

Autopilot deployment with ENGL Imaging Toolkit



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Why Imaging Toolkit?



- Hardware independent imaging
- Driver management
- Secure imaging front-end
- Automated deployment
- Application installation
- Customisable
- Repeatable
- Monitoring



Imaging Toolkit 12

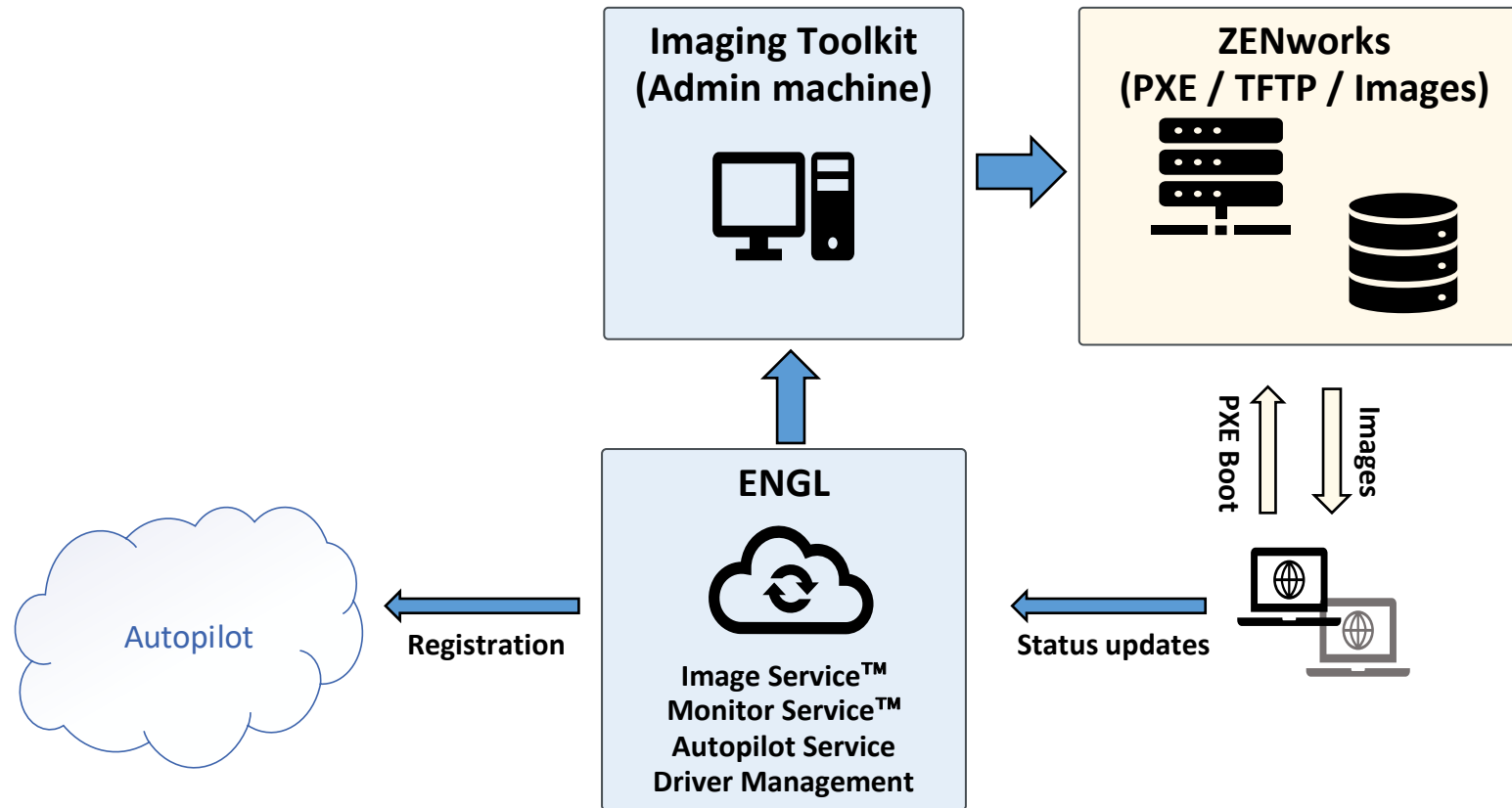
What's new



- + Windows 11 support
- + Windows 64-bit only
- + ENGL Image Service™
- + ENGL Monitor Service™
- + Windows Autopilot support
- Removed 32-bit support
- Removed Windows 7 and 8 support

