



# UD Pocket (UDP) Reference Manual

 This reference manual applies to UD Pocket and UD Pocket2.

- [General Information](#) (see page 3)
- [Devices Supported by OSC and UD Pocket](#) (see page 4)
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## IGEL TechChannel



Sorry, the widget is not supported in this export.  
But you can reach it using the following URL:

<https://www.youtube.com/watch?v=iURhgESsn6k>



## General Information

UD Pocket boots IGEL OS on your computer. However, it does not make any changes to the operating system already installed on the hard disk, SSD or flash storage - UD Pocket runs entirely from the USB stick.

UD Pocket has a partition which contains this manual and is readable under Windows.

UD Pocket, like all IGEL operating systems, can be managed centrally using the Universal Management Suite (UMS).

This document describes setting up and starting UD Pocket on your computer.

UD Pocket uses IGEL OS, which is described in detail in the IGEL OS Reference Manual.

## Devices Supported by OSC and UD Pocket

### Core Requirements

- CPU with 64-bit support
- CPU speed:  $\geq 1$  GHz
- Memory (RAM):  $\geq 2$  GB

- i** RAM size higher than 2 GB is recommended if you use any of the following:
- Unified Communications optimizations (uses a client-side media engine)
  - High-resolution graphics output
  - More than two monitors

- i** With devices that have 2 GB RAM and shared video memory, a maximum of 512 MB may be used as video memory.

- Storage: Depends on the release version of IGEL OS 11. The details are listed below: 2 GB minimum;  $\geq 4$  GB recommended
  - Up to IGEL OS 11.03: 2 GB minimum;  $\geq 4$  GB recommended
  - From IGEL OS 11.04 to IGEL OS 11.07: If the full feature set is applied, at least 2.4 GB of storage is required. For instructions on how to reduce the feature set, see Error: "Not enough space on local drive" when Updating to IGEL OS 11.08 or Higher.
  - From IGEL OS 11.08 onwards: If the full feature set is applied, at least 2.4 GB of storage is required. For instructions on how to reduce the feature set, see Error: "Not enough space on local drive" when Updating to IGEL OS 11.08 or Higher. **TODO Add URL when published**
- No VIA graphic adapter; VIA graphics support is discontinued in IGEL OS.
- Legacy Bios and EFI/UEFI are supported.

### Devices Supported by OSC and UD Pocket with IGEL OS 11

- !** The following list only includes those devices that are **tested by IGEL** (with each major release of IGEL OS). By no means it implies that the devices which are not included in this list but meet the minimum requirements will not function with IGEL OS: Any x86-64 hardware endpoint device that meets the IGEL-stated minimum hardware requirements for IGEL OS (for example, the processor speed and RAM) can be expected to work adequately with IGEL OS and should be considered a candidate for repurposing from another OS. With an IGEL OS subscription or active maintenance, customers can expect IGEL to make any necessary "best effort" to support, regardless of whether the endpoints in question are specifically listed within the IGEL Knowledge Base or elsewhere (e.g. on the IGEL Ready Showcase at <https://www.igel.com/ready/showcase-categories/endpoints/>).
- For any devices not listed here or on the IGEL Ready showcase, you can contact your hardware vendor and request those devices to be added to the IGEL Ready program.



Integrated drivers and supported peripherals are listed in the [Third-Party Hardware Database](#)<sup>1</sup>. For more solutions compatible with IGEL OS, see Partner Solutions.

**i** HP, Lenovo, and LG device models are available from the factory with pre-installed IGEL OS 11. Please contact [IGEL Ready](#)<sup>2</sup> to get information on which device models are available with pre-installed IGEL OS.

**i** For some of the devices listed here, Flash memory must be extended to  $\geq 2$  GB. For these devices, an appropriate note is added.

**i** On modern computers such as secured-core PCs (see e.g. <https://www.microsoft.com/en-us/windows/business/devices?col=secured-core-pcs>), there may be a BIOS setting related to Secure Boot that allows the use of Microsoft's 3rd party UEFI Secure Boot Certificate. The usual description of such a BIOS setting is "Allow Microsoft 3rd Party UEFI CA". This setting must be set to enabled, as IGEL uses the 3rd party certificate to support UEFI Secure Boot. If UEFI Secure Boot is enabled, but "Allow Microsoft 3rd Party UEFI CA" is not enabled, you may be unable to boot IGEL OS Creator or UD Pocket. Similarly, if the setting "Allow Microsoft 3rd Party UEFI CA" is disabled after a previous installation of IGEL OS, IGEL OS will fail to boot. For how to enable the setting, see Secured-Core PCs: Microsoft 3rd-Party UEFI Certificate for Secure Boot.

