

Zabbix 7.4

Inštalácia a upgrade

8.6.2025

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axians

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Agenda

1. Možné spôsoby inštalácie verzie 7.4
2. Ako na upgrade
3. Ďalšie novinky a informácie



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ZABBIX

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ZABBIX 7.4

Inštalácia



Inštalácia – balíčky

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install Zabbix
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Free trial

Zabbix Cloud

Available with
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Third-Party cloud vendors

Run Zabbix on
third-party cloud
platforms

Zabbix Containers

Deploy Zabbix
components from
official Zabbix
containers

Zabbix Appliance

Run Zabbix from
a pre-configured
Zabbix virtual
appliance

Zabbix Sources

Download the
Zabbix source
code

Zabbix Agents

Download Zabbix
agent for Unix-like
and Windows
environments

1

Choose your platform

ZABBIX VERSION	OS DISTRIBUTION	OS VERSION	ZABBIX COMPONENT	DATABASE	WEB SERVER
7.4	Alma Linux	10 (amd64, arm64)	Server, Frontend, Agent	MySQL	Apache
7.2	Amazon Linux	9 (amd64, arm64)		PostgreSQL	Nginx
7.0 LTS	CentOS	8 (amd64, arm64)	Server, Frontend, Agent 2		
6.0 LTS	Debian	7 (amd64)	Proxy		
	OpenSUSE Leap		Agent		
	Oracle Linux		Agent 2		
	Raspberry PI OS		Java Gateway		
	Red Hat Enterprise Linux		Web Service		



Inštalácia – kontajnery

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Documentation

Zabbix Installation
from containers

Read manual

Zabbix Docker Component Repositories

Zabbix Docker hub



Zabbix Server

MySQL



Zabbix Server

PostgreSQL



Zabbix Proxy

SQLite3



Zabbix Proxy

MySQL



Zabbix Frontend

Apache, MySQL



Inštalácia – appliance

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Install Zabbix Appliance

Zabbix 7.4

Zabbix 7.2

Zabbix 7.0 LTS

Zabbix 6.0 LTS

Version	Release	Date	Platform	Release Notes	Zabbix Manual	Verify	Download
Zabbix 7.4	7.4.0	Jul 01, 2025	Installation CD/DVD (.iso)			SHA1 SHA256	Download
Zabbix 7.4	7.4.0	Jul 01, 2025	KVM, QEMU (.qcow2)			SHA1 SHA256	Download
Zabbix 7.4	7.4.0	Jul 01, 2025	Microsoft Hyper-V (.vhd)			SHA1 SHA256	Download
Zabbix 7.4	7.4.0	Jul 01, 2025	Microsoft Hyper-V (.vhdx)			SHA1 SHA256	Download
Zabbix 7.4	7.4.0	Jul 01, 2025	Open virtualization format (.ovf)			SHA1 SHA256	Download



Inštalácia – vyskúšajte Zabbix s Axians



ZABBIX NA SKÚŠKU

Vyskúšajte si ako službu zdarma
Predkonfigurovaný virtuálny stroj s
najnovšou verziou Zabbixu na skúšku
vo vašom prostredí

ZISTITE VIAC →

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- Konzultácia za účelom nasadenia zdarma
- Zaškolenie na používateľskej úrovni
- Úspora času pri implementácii
- Vždy najnovšia verzia Zabbixu s novými funkciami
- Monitoring Linux a Windows serverov/PC pomocou autoregistrácie Zabbix agentov
- Automatický discovering zariadení v sieti a ich základný monitoring (ping a SNMP)
- Predkonfigurovaný strom služieb a SLA report pre dostupnosť monitoringu a dostupnosť monitorovaných zariadení



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ZABBIX 7.4

Upgrade

Upgrade

Upgrade – všeobecný postup

- Skontrolovať požiadavky (verzie DB, PHP...)
- Prejsť si upgrade notes od verzie, z ktorej bude prebiehať upgrade
- Skontrolovať zmeny v API a upraviť skripty
- Upgrade binárnych súborov Zabbix servera a schémy databázy
- Upgrade binárnych súborov komponentov infraštruktúry (Zabbix proxy, Zabbix agent...)