Imaging Toolkit 12

Autopilot with ZCM



Requirements

Windows 11



Imaging Toolkit 12

- ADK/WinPE for Windows 10 2004 / Windows 11*
- Windows 11 21H2 (latest updated) VL media

ZENworks Configuration Management

- 2020 Update 2 + Patches
- Modern Device Management (MDM)



Autopilot

- Azure Active Directory P1 or P2 subscription
- Azure application registration with appropriate permissions

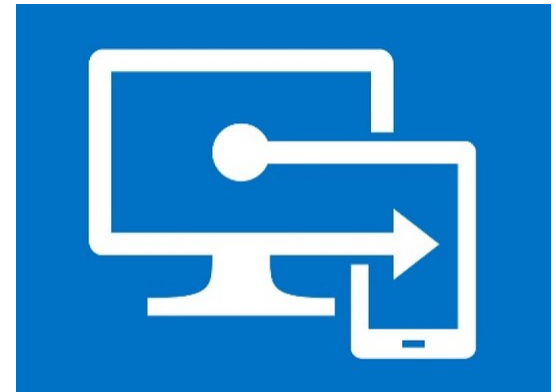
* ADK/WinPE supported versions
<https://www.engl.co.uk/shortcut-adk-download>

Autopilot

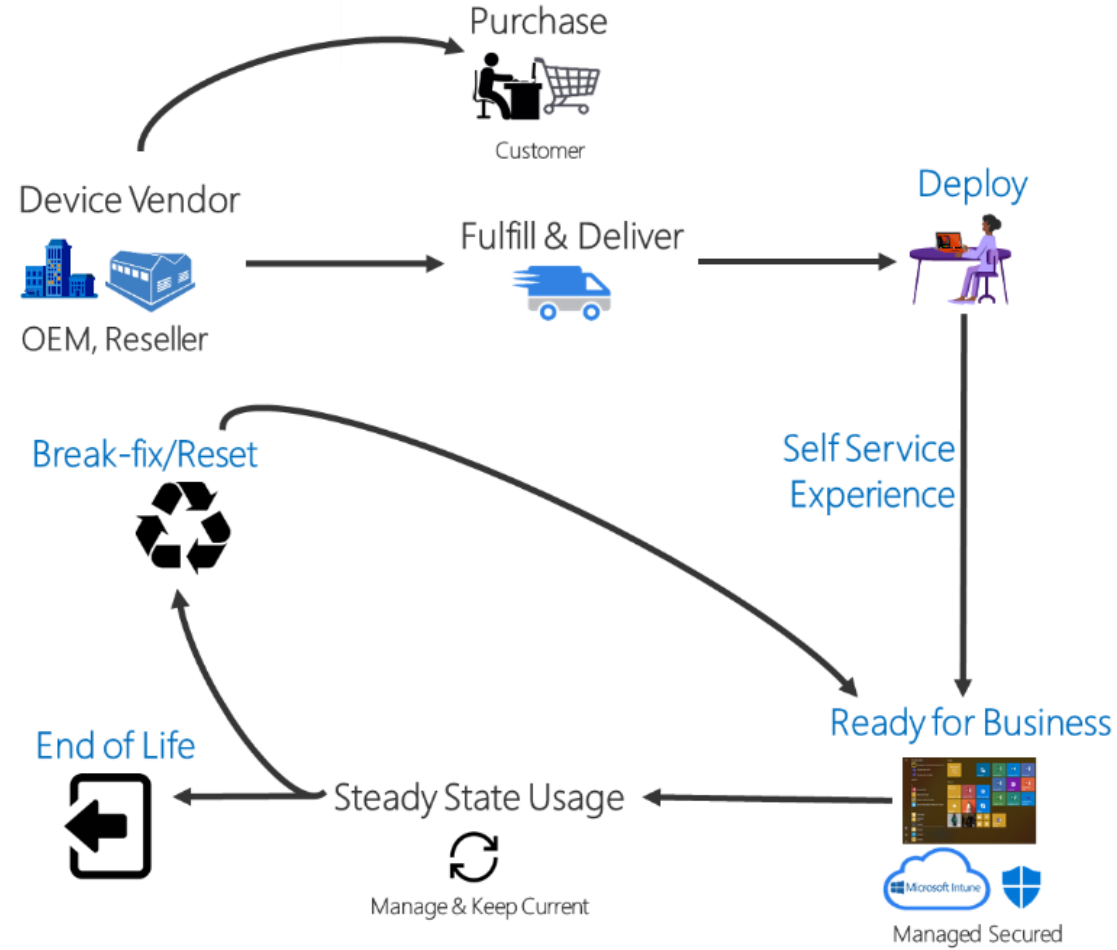
Autopilot



- Windows Autopilot is a collection of technologies used to set up and pre-configure new devices
- Autopilot enables
 - Automatically join devices to Azure Active Directory (Azure AD)
 - Auto-enroll devices into MDM services e.g. ZENworks
 - Create and auto-assign devices to configuration groups
 - Customize OOB content specific to the organisation
- Must have Azure Active Directory Premium P1 or P2

