

Alpaquita Linux

Getting started with Azure image



Alpaquita Linux
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be//soft

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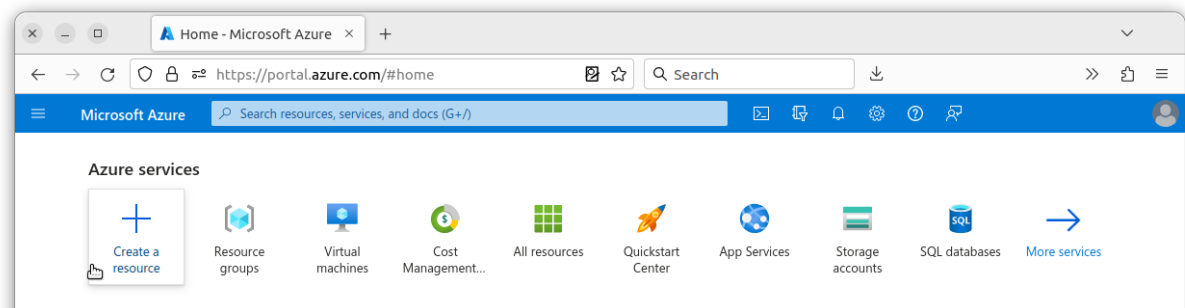
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1. Overview

Microsoft Azure now offers [instances with Alpaquita Linux](#), an Alpine-based Linux distribution with numerous optimizations for enterprise development. You can use Alpaquita Stream for free and pay for Azure VMs only, or you can subscribe to commercial support with LTS releases and 24/7 service.

2. Finding the image in the Marketplace

1. Go to the [Azure portal](https://portal.azure.com) and click the **Create a resource** button under **Azure services**.



2. Type Alpaquita in the search field in the Azure Marketplace and click **Alpaquita Linux** in the drop-down menu with the search results.

[Home](#) >

Create a resource ...

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Alpaquita Linux

alpaquita

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Virtual machine



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Analytics (0)

Blockchain (0)

Containers (0)

Databases (0)

Alpaquita Linux

☐ Azure services only

Showing 1 to 1 of 1 results for 'Alpaquita Linux'. [Clear search](#)

You have 1 results customized for your organization in private products. [View private products](#)

Alpaquita Linux

BELLSOFT

Virtual Machine

A lightweight Linux for cloud applications and containers

Bring your own license

Create

Alpaquita Linux Musl Stream

Alpaquita Linux Glibc Stream

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Next

Or you can click the card to view the description and select the image type on the **Alpaquita Linux** page.

[Home](#) > [Create a resource](#) > [Marketplace](#) >

Alpaquita Linux

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Alpaquita Linux Musl Stream

Create

Start with a pre-set configuration


Want to deploy programmatically? [Get started](#)

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Offered under [Microsoft Standard Contract](#).

Alpaquita Linux is an open Linux distribution for virtual environments. It is based on Alpine, one of the smallest Linux distros, but comes with multiple enhancements that make it optimal for enterprise development. Alpaquita Linux keeps instances lightweight, performant, and secure thanks to the following features: Improved performance with kernel optimizations and three additional mallocs for various workloads; Three libc implementations: default musl, optimized musl (with performance similar or superior to glibc) and glibc; Additional security hardening; Clear EULA licensing; Optional commercial support with 24/7 service, LTS releases are supported for 4 years. Alpaquita Linux can be utilized to develop in Java, Python, C/C++. Java developers will find Alpaquita especially beneficial for their applications, as it is the only Linux tailored to Java workloads. It includes packages for Java development and is fully compatible with Liberica JDK (Unified Java Runtime) and Liberica Native Image Kit (GraalVM-based utility for native image generation), both used and recommended by the Spring team. Coupled with Liberica Lite, Alpaquita Linux enables the creation of smaller instances, thus reducing resource consumption, pull time, and, consequently, cloud costs. Liberica JDK is also available in Microsoft Azure

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3. Creating a VM form

Once you choose the image, Azure VM creation form appears. You need to fill some data though default values are suitable for the most cases. The following parts describe some key settings that you might want to change.

Basic tab

Name and size

Provide a name for your new VM and select the **Size** of your VM, that determines the number of CPUs and the amount of RAM.