**i** [Fn] keys may not work on some supported and listed laptop/notebook models.

## ADS-Tec

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
DVG-VMT9010	Industrial PC/ Terminal	4 GB 8 GB	64 GB eMMC	Intel Atom® x7-E3950	11.02.100
DVG-VMT9012	Industrial PC/ Terminal	4 GB 8 GB	64 GB eMMC	Intel Atom® x7-E3950	11.02.100
DVG-VMT9015	Industrial PC/ Terminal	4 GB 8 GB	64 GB eMMC	Intel Atom® x7-E3950	11.02.100
DVG-VMT9112	Industrial PC/ Terminal	4 GB 8 GB	64 GB eMMC	Intel Atom® x7-E3950	11.02.100

<sup>1</sup> <https://www.igel.com/linux-3rd-party-hardware-database/>  
<sup>2</sup> <https://www.igel.com/technology-partners/>



## Advantech

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
POC-W213L	Medical All in One	4 GB	128 GB	Intel Core i7-7300U	11.01.100
POC-W243L* (see page 15)	Medical All in One	4 GB	32 GB	Intel Kaby Lake Core i5-7300U	11.01.110
POC-W243L* (see page 15)	Medical All in One	4 GB	128 GB	Intel Core i7-7300U	11.01.100

## Advantech-DLoG

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
DLT-V6210	Industrial PC/ Terminal	4 GB	32 GB	Intel Atom	11.01.100
DLT-V7210 K	Industrial PC/ Terminal	4 GB	4 GB	Intel Atom E3845	11.01.100

## Dell / Wyse

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version	Note
5040 / 5212	All in One	2 GB	2 GB	AMD G-T48E	11.01.100	
3040	Thin Client	2 GB	8 GB	Intel Atom x5-Z8350	11.01.100	
5020	Thin Client	2 GB	8 GB	AMD G-Series SoC	11.02.140	
5060	Thin Client	4 GB	8 GB	AMD GX-424CC	11.01.100	



Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version	Note
5070	Thin Client	8 GB	32 GB	Intel Celeron J4105	11.01.100	
Latitude 5510	Laptop/ Notebook	8 GB	256 GB	Intel Core i5-10210U	11.05.100	Wake-on-LAN functionality is not supported.
Optiplex 3000	Thin Client	4 GB	32 GB	Intel Celeron N5105	11.08.200	

### Dynabook

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
Portegé X20W-D	Laptop/ Notebook	8 GB	256 GB	Intel Core i5-7200U	11.01.100
Portegé X30-D	Laptop/ Notebook	8 GB	256 GB	Intel Core i5-7300U	11.01.100
Tecra C50	Laptop/ Notebook	4 GB	500 GB	Intel i5-4210U	11.01.100
Tecra Z50-D	Laptop/ Notebook	8 GB	256 GB	Intel Core i5-7200U	11.01.100
SATELLITE R50	Laptop/ Notebook	4 GB	500 GB	Intel i3-6006U	11.01.100

### Elo

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
i2 Touch (15 and 22 inches)	All in One	8 GB	128 GB	Intel Core i3-8100T	11.05.100



## Fujitsu

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
Q957	Desktop PC	8 GB	500 GB	Intel Core i3-6100	11.02.100
FUTRO S740	Thin Client	4 GB	8 GB	Intel Celeron J4105	11.04.100

## HP

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version	Note
HP t420	Thin Client	2 GB	8 GB	AMD Embedded G-Series GX-209JA	11.02.100	
HP t430	Thin Client	2 GB	16 GB	Intel®Celeron® N4020	11.01.110	
HP t530	Thin Client	4 GB	8 GB	AMD GX-215JJ Dual-Core	11.01.100	
HP t630	Thin Client	4 GB	8 GB	AMD GX-420GI	11.01.100	
HP t730	Thin Client	16 GB	8 GB	AMD RX-427BB APU	11.01.100	
HP t820	Thin Client	16 GB	16 GB	Intel Core i5-4570S	11.01.100	
HP t640	Thin Client	4 GB	16 GB	AMD Ryzen R1505G	11.04.100	
HP t540	Thin Client	16 GB	16 GB	AMD Ryzen Embedded R1305G	11.06.100	





Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version	Note
HP mt46	Mobile Thin Client	8 GB	32 GB	AMD Ryzen 3 PRO 4450U	11.07.100	Excluding support for WWAN and Wake-on-LAN (both features are planned)
HP Elite t655	Thin Client	4 GB / 8 GB	32 GB	AMD Ryzen Embedded R2314	11.07.160	
HP Elite mt645 G7	Mobile Thin Client	8 GB	256 GB	AMD Ryzen 3 5425U	11.08.230	Support for WWAN Intel XMM 7560 R+ (as of 11.08.330) Excluding support for Wake-on-LAN (feature is planned) Excluding support for built-in fingerprint sensor
				AMD Ryzen 5 5625U	11.08.330	
HP t740	Thin Client	8 GB	16 GB	AMD Ryzen Embedded V1756B	11.08.290	
HP Pro t550	Thin Client	4 GB	32 GB	Intel Celeron J6412	11.08.330	
HP Pro mt440 G3	Mobile Thin Client	8 GB	128 GB	Intel Celeron 7305	11.08.440	Excluding support for WWAN Intel XMM 7560 R+ (feature is planned)

## HP Docking Stations

Name	Supported from IGEL OS Version
HP USB-C Docking Station G5	11.08.230
HP USB-C G5 Essential Dock	11.08.290

## Intel

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
NUC 5i5MYHE	Desktop PC	2 GB	32 GB	Intel i5-5300U	11.01.100
NUC 5i3RYH	Desktop PC	2 GB	2 GB	Intel i3-5010U	11.01.100
NUC 7CJYH	Desktop PC	2 GB	4 GB	Intel Celeron J4005	11.01.100

## Lenovo

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Wi-Fi Chip	Supported from IGEL OS Version	Note
ThinkCentre M625q	Desktop PC	4 GB	32 GB	AMD E2-9000e	Intel AC9260	11.04.100	
		8 GB	128 GB	AMD A4-9120e	QCA6174 802.11ac	11.04.100	
ThinkCentre M75n	Desktop PC	8 GB	256 GB	AMD Ryzen 3 Pro 3300U	Intel AC9260	11.05.100	
ThinkCentre M70q Gen1	Desktop PC	16 GB	256 GB	Intel i5-10500t	Comet Lake PCH CNVi WiFi, Intel	11.05.100	
ThinkCentre M70q Gen 3	Desktop PC	16 GB	256 GB	Intel Core i5-12500T	Intel AX201	11.08.240	



Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Wi-Fi Chip	Supported from IGEL OS Version	Note
ThinkCentre M75q Gen 2	Desktop PC	4 GB	128 GB	AMD Ryzen 3 Pro 5350GE	Intel AX200	11.08.240	
K14 AMD Gen 1	Laptop/ Notebook	8 GB	256 GB	AMD Ryzen 5 PRO 5650U	Mediatek MT7921	11.08.240	
ThinkPad L14 AMD Gen 1	Laptop/ Notebook	64 GB	1 TB	AMD Ryzen 7 Pro 4750U	Wi-Fi 6 AX200, Intel	11.05.100	
14w	Laptop/ Notebook	4 GB	64 GB	AMD A6-9220C	QCA6174 802.11ac	11.05.100	
ThinkPad L14 AMD Gen 3	Laptop/ Notebook	16 GB	256 GB	AMD Ryzen 5 5625U	AMD RZ616 2X2AX (WiFi 6E)	11.08.230	Excluding support for WWAN
ThinkCentre Neo50q Gen 4	Thin Client	8 GB	256 GB	Intel Core i3-1215U	Wi-Fi 6 RTL8852BE	11.08.240	
		4 GB	256 GB	Intel Celeron 7305	Wi-Fi 6 AX201		
K14 Intel Gen 1	Laptop/ Notebook	16 GB	256 GB	Intel Core i5-1135G7	Intel AX210 WiFi / BT combo	11.08.290	
ThinkPad L14 Intel Gen 3	Laptop/ Notebook	16 GB	512 GB	Intel Core i5-1235U	Intel Wi-Fi 6 AX201 2x2 AX vPro	11.08.330	LTE support as of 11.08.360
ThinkEdge SE10	Thin Client	8 GB	1 TB	Intel Atom x6425RE	MediaTek MT7921LEN	11.08.360	
			256 GB	Intel Atom x6214RE	Intel AX210	11.08.360	
ThinkPad L14 AMD Gen 4	Thin Client	8 GB	256 GB	AMD Ryzen 3 Pro 7330U	AMD RZ616 Realtek RTL8852CE	11.08.440	Quectel EM05-G 4G CAT4



Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Wi-Fi Chip	Supported from IGEL OS Version	Note
ThinkPad L15 AMD Gen4	Thin Client	8 GB	256 GB	AMD Ryzen 3 Pro 7330U	AMD RZ616 Realtek RTL8852CE	11.08.440	Quectel EM05-G 4G CAT4
ThinkPad L14 Intel Gen 4	Laptop/ Notebook	8 GB	256 GB	Intel Core i3-1315U	Intel AX211	11.09.100	Quectel EM05-G 4G CAT4
ThinkPad L15 Intel Gen 4	Laptop/ Notebook	8 GB	256 GB	Intel Core i3-1315U	Intel AX211	11.09.100	Quectel EM05-G 4G CAT4

### Lenovo Docking Stations

Name	Supported from IGEL OS Version
ThinkPad USB-C Hybrid Dock	11.07.100
IOBOX	11.07.100
Lenovo Universal USB-C Dock	11.08.440

### LG

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
24CK550N* <small>* (see page 15)</small>	All in One	4 GB	32 GB	AMD G-Series GX-212JJ	11.01.100
24CK550W* <small>* (see page 15)</small>	All in One	4 GB	32 GB	AMD G-Series GX-212JJ	11.01.100
24CK560N* <small>* (see page 15)</small>	All in One	4 GB	32 GB	AMD G-Series GX-212JJ	11.01.100
CK500W	Thin Client	4 GB	32 GB	AMD G-Series GX-212JJ	11.01.100



Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
38CK950N	All in One	8 GB	128 GB	AMD Ryzen 3	11.02.100
38CK900N	All in One	8 GB	128 GB	AMD Ryzen 3	11.02.100
CL600N	Thin Client	4 GB	16 GB	Intel® Celeron J4105	11.03.100
CL600W	Thin Client	8 GB	128 GB	Intel® Celeron J4105	11.03.100
34CN650N	All in One	4 GB	16 GB	Intel® Celeron J4105	11.05.100
24CN650N	All in One	8 GB	16 GB	Intel® Celeron J4105	11.05.100
27CN650N	All in One	8 GB	16 GB	Intel® Celeron J4105	11.05.100
CQ600I	Thin Client	4 GB	16 GB	Intel Celeron N5105	11.08.330
24CQ650I	All in One	4 GB	16 GB	Intel Celeron N5105	11.08.330
CQ601I	Thin Client	4 GB	16 GB	Intel Pentium Silver N6005	11.08.360
24CR670I	All in One	4 GB	16 GB	Intel Celeron N5105	11.09.110

### LG Docking Stations

Name	Supported from IGEL OS Version
LG USB Multi Port Hub	11.09.100

### OnLogic

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
CL210G-10	Industrial PC/ Terminal	4 GB	32 GB	Intel Celeron N3350	11.04.100



Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
KARBON 300	Desktop PC	4 GB	32 GB	Intel Atom x5-E3930	11.04.100

### Onyx Healthcare

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
Venus 223	Medical All in One	4 GB	128 GB	Intel Quad-Core J1900	11.01.100

### Pepperl+Fuchs

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
BTC12N	Industrial Box Thin Client	4 GB	32 GB	Intel Apollo Lake N4200	11.09.100
BTC14N	Industrial Box Thin Client	4 GB	32 GB	AMD Ryzen Embedded V1202B	11.09.100

### Rein Medical

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
Silenio C122	All in One	8 GB	128 GB	Intel® Core™ i5 – 6th Generation	11.01.110
Silenio C124	All in One	8 GB	128 GB	Intel® Core™ i5 – 6th Generation	11.01.110
Clinio S 522TCT	Medical All in One	8 GB	16 GB	Intel® Pentium® Silver J5005	11.04.100
Clinio S 524TCT	Medical All in One	8 GB	16 GB	Intel® Pentium® Silver J5005	11.04.100



## Secunet

Name	Endpoint Type	Minimum Memory (RAM) Size	Storage Size	Processor	Supported from IGEL OS Version
SINA Workstation S EliteDesk 800 G2	Workstation	16 GB	256 GB	Intel Core i7-6700	11.01.100


## USB Memory Sticks That Can Be Used as Alternative UD Pocket Hardware


### DIGITTRADE

Name	Storage	Supported from IGEL OS Version
Kobra Stick	≥ 4GB	11.05.133

## Officially Supported Virtual Environments

- Tested with Ubuntu (64-bit) and default settings

 Note that the use of a UD Pocket within a virtual machine is **not** supported by IGEL.