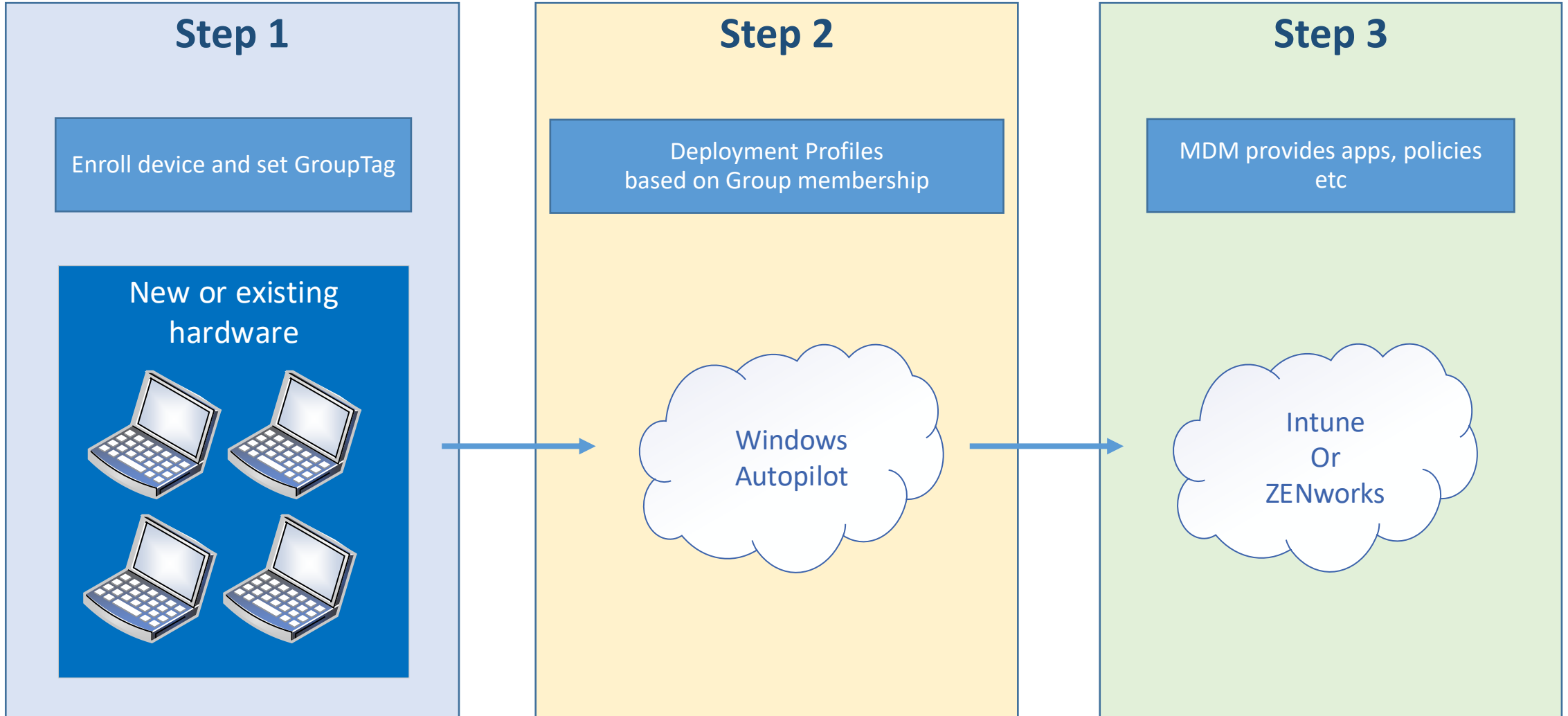


Autopilot Process



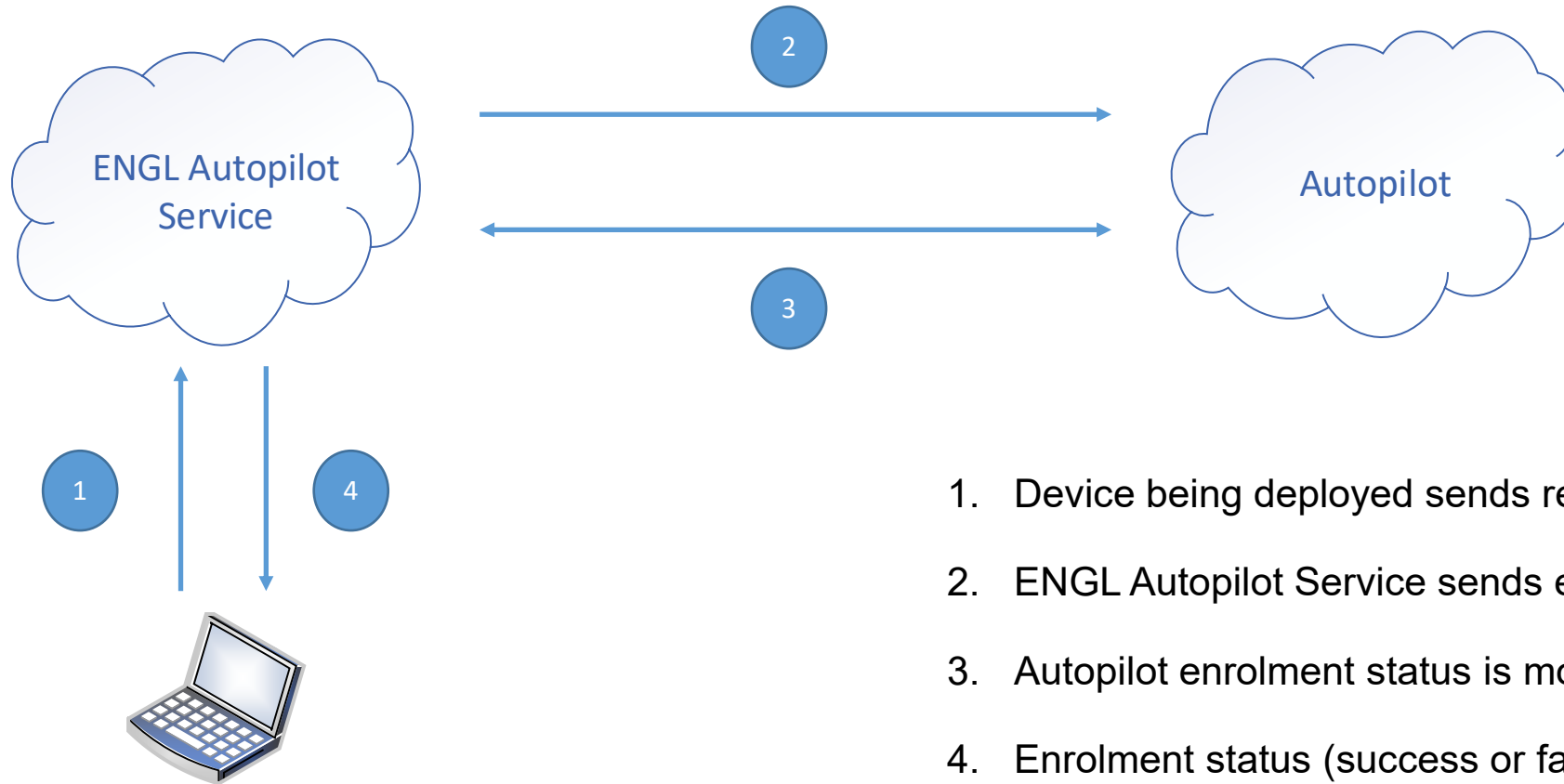
Autopilot

Process



Autopilot

Device enrolment



1. Device being deployed sends request to ENGL Autopilot Service.
2. ENGL Autopilot Service sends enrolment request to Autopilot.
3. Autopilot enrolment status is monitored by ENGL Autopilot service.
4. Enrolment status (success or failure) returned to device.

Autopilot Deployment Profile



[Home](#) > [Devices](#) > [Enroll devices](#) > [Windows Autopilot deployment profiles](#) > [ZENworks](#)

ZENworks | Properties

Windows PC

Search (Ctrl+[/](#))

Basics [Edit](#)

[Overview](#)

Manage

Properties

[Assigned devices](#)

Name	ZENworks
Description	--
Convert all targeted devices to Autopilot	Yes
Device type	Windows PC

Out-of-box experience (OOBE) [Edit](#)

Deployment mode	User-Driven
Join to Azure AD as	Azure AD joined