Subscription *	<div>Azure subscription 1</div>
Resource group *	<div>(New) Alpaquita-Demo_group</div> <div>Create new</div>
Instance details	
Virtual machine name *	<div>Alpaquita-Demo</div>
Region *	<div>(Europe) North Europe</div>
Availability options	<div>No infrastructure redundancy required</div>
Security type	<div>Standard</div>
Image *	<div> Alpaquita Linux Musl Stream - x64 Gen1</div> <div>See all images Configure VM generation</div>
VM architecture	<div><input type="radio"/> Arm64</div> <div><input checked="" type="radio"/> x64</div> <div> Arm64 is not supported with the selected image.</div>
Run with Azure Spot discount	<div><input type="checkbox"/></div>
Size *	<div>Standard_B1ls - 1 vcpu, 0.5 GiB memory (\$4.16/month)</div> <div>See all sizes</div>

Resource group

An Azure VM comprises several resources, like disks, public IP addresses, network firewall rules, etc. Azure groups these resources into *resource groups* for easier overview and management. Azure form automatically suggests to create a new resource group named after the newly created VM. You can change the suggested name of the new group or use an existing group instead.

Account and SSH key

A user is created automatically. The default name is `azureuser`. You can change the name in the **Username** field.

Administrator account

Authentication type ⓘ

- ☒ SSH public key
☐ Password

i Azure now automatically generates an SSH key pair for you and allows you to store it for future use. It is a fast, simple, and secure way to connect to your virtual machine.

Username * ⓘ

azureuser ✓

SSH public key source

Generate new key pair 🖱️ ▼

Key pair name *

Alpaquita-Demo_key ✓

Inbound port rules

Select which virtual machine network ports are accessible from the public internet. You can specify more limited or granular network access on the Networking tab.

Public inbound ports * ⓘ

- ☐ None
☒ Allow selected ports

Select inbound ports *

SSH (22) ▼

The created user does not have a conventional password. To access the VM as that user you must identify yourself with an SSH key. You can choose to generate a new key, or you can use your existing key in the **SSH public key source**.

SSH public key source

Generate new key pair ▼

Key pair name *

Generate new key pair
 Use existing key stored in Azure
 Use existing public key 🖱️

Inbound port rules

Now click **Next** to proceed to the Disks tab.

Disks tab

Select the storage type as a primary OS disk in **OS disk type**.

Home > Create a resource > Marketplace >

Create a virtual machine ...

Basics **Disks** Networking Management Monitoring Advanced Tags Review + create

Azure VMs have one operating system disk and a temporary disk for short-term storage. You can attach additional data disks. The size of the VM determines the type of storage you can use and the number of data disks allowed. [Learn more](#)

VM disk encryption

Azure disk storage encryption automatically encrypts your data stored on Azure managed disks (OS and data disks) at rest by default when persisting it to the cloud.

Encryption at host ☐

Encryption at host is not registered for the selected subscription. [Learn more about enabling this feature](#)

OS disk

OS disk type *

Delete with VM ☒

Key management

Enable Ultra Disk compatibility ☐

Ultra disk is supported in Availability Zone(s) 1,2,3 for the selected VM size Standard_B1ls.

Data disks for Alpaquita-Demo

You can add and configure additional data disks for your virtual machine or attach existing disks. This VM also comes with a

Review + create

< Previous

Next : Networking >

If you have data disks that you want to attach, you can do it in this step. You can also create a new unformatted data disks to attach to the new VM.

Data disks for Alpaquita-Demo

You can add and configure additional data disks for your virtual machine or attach existing disks. This VM also comes with a temporary disk.

LUN	Name	Size (GiB)	Disk type	Host caching	Delete with VM
	Create and attach a new disk		Attach an existing disk		

Networking tab

You might want to check the networking tab next. For a simple demo, use the default values. You can open the advanced settings for the NIC security group and edit the firewall rules, or use the existing ones. You can also select the **Delete NIC when VM is deleted** option for this demo.

Advanced tab

Alpaquita supports Microsoft Azure Linux Agent and you can specify custom data for the newly created VM on the Advanced tab. The custom data are applied once when VM is provisioned. For example, you can provide a shell script to run once.

[Home](#) > [Create a resource](#) > [Marketplace](#) >

Create a virtual machine ...

Basics Disks Networking Management Monitoring **Advanced** Tags Review + create

Add additional configuration, agents, scripts or applications via virtual machine extensions or cloud-init.

Extensions

Extensions provide post-deployment configuration and automation.

