG_SZ	Windows 10 Enterprise
ReleaseId	REG_SZ	2009
SoftwareType	REG_SZ	System
SystemRoot	REG_SZ	C:\WINDOWS
UBR	REG_DWORD	0x000000c2 (194)



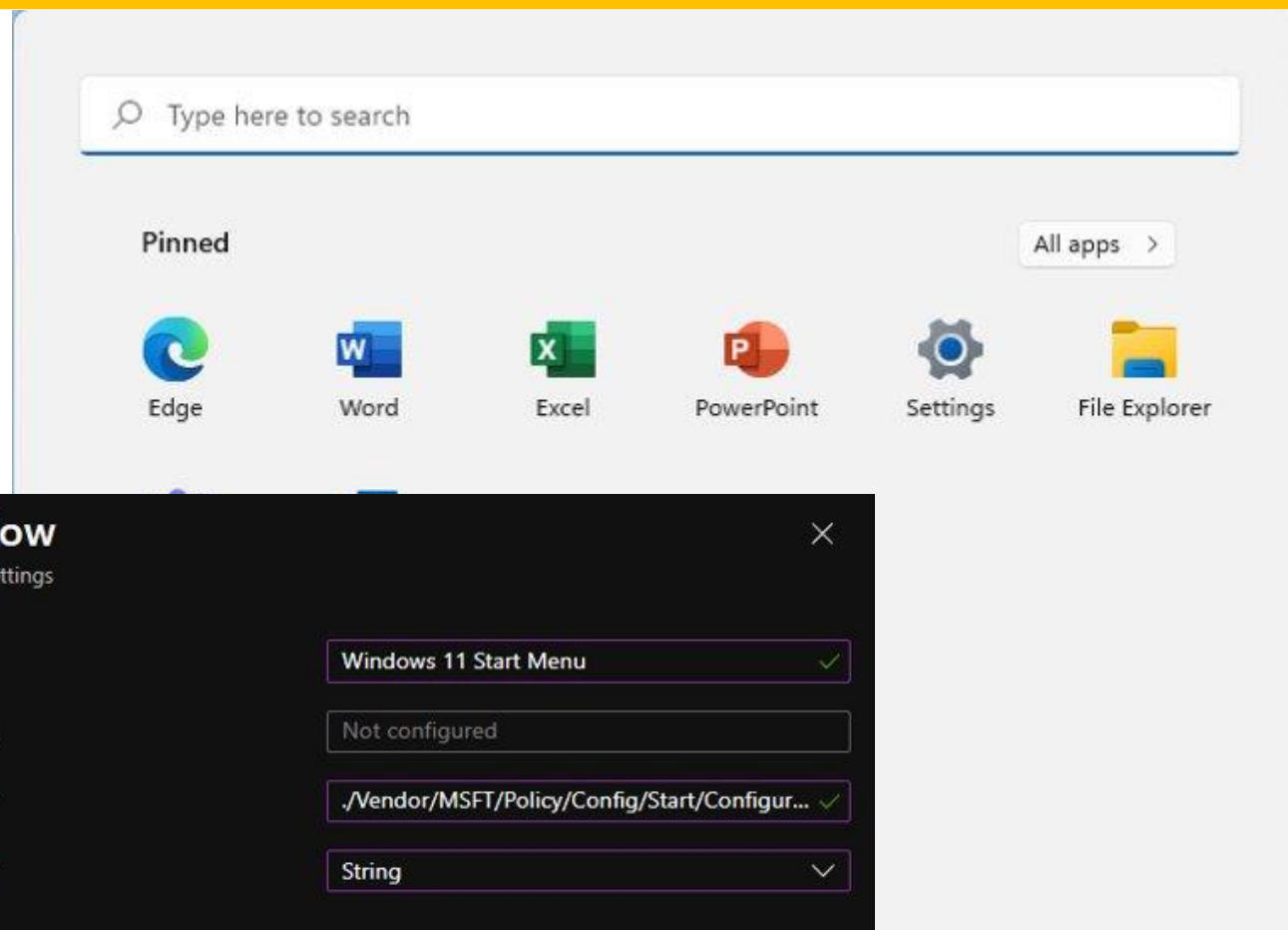
# Windows 11 = modern managed

[www.wpninjas.eu](http://www.wpninjas.eu)