Language (Region)	Operating system default
Automatically configure keyboard	Yes
Microsoft Software License Terms	Hide
Privacy settings	Hide
Hide change account options	Hide
User account type	Administrator
Allow pre-provisioned deployment	Yes
Apply device name template	Yes
Enter a name	ENGL-%RAND:5%

Assignments [Edit](#)

Included groups	ZENworksMDM
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Autopilot

Imaging Toolkit scenarios



- Deploy existing and new machines
 - Using a clean Windows OS build
 - Deliver INF drivers based on device (mass-storage and NIC)
 - Device does not have to be enrolled in Autopilot
- Device reset (re-image)
 - Much faster than via Autopilot reset
 - Re-deploy based on a current OS version
- Control group membership at deployment time
 - Use menu option to set GroupTag

Build Console

Build Console

File library



File Library

Windows media

Windows 11
Windows 10

Micro Focus components

ZENworks Agent (optional)
OES Client (optional)

Driver packs

Audio
Thunderbolt
Video
....

Critical drivers

Mass-storage device drivers
Network drivers

Build Console

Import Windows media



- Check ENGL Image Service for available pre-built* images

Image Service™	
Pre-built images	
Date	Description ↓
18/05/2022	Windows 11 version 21H2 Enterprise VL (updated May 2022) x64 [en-US]
20/04/2022	Windows 11 version 21H2 Enterprise VL (updated April 2022) x64 [en-US]
26/04/2022	Windows 11 version 21H2 Enterprise VL (updated April 2022) x64 [de-DE]
30/05/2022	Windows 10 version 21H2 Enterprise VL (updated May 2022) x64 [nl-NL]
18/05/2022	Windows 10 version 21H2 Enterprise VL (updated May 2022) x64 [en-US]
13/04/2022	Windows 10 version 21H2 Enterprise VL (updated March 2022) x64 [nl-NL]

*Imported media must match Windows version, edition, “updated” date and language exactly.