Extensions ⓘ

[Select an extension to install](#)

VM applications

VM applications contain application files that are securely and reliably downloaded on your VM after deployment. In addition to the application files, an install and uninstall script are included in the application. You can easily add or remove applications on your VM after create. [Learn more](#) ↗

[Select a VM application to install](#)

Custom data

Pass a script, configuration file, or other data into the virtual machine **while it is being provisioned**. The data will be saved on the VM in a known location. [Learn more about custom data for VMs](#) ↗

Custom data

```
#!/bin/sh
exec > /root/custom.log 2>&1
echo Hello, Alpaquita
|
```

i Your image must have a code to support consumption of custom data. If your

Review and create

You are ready to create the VM. Go to the **Review+Create** tab and click **Create**.

[Home](#) > [Marketplace](#) >

Create a virtual machine ...

✓ Validation passed

Basics Disks Networking Management Monitoring Advanced Tags **Review + create**

i Cost given below is an estimate and not the final price. Please use [Pricing calculator](#) for all your pricing needs.

Price

Alpaquita Linux
by BELLSOFT
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Not covered by credits ⓘ

0.0000 USD/hr

1 X Standard B1Is
by Microsoft
[Terms of use](#) | [Privacy policy](#)

Subscription credits apply ⓘ

0.0057 USD/hr

[Pricing for other VM sizes](#)

TERMS

By clicking "Create", I (a) agree to the legal terms and privacy statement(s) associated with the Marketplace offering(s) listed above; (b) authorize Microsoft to bill my current payment method for the fees associated with the offering(s), with the same

Create


< Previous

Next >

[Download a template for automation](#)

It takes some time for your new VM to be deployed.

Home >

 **CreateVm-bellsoft1582871421940.alpaquita-linux-al-20230504164318** | Overview ⚙ ...

Deployment

Search << Delete Cancel Redeploy Download Refresh


Overview

Inputs



Outputs

Template

Deployment is in progress

Deployment name: CreateVm-bellsoft1582871421940.alpaquita-lin... Start time: 5/4/2023, 4:53:49 PM
Subscription: [Azure subscription 1](#) Correlation ID: cec485eb-9d6a-4605-9c1a-caf648a2e99e 
Resource group: [Alpaquita-Demo_group](#)

Deployment details


Resource	Type	Status	Operation details
 Alpaquita-Demo-vnet	Microsoft.Network/virtualNetworks	Created	Operation details
 Alpaquita-Demo-ip	Microsoft.Network/publicIpAddresses	Created	Operation details

Give feedback

[Tell us about your experience with deployment](#)

When the deployment process is complete, click **Go to the resource**.

Home >

 **CreateVm-bellsoft1582871421940.alpaquita-linux-al-20230504164318** | Overview ⚙ ...

Deployment

Search << Delete Cancel Redeploy Download Refresh


Overview

Inputs

Outputs

Template

✓ Your deployment is complete

Deployment name: CreateVm-bellsoft1582871421940.alpaquita-lin... Start time: 5/4/2023, 4:53:49 PM
Subscription: [Azure subscription 1](#) Correlation ID: cec485eb-9d6a-4605-9c1a-caf648a2e99e 
Resource group: [Alpaquita-Demo_group](#)

Deployment details

Next steps

[Setup auto-shutdown](#) Recommended

[Monitor VM health, performance and network dependencies](#) Recommended

[Run a script inside the virtual machine](#) Recommended

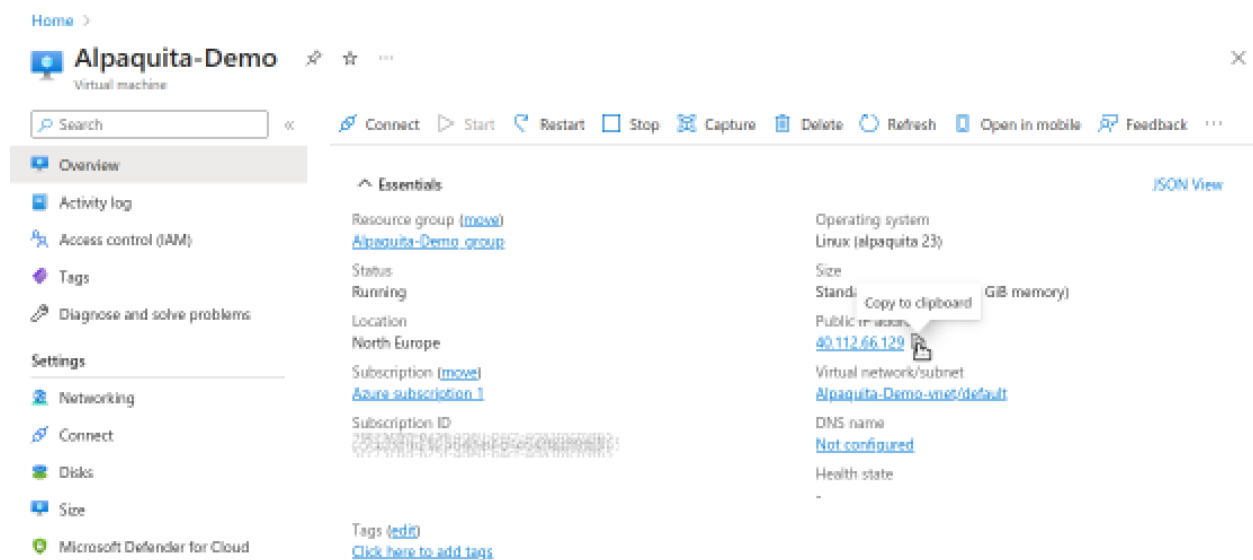
[Go to resource](#) [Create another VM](#)