- Most customizations are only possible using Intune/MDM

Example Start Menu, a custom start menu can only be deployed using Intune/MDM

Export-StartLayout PowerShell exports a \*.json file that only can be used with Intune



### Add Row

OMA-URI Settings

Name *	Windows 11 Start Menu ✓
Description	Not configured
OMA-URI *	./Vendor/MSFT/Policy/Config/Start/Configur... ✓
Data type *	String ▼
Value *	<pre>policy_csm_microsoftimmersivecontrolpanel", {"desktopAppId":"Microsoft.Windows.Explor er"}, {"desktopAppId":"com.squirrel.Teams.Teams "}, {"desktopAppId":"Microsoft.Office.OUTLOO K.EXE.15"}]]</pre> ✓



# Customized Start Menu using "OEMPinned"

[www.wpninjas.eu](http://www.wpninjas.eu)

- An option created for OEMs which makes it possible to at modify some parts during OSD

4 st Primary OEMPins

4 st Secondary OEMPins

1st Recommended Managed with  
Layoutmodification.json

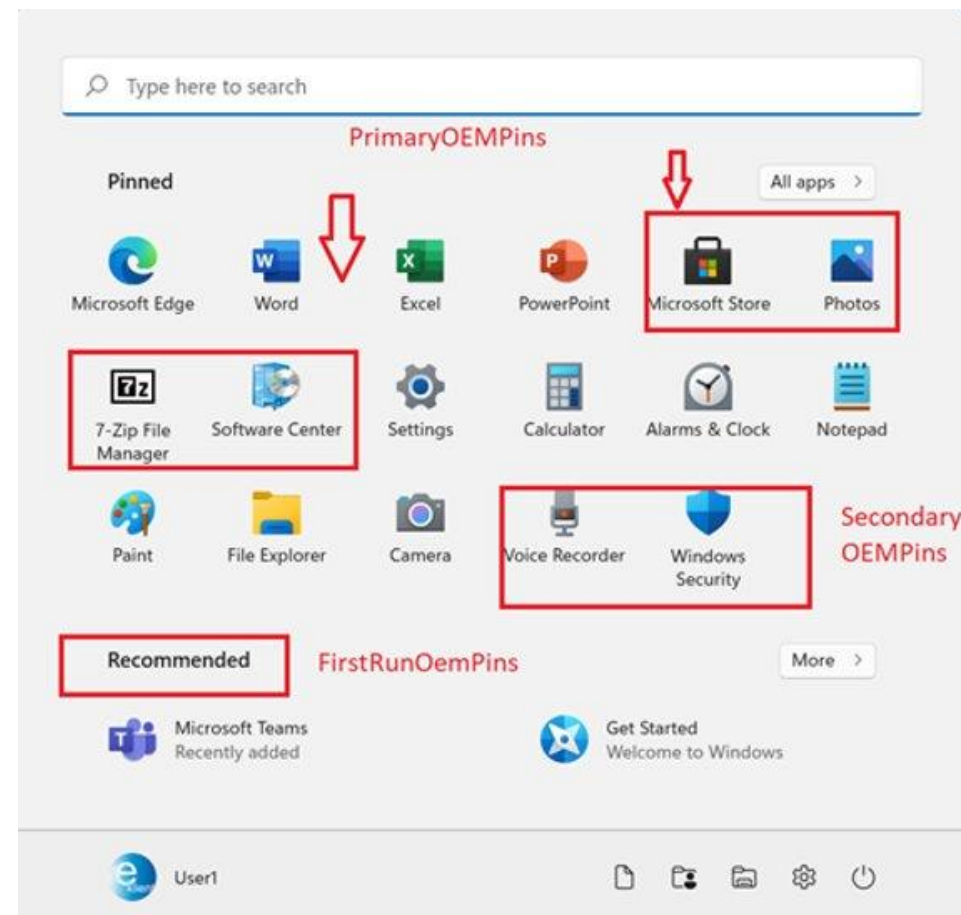
Copy the Layoutmodification.json during OSD:

Copy-Item -Path

\$PSScriptRoot'\LayoutModification.json'

-Destination

\$env:SystemDrive'\Users\Default\AppData\Local\Microsoft\Windows\Shell'





# Sample LayoutModification.json

[www.wpninjas.eu](http://www.wpninjas.eu)

```
{
  "primaryOEMPins": [
    {
      "desktopAppLink": "%ALLUSERSPROFILE%\\Microsoft\\Windows\\Start Menu\\Programs\\7-Zip\\7-Zip File Manager.lnk"
    },
    {
      "desktopAppLink": "%ALLUSERSPROFILE%\\Microsoft\\Windows\\Start Menu\\Programs\\Microsoft Endpoint Manager\\Configuration Manager\\Software Center."
    },
    {
      "desktopAppLink": "%ALLUSERSPROFILE%\\Microsoft\\Windows\\Start Menu\\Programs\\Outlook.lnk"
    },
    {
      "packagedAppId": "Microsoft.WindowsTerminal_8wekyb3d8bbwe!App"
    }
  ],
  "secondaryOEMPins": [
    {
      "packagedAppId": "Microsoft.WindowsCamera_8wekyb3d8bbwe!App"
    },
    {
      "packagedAppId": "Microsoft.WindowsSoundRecorder_8wekyb3d8bbwe!App"
    },
    {
      "packagedAppId": "Microsoft.SecHealthUI_8wekyb3d8bbwe!SecHealthUI"
    }
  ],
  "firstRunOEMPins": [
    {
      "packagedAppId": "Microsoft.MicrosoftStickyNotes_8wekyb3d8bbwe!App"
    }
  ]
}
```



# Customized taskbar

- Still possible using all the "old" options, Start-Layout; GPO, Import-startlayout, Intune.
- **Note:** Windows 10 Start Menu GPO hits a Windows 11 computer with a full Start-layout and Taskbar config, users can only unpin apps from start and NOT pin.
- Import-StartLayout -  
LayoutPath  
\$PSScriptRoot\Startmenustd.xml -MountPath  
\$env:SystemDrive\

```
Taskbar.xml - Notepad
File Edit Format View Help
<?xml version="1.0" encoding="utf-8"?>
<LayoutModificationTemplate
  xmlns="http://schemas.microsoft.com/Start/2014/LayoutModification"
  xmlns:defaultlayout="http://schemas.microsoft.com/Start/2014/FullDefaultLayout"
  xmlns:start="http://schemas.microsoft.com/Start/2014/StartLayout"
  xmlns:taskbar="http://schemas.microsoft.com/Start/2014/TaskbarLayout"
  Version="1">
  <CustomTaskbarLayoutCollection PinListPlacement="Replace">
    <defaultlayout:TaskbarLayout>
      <taskbar:TaskbarPinList>
        <taskbar:DesktopApp DesktopApplicationID="MSEdge"/>
        <taskbar:DesktopApp DesktopApplicationID="Microsoft.Windows.Explorer"/>
      </taskbar:TaskbarPinList>
    </defaultlayout:TaskbarLayout>
  </CustomTaskbarLayoutCollection>
</LayoutModificationTemplate>
```



# Start Location and more

Start button alignment – 0 = Left

```
[HKEY_CURRENT_USER\Software\Microsoft\Windows\CurrentVersion\Explorer\Advanced]  
"TaskbarAl"=dword:00000000
```

Remove Task View from the Taskbar

```
[KEY_CURRENT_USER\Software\Microsoft\Windows\CurrentVersion\Explorer\Advanced]  
"ShowTaskViewButton"=dword:00000000
```