Build Console

Import Windows media



- Mount the Windows VL ISO
- Import Windows ISO contents

The screenshot shows the ENGL Imaging Toolkit 12.0.1 Build Console interface. The window title is "ENGL Imaging Toolkit 12.0.1 Build Console". The menu bar includes "File", "View", "Tools", and "Help". The toolbar contains icons for file operations and help. The interface is divided into three main sections: "Task View", "File Library", and "Properties".
Task View: Contains "Project Tasks" (Create new project, Open existing project) and "File Library Tasks" (Add Windows Media, Add Drivers, Add LDAP Certificate, Add .NET Framework, Add OES Client).
File Library: Shows a tree view under "Windows Media" > "Windows 11". The selected item is "21H2 Enterprise VL (updated May 2022) x64 [en-US]". Other items include Education, Enterprise N, Pro Education, Pro Education VL, Pro for Workstations, Pro N for Workstations, Pro N VL, and Pro VL.
Properties: Displays "Media Properties" for the selected item.

Media Properties	
Description	Windows 11 version 21H2 Enterprise VL (updated May 2022) x64 [en-US]
GUID	5E5B40B8-A4E4-497C-9D63-00005049EE12
Linked	False
Path	C:\ENGL\ImagingToolkit\FileLibrary\WindowsMedia\36D15ED2-5C13-420...
Volume Licensed	True
WIM Image Index	2
Version	10.0.22000.675
Display version	21H2
Build number	22000

- Simplifies ENGL base image creation
- No reference machine required
- Base images can still be created manually

	Imaging Toolkit Subscription		
Allowance	Standard	Advanced	Enterprise
Pre-built image downloads	1	4	12
Custom image requests			4

Description	Pre-built	Custom
Windows versions	Windows 11 21H2 Windows 10 21H2	Windows 11 21H2 Windows 10 21H2
Windows editions	Enterprise	Selectable
Built-in packages	All (excludes Xbox)	Selectable

ENGL Image Service™

Pre-built base images



- Select Windows edition
- Select ENGL Image Service
- Select a pre-built base image to download

The ENGL Image Service includes a selection of pre-built base images compatible with your Windows media version, edition and language. Custom images can be queued and built in our Image Factory. Access subject to subscription and usage allowance.

Allowance

Pre-built image downloads available: 26
Custom image requests available: 8

Windows 11 version 21H2 Enterprise VL (updated May 2022) x64 [en-US]