Give feedback

[Tell us about your experience with deployment](#)

4. Reviewing your new VM

This page provides an overview of your new VM. Note and copy its public IP address.



Reviewing the console log (optional)

Click the Boot diagnostics item in the left sidebar (you might need to scroll down the page).

Home > Alpaquita-Demo

Alpaquita-Demo | Boot diagnostics

Virtual machine

Search Refresh Settings Troubleshoot

- Metrics
- Diagnostics settings
- Logs
- Connection monitor (classic)
- Workbooks

Automation

- Tasks (preview)
- Export template

Help

- Resource health
- Boot diagnostics**
- Performance diagnostics
- VM Inspector (Preview)
- Reset password
- Redeploy + reapply
- Serial console
- Network security group test
- Support + Troubleshooting

Screenshot Serial log

Updated: Thursday, May 4, 2023 at 1:59:05 PM UTC [Download screenshot](#)

```
Probing EDD (edd=off to disable)... ok
Welcome to BellSoft Alpaquita Linux Stream 23
Kernel 6.1.22-0-lts on an x86_64 (/dev/tty1)
alpaquita login: _
```

To review and identify any problems, switch to the Serial log tab that shows the complete output from the boot process.

Home > Alpaquita-Demo

Alpaquita-Demo | Boot diagnostics ☆ ...
Virtual machine

Search << Refresh Settings Troubleshoot

Metrics

Diagnostic settings

Logs

Connection monitor (classic)

Workbooks

Automation

Tasks (preview)

Export template

Help

Resource health

Boot diagnostics

Performance diagnostics

VM Inspector (Preview)

Reset password

Redeploy + reapply

Serial console

Network security group test

Support + Troubleshooting

Screenshot **Serial log**

Updated: Thursday, May 4, 2023 at 1:55:05 PM UTC [Download serial log](#)

```

[ 1.738822] sd 2:0:0:0: [sda] 33554432 512-byte logical blocks: (17.2 GB/16.0 GiB)
[ 1.741011] sd 2:0:0:0: [sda] 4096-byte physical blocks
[ 1.742798] sd 3:0:1:0: [sdb] 8388608 512-byte logical blocks: (4.29 GB/4.00 GiB)
[ 1.744925] sd 3:0:1:0: [sdb] 4096-byte physical blocks
[ 1.747820] sd 3:0:1:0: [sdb] Write Protect is off
[ 1.749538] sd 2:0:0:0: [sda] Write Protect is off
[ 1.753757] sd 3:0:1:0: [sdb] Write cache: disabled, read cache: enabled, supports DPO and
FUA
[ 1.756439] sd 2:0:0:0: [sda] Write cache: enabled, read cache: enabled, supports DPO and
FUA
[ 1.764120] sdb: sdb1
[ 1.765349] sd 3:0:1:0: [sdb] Attached SCSI disk
[ 1.768803] sda: sda1 sda2
[ 1.769772] sd 2:0:0:0: [sda] Attached SCSI disk
[ 2.302116] XFS (sda2): Mounting V5 Filesystem
[ 2.583676] XFS (sda2): Ending clean mount
[ 2.615147] dracut: Mounted root filesystem /dev/disk/by-uuid/
d7eb07e1-7d6e-4752-874a-6aa0f585768a
[ 2.642458] dracut: Switching root

OpenRC 0.46 is starting up Alpaquita Linux (x86_64)

* /proc is already mounted
* /run/openrc: creating directory
* /run/lock: correcting mode
* /run/lock: correcting owner
* Caching service dependencies ... [ ok ]
* Mounting security filesystems ... [ ok ]