Remove Chat from the Taskbar

```
[KEY_CURRENT_USER\Software\Microsoft\Windows\CurrentVersion\Explorer\Advanced]  
"TaskbarMn"=dword:00000000
```

Remove Widgets from the Taskbar

```
[KEY_CURRENT_USER\Software\Microsoft\Windows\CurrentVersion\Explorer\Advanced]  
"TaskbarDa"=dword:00000000
```

Remove Search from the Taskbar

```
[HKEY_CURRENT_USER\Software\Microsoft\Windows\CurrentVersion\Search]  
"SearchboxTaskbarMode"=dword:00000000
```





# Enable Start Menu folders

[www.wpninjas.eu](http://www.wpninjas.eu)

A great feature not enabled by default, can only be managed using Intune/MDM  
PowerShell WMI/Bridge to the rescue  
Downside, end users cannot change it



[Configure Windows 11 Start Menu folders using PowerShell - CCMEXEC.COM - Enterprise Mobility](https://ccmexec.com)

## Personalization > Start > Folders

Settings	On
File Explorer	On
Documents	On
Downloads	On
Music	Off
Pictures	Off
Videos	Off
Network	Off





# Chat icon

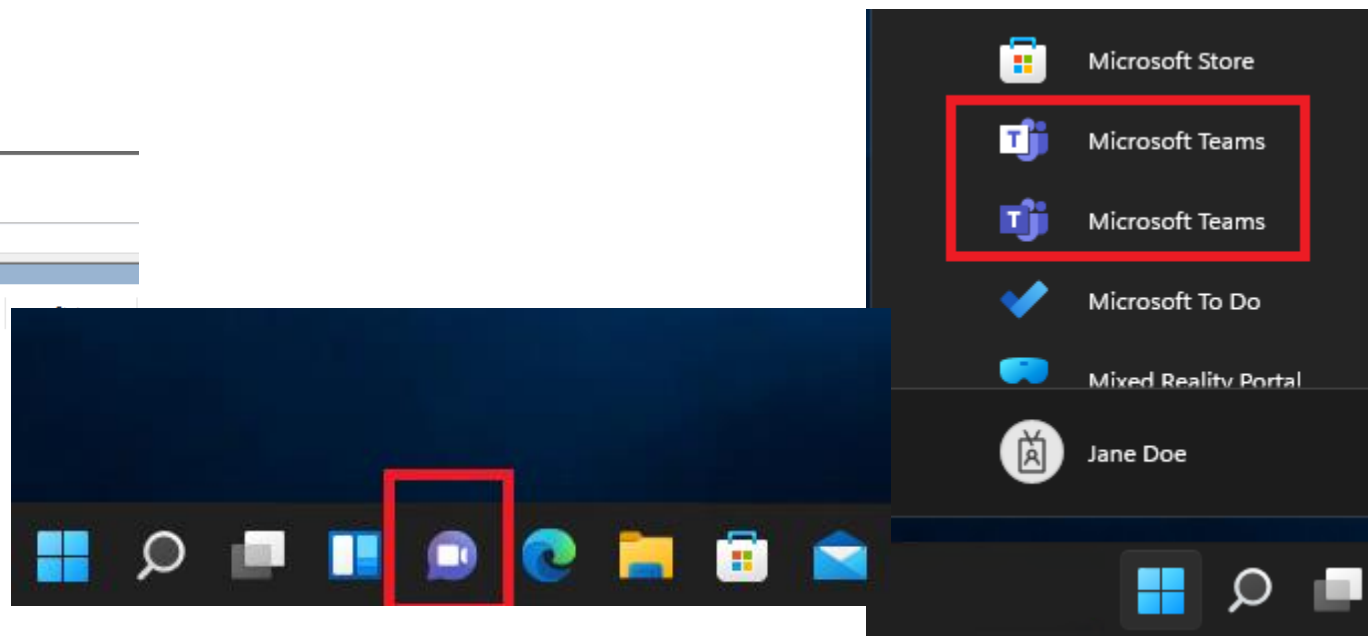
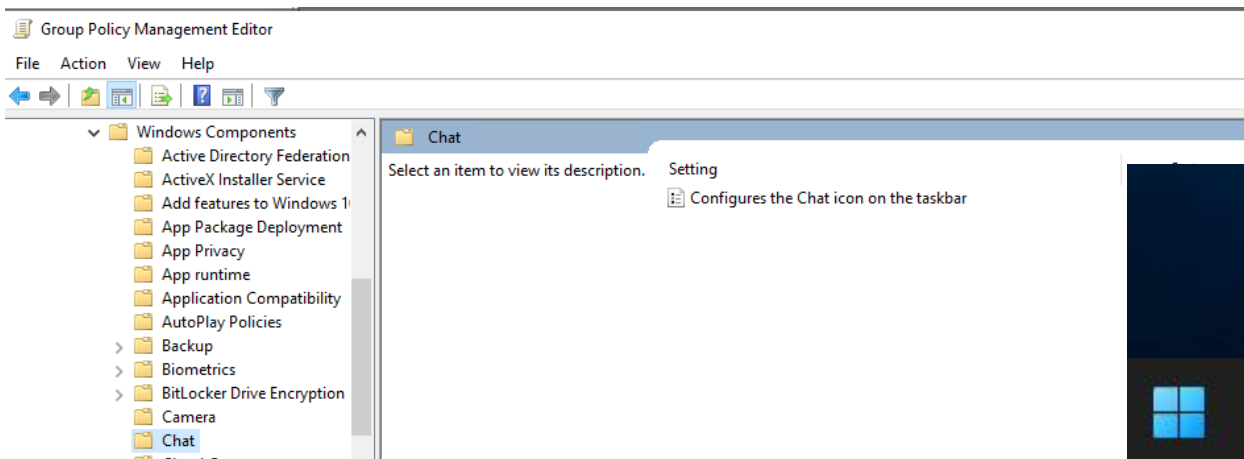
- Points to personal Microsoft Teams