Description	Date	Status
ENGL pre-built base image (WinPE/WIM)	May 18, 2022	

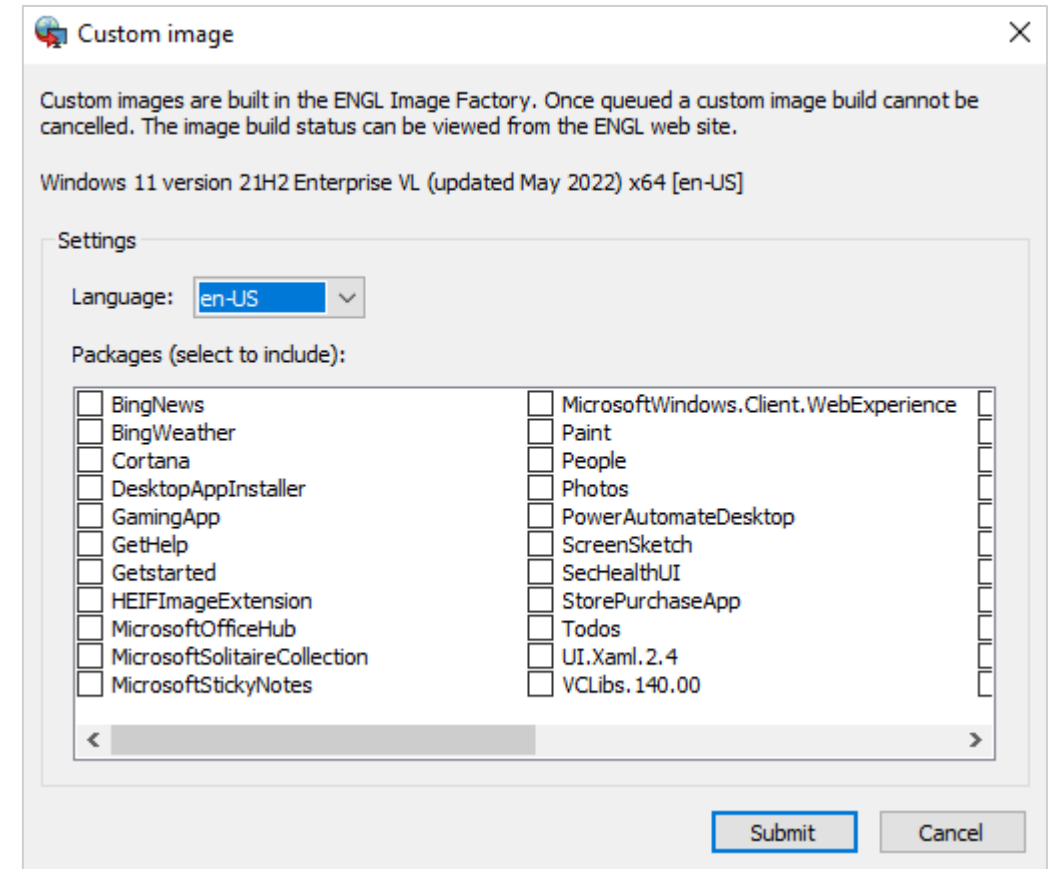
New Custom Refresh Download Close

ENGL Image Service™

Custom image requests

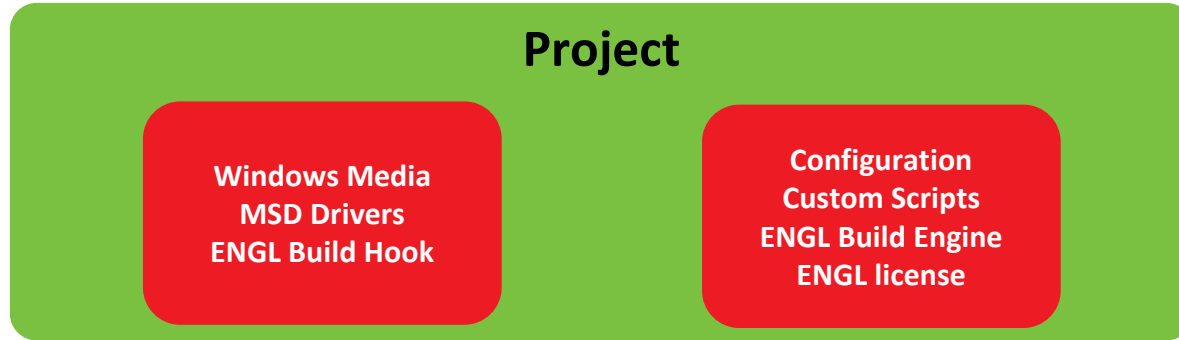


- Custom allow built-in packages to be selected
- Built in the ENGL Image Factory
- Image build status and download audit