```

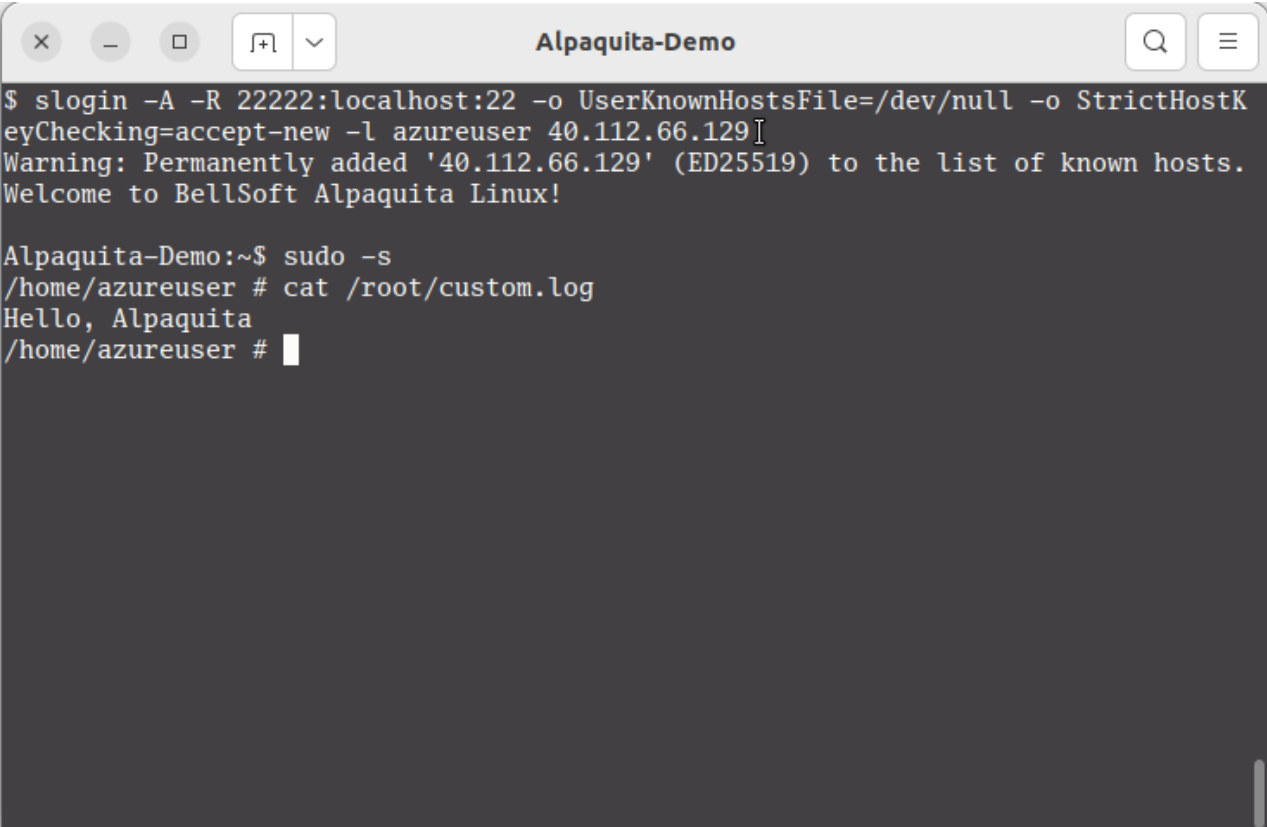
Importing SSH key into your new VM

Start your `ssh` client in your terminal to log into your new VM. If you changed the username adjust the `-l` option argument accordingly.

The command in this example also instructs `ssh` to accept and ignore the host key, sets up agent forwarding, and creates port-forwarding back to the `ssh` server on your host so that you can copy files from the cloud VM back to your host even if it is behind a corporate firewall.

You can use `sudo` without a password, because your cloud user does not have one.

You can also see that the custom data shell script was executed.



```
$ slogin -A -R 22222:localhost:22 -o UserKnownHostsFile=/dev/null -o StrictHostKeyChecking=accept-new -l azureuser 40.112.66.129
Warning: Permanently added '40.112.66.129' (ED25519) to the list of known hosts.
Welcome to BellSoft Alpaquita Linux!

Alpaquita-Demo:~$ sudo -s
/home/azureuser # cat /root/custom.log
Hello, Alpaquita
/home/azureuser #
```

Now you can connect to the Azure VM running Alpaquita Linux.



Alpaquita Linux

Getting started with Azure image

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