Can be disabled on modern managed clients using:

OMA-URI = “./Device/Vendor/MSFT/Policy/Config/Experience/ConfigureChatIcon”

Registry:[KEY\_CURRENT\_USER\Software\Microsoft\Windows\CurrentVersion\Explorer\Advanced]  
“TaskbarMn”=dword:00000000

Group Policy





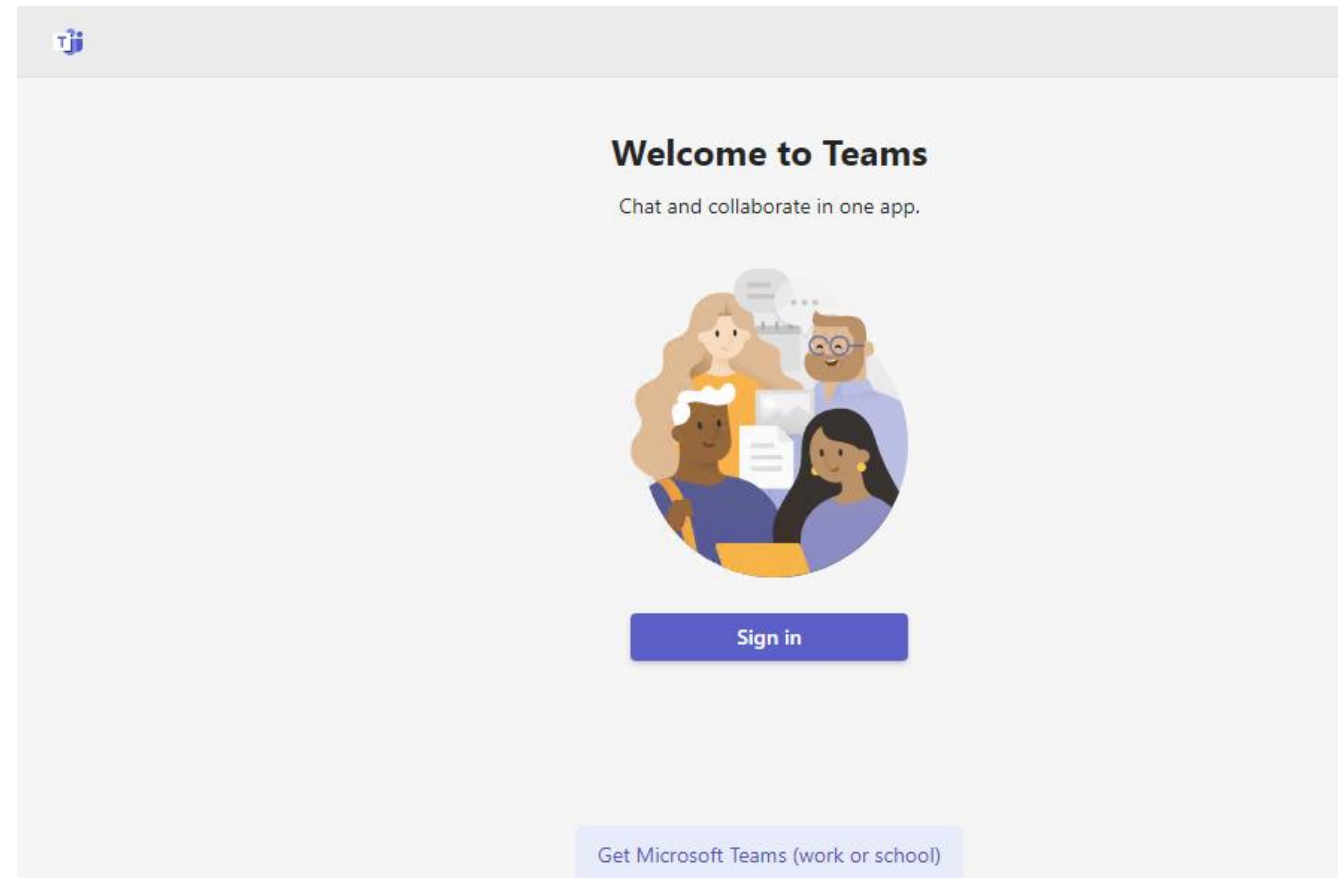
# Disable Personal Teams

- Disabled by adding Registry value:

**"HKEY\_LOCAL\_MACHINE\SOFTWARE\Microsoft\Windows\CurrentVersion\Communications\ConfigureChatAutoInstall**

Challenge: owned by **TrustedInstaller**

- During OSD – Unattend.xml
- During Servicing – SetupConfig.ini
- AutoPilot – Proactive remediation/script  
SetAcl.exe to take ownership and add the value.





# Is uninstalling built-in apps still a thing?

[www.wpninjas.eu](http://www.wpninjas.eu)

- Uninstall or not?
- New builtin apps in Windows 11
  - PowerAutomate desktop, Microsoft Teams personal

VS Code | Select DisplayName, PackageName, Version, InstallFolder, Size | Out-GridView