Upgrade

Kontrola požiadaviek

- Verzia OS podľa typu distribúcie pre jednotlivé komponenty Zabbixu (Zabbix server, proxy)
- Verzia databázy (koniec podpory pre Oracle)
- Verzia PHP

Zabbix Manual

1 Introduction

2 Definitions

3 Zabbix processes

4 Installation

1 Getting Zabbix

2 Requirements

3 Installation from sources

4 Installation from packages

5 Installation from containers

6 Web interface installation

7 Upgrade procedure

8 Known issues

9 Template changes

10 Upgrade notes for 7.4.0

2 Requirements

Hardware

Memory

Zabbix requires both physical and disk memory. The more memory you have, the more data you can store. If you're planning to keep a long history of monitored items, you will need a lot of memory. Each Zabbix daemon process requires several megabytes of memory for the configuration of the database engine.

Note: The more physical memory you have, the more data you can store.

CPU

Zabbix and especially Zabbix database may require a lot of CPU resources.

Other hardware

A serial communication port and a serial GSM modem are required for the Zabbix agent to communicate with the Zabbix server.

Examples of hardware configuration



Upgrade

Upgrade notes

- Priamy upgrade je možný z verzie 2.0
- Upgrade notes od verzie, z ktorej upgrade prebieha

Upgrade from	Read full upgrade notes
7.2.x	For: Zabbix 7.4
7.0.x LTS	For: Zabbix 7.2 Zabbix 7.4
6.4.x	For: Zabbix 7.0 Zabbix 7.2 Zabbix 7.4
6.2.x	For: Zabbix 6.4 Zabbix 7.0 Zabbix 7.2 Zabbix 7.4

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- 1 Upgrade from sources

7 Upgrade procedure

Overview

This section provides upgrade information for Zabbix 7.4:

- Using packages for [Red Hat Enterprise Linux](#) or [Debian](#)
- Using [sources](#)

Related instructions:

- For servers in a high-availability (HA) cluster, see [Upgrading TimescaleDB](#)
- For TimescaleDB database, see [Upgrading TimescaleDB](#)

Upgrading Zabbix agents is recommended but not mandatory.

Upgrading Zabbix proxies is highly recommended. Zabbix version, but with limited functionality (data collection, etc.).

Attention: Proxies that are older than Zabbix server



Upgrade

Zmeny v API

- Nutné skontrolovať od verzie, z ktorej prebieha upgrade
- Príprava nových skriptov, ktoré využívajú API, ak nová verzia prináša zmeny, ktoré ovplyvňujú ich fungovanie

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14 Configuration export/import

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16 Distributed monitoring

17 Encryption

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19 Best practices

20 API

Method reference

Appendix 1. Reference commentary

Appendix 2. Changes from 7.2 to 7.4

Appendix 3. Changes in 7.4

Appendix 2. Changes from 7.2 to 7.4

Backward incompatible changes

map

[ZBXNEXT-8784](#) Removed properties `linktriggerid` and `linkid` from the `map link` object.

mediatype

[ZBX-26258](#) `mediatype.get`: Added strict validation of `selectUsers` parameter.

user

[ZBX-26258](#) `user.get`: Added strict validation of method parameters.
[ZBX-26258](#) `user.get`: Property `userid` is now returned only if explicitly requested.

usergroup

[ZBX-26258](#) `usergroup.get`: Added strict validation of `mfaids`, `selectUsers` parameters.

Other changes and bug fixes

dashboard

[ZBXNEXT-9087](#) Added new dashboard widget type `itemcard`.

discoveryruleprototype

[ZBXNEXT-1527](#) Added new LLD rule prototype API with methods `discoveryruleprototype.create`, `discoveryruleprototype.delete`.

map

[ZBXNEXT-875](#) Added property `zindex` to `map element` object.
[ZBXNEXT-2122](#) Added properties `edit_own_media` and `edit_user_media` to the `map element` object.
[ZBXNEXT-8784](#) Added properties `background_scale`, `show_element_label`, `show_element_value` to the `map element` object.
[ZBXNEXT-8784](#) Added property `show_label` to `map element` object.
[ZBXNEXT-8784](#) Added properties `show_label`, `indicator_