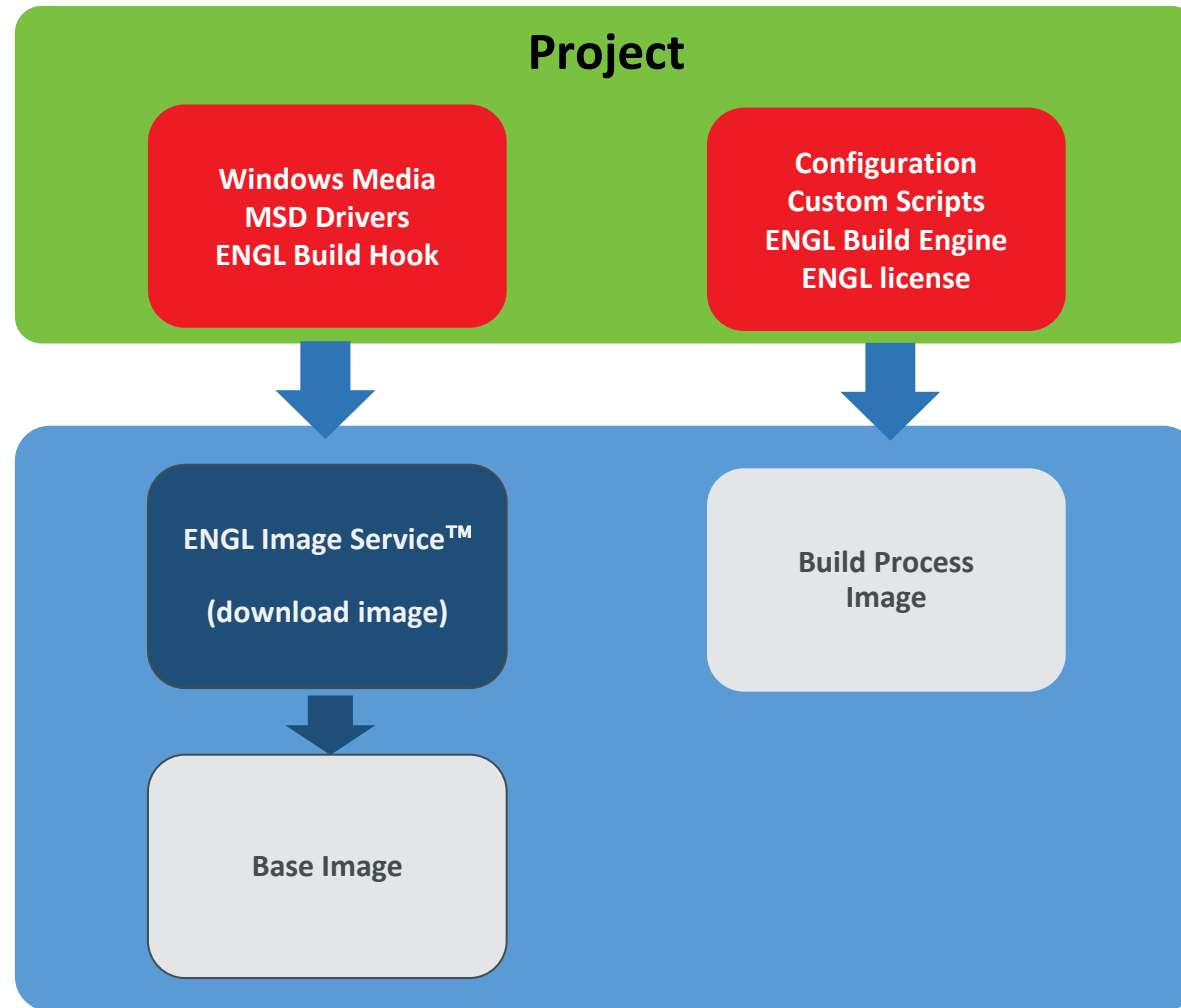


Build Console

Creating a project



Build Console Deployment Wizard



DEMONSTRATION

Deployment


Device enrolled




←

Let's set things up for your work or school

You'll use this info to sign in to your devices.



 Microsoft

Sign in

someone@example.com

Choosing **Next** means that you agree to the [Microsoft Services Agreement](#) and [privacy and cookies statement](#).

ENGL Login

Next

Summary

Summary



- Reduces costs associated with Windows deployment
- One solution for all hardware platforms
- Use Autopilot with the benefits of on-prem imaging
- Subscription based licensing with maintenance
- Technical support
- **It's easy...** automated deployment within a few hours!