Filter

+ Add criteria

DisplayName	PackageName	Version	InstallFolder	Size
Microsoft.YourPhone	Microsoft.YourPhone_1.22022.180.0_neutral~_8wekyb3d8bbwe	1.22022.180.0	C:\Program Files\WindowsApps\Microsoft.YourPhone_1.22022.180.0_neutral~_8wekyb3d8bbwe	310,407,689.00
microsoft.windowscommunicationsapps	microsoft.windowscommunicationsapps_16005.14326.20858.0_neu...	16005.1432...	C:\Program Files\WindowsApps\microsoft.windowscommunicationsapps_16005.14326.20858.0_neu...	214,925,848.00
Microsoft.Windows.Photos	Microsoft.Windows.Photos_2021.21120.8011.0_neutral~_8wekyb3...	2021.21120...	C:\Program Files\WindowsApps\Microsoft.Windows.Photos_2021.21120.8011.0_neutral~_8wekyb3...	197,229,166.00
Microsoft.WindowsStore	Microsoft.WindowsStore_22203.1401.21.0_neutral~_8wekyb3d8bb...	22203.1401...	C:\Program Files\WindowsApps\Microsoft.WindowsStore_22203.1401.21.0_neutral~_8wekyb3d8bb...	150,674,691.00
MicrosoftTeams	MicrosoftTeams_22006.600.1133.7409_x64_8wekyb3d8bbwe	22006.600.1...	C:\Program Files\WindowsApps\MicrosoftTeams_22006.600.1133.7409_x64_8wekyb3d8bbwe	93,947,119.00
Microsoft.MicrosoftSolitaireCollection	Microsoft.MicrosoftSolitaireCollection_4.12.3171.0_neutral~_8wek...	4.12.3171.0	C:\Program Files\WindowsApps\Microsoft.MicrosoftSolitaireCollection_4.12.3171.0_neutral~_8wek...	60,347,508.00
Microsoft.549981C3F5F10	Microsoft.549981C3F5F10_4.2203.4603.0_neutral~_8wekyb3d8bbwe	4.2203.4603.0	C:\Program Files\WindowsApps\Microsoft.549981C3F5F10_4.2203.4603.0_neutral~_8wekyb3d8bbwe	49,295,136.00
Microsoft.XboxGamingOverlay	Microsoft.XboxGamingOverlay_5.722.3302.0_neutral~_8wekyb3d8...	5.722.3302.0	C:\Program Files\WindowsApps\Microsoft.XboxGamingOverlay_5.722.3302.0_neutral~_8wekyb3d8...	48,071,159.00
Microsoft.ZuneVideo	Microsoft.ZuneVideo_2019.22021.10291.0_neutral~_8wekyb3d8bb...	2019.22021...	C:\Program Files\WindowsApps\Microsoft.ZuneVideo_2019.22021.10291.0_neutral~_8wekyb3d8bb...	37,797,561.00
Microsoft.StorePurchaseApp	Microsoft.StorePurchaseApp_12109.1001.10.0_neutral~_8wekyb3d...	12109.1001...	C:\Program Files\WindowsApps\Microsoft.StorePurchaseApp_12109.1001.10.0_neutral~_8wekyb3d...	37,502,130.00
MicrosoftWindows.Client.WebExperience	MicrosoftWindows.Client.WebExperience_421.20070.95.0_neutral~...	421.20070.9...	C:\Program Files\WindowsApps\MicrosoftWindows.Client.WebExperience_421.20070.95.0_neutral~...	35,986,673.00
Microsoft.ZuneMusic	Microsoft.ZuneMusic_11.2202.45.0_neutral~_8wekyb3d8bbwe	11.2202.45.0	C:\Program Files\WindowsApps\Microsoft.ZuneMusic_11.2202.45.0_neutral~_8wekyb3d8bbwe	34,634,868.00
Microsoft.WindowsFeedbackHub	Microsoft.WindowsFeedbackHub_2022.317.2207.0_neutral~_8wek...	2022.317.22...	C:\Program Files\WindowsApps\Microsoft.WindowsFeedbackHub_2022.317.2207.0_neutral~_8wek...	33,006,672.00
Microsoft.VCLibs.140.00	Microsoft.VCLibs.140.00_14.0.29231.0_x64_8wekyb3d8bbwe	14.0.29231.0	C:\Program Files\WindowsApps\Microsoft.VCLibs.140.00_14.0.29231.0_x64_8wekyb3d8bbwe	32,107,153.00



# Windows 11 Summary

[www.wpninjas.eu](http://www.wpninjas.eu)