 For some features, more than 2 GB RAM is required. Example: if you use dual monitor environments, a virtual machine must have at least 8 GB RAM.

Name	Memory (RAM)	Storage	Type	Supported from IGEL OS Version
Oracle VM VirtualBox	≥ 2 GB	≥ 4 GB	Linux	11.04.100
VMware Workstation	≥ 2 GB	≥ 4 GB	Linux	11.04.100

\* Delock Adapter DP 1.2 to DVI does not work.

\*\* When using an additional 4k screen with this device, please edit the BIOS settings as follows:

1. Go to the **Chipset** screen.
2. Set **Integrated Graphics** to “Force”.
3. Set **UMA Frame Buffer Size** to “256M” or higher



## Setup and Startup

- [Requirements](#) (see page 17)
- [Boot Settings](#) (see page 18)
- [Starting Your UD Pocket](#) (see page 19)



## Requirements

In order to use UD Pocket, your computer must meet the following requirements:

- 64-bit-capable CPU
- At least 2 GB RAM
- Intel, ATI/AMD or Nvidia graphics chip
- USB 3.0 or 2.0 port from which the computer can boot
- Ethernet or wireless adapter

You will find a detailed list of supported graphics and network chips in the [IGEL Linux 3rd Party Hardware Database](https://www.igel.com/linux-3rd-party-hardware-database/)<sup>3</sup>

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<sup>3</sup> <https://www.igel.com/linux-3rd-party-hardware-database/>

## Boot Settings

UD Pocket works on systems with BIOS and UEFI.

It is essential that your system supports booting from USB storage media. This may already be enabled, or you may have to enable it yourself. The required key presses for this may vary from vendor to vendor. However, here are some hints:

- ▶ While the device is booting, try pressing [F12] (in general), [F10] (Intel devices), or [F9] (Hewlett-Packard devices) in order to access a list of boot devices and select UD Pocket.
- ▶ If the above does not work, access the BIOS settings via pressing [Del], [F1], or [F2] during boot and activate booting from USB storage media and/or change the boot order.
- ▶ See the BIOS/UEFI documentation for your system for details of how to boot from USB storage media.

**i** On modern computers such as secured-core PCs (see e.g. <https://www.microsoft.com/en-us/windows/business/devices?col=secured-core-pcs>), there may be a BIOS setting related to Secure Boot that allows the use of Microsoft's 3rd party UEFI Secure Boot Certificate. The usual description of such a BIOS setting is "Allow Microsoft 3rd Party UEFI CA". This setting must be set to enabled, as IGEL uses the 3rd party certificate to support UEFI Secure Boot. If UEFI Secure Boot is enabled, but "Allow Microsoft 3rd Party UEFI CA" is not enabled, you may be unable to boot IGEL OS Creator or UD Pocket. Similarly, if the setting "Allow Microsoft 3rd Party UEFI CA" is disabled after a previous installation of IGEL OS, IGEL OS will fail to boot. For how to enable the setting, see Secured-Core PCs: Microsoft 3rd-Party UEFI Certificate for Secure Boot.

**i** IGEL OS supports UEFI Secure Boot. Refer to the manual of your device's manufacturer to learn whether your device supports Secure Boot and how to enable it. Enabling Secure Boot often consists of two steps. First, the boot mode has to be changed to UEFI Boot in the BIOS; after that, Secure Boot can be activated, also in the BIOS. How to check whether Secure Boot has been properly enabled, you can learn under Verifying that Secure Boot is Enabled.

**i** If UD Pocket fails to boot in UEFI mode, try it in legacy/BIOS mode.

**w** Do not remove UD Pocket from the computer until you have shut down the IGEL OS contained on it. Otherwise, you can damage the operating system on UD Pocket and lose your settings as well as data on other removable media.

## Starting Your UD Pocket

### The First Boot Procedure

1. Plug the UD Pocket into a free USB slot of your device.
2. Turn on your device; if the device is already switched on, restart it.

### Should the UD Pocket Boot-Up Fail

► If the device does not boot into UD Pocket, but into its pre-installed operating system instead, change the boot settings appropriately. For further information, see [Boot Settings \(see page 18\)](#).

### After the First Boot-Up

The Setup Assistant guides you through the basic configuration. For a detailed description of each step, see Setup Assistant for IGEL OS.