- Best managed from the cloud
- Support for Windows 10 ends October 14, 2025

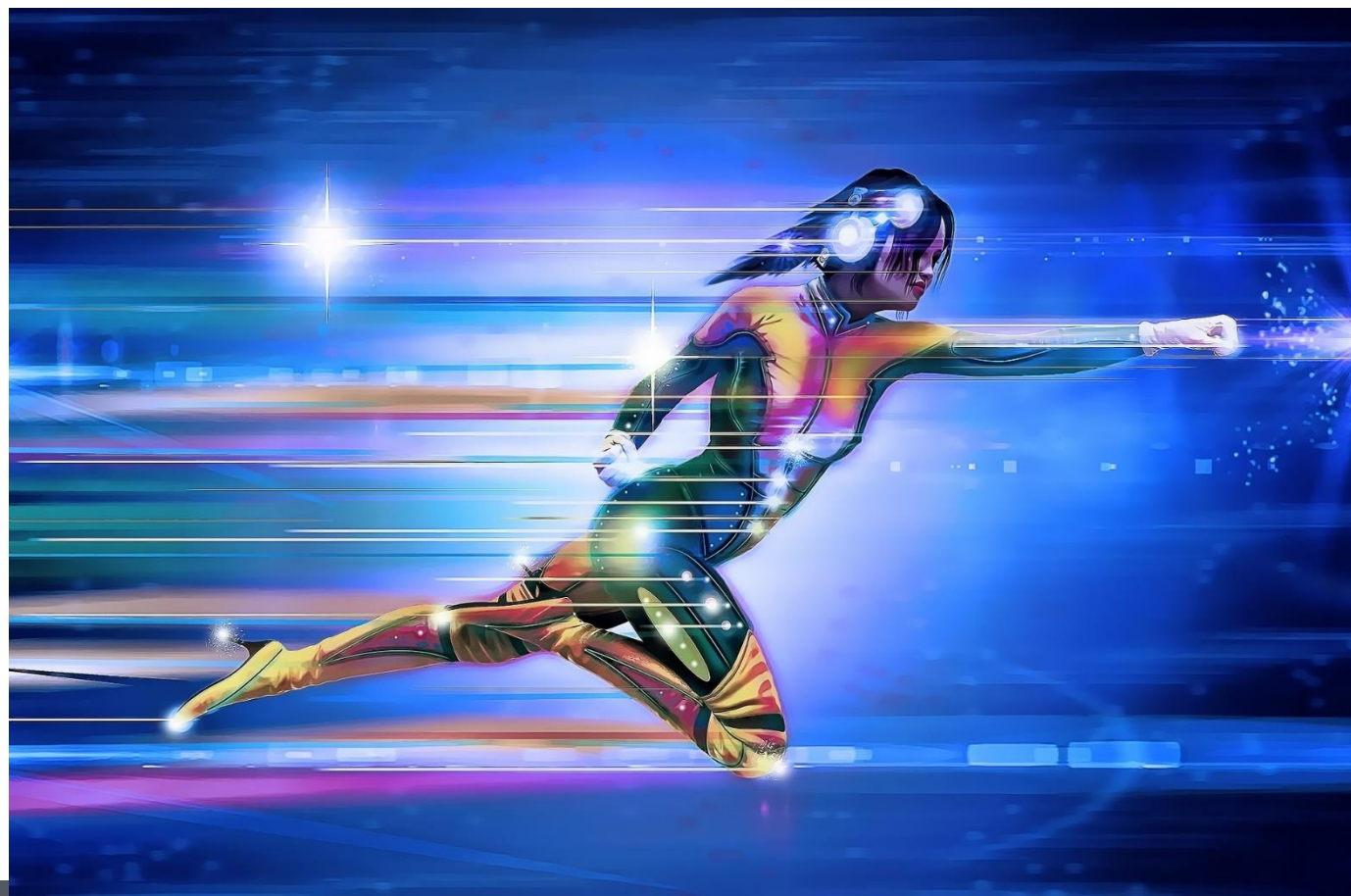
Listing	Start Date	Retirement Date
Windows 10 Enterprise and Education	Jul 29, 2015	Oct 14, 2025





# Call to action

- Move now!
- Take the three years left of Windows 10 support to transition to an AAD join and Intune managed device = Modern Workplace!
- For the rest – Co-management





**Thank You**



*Workplace Ninja Summit 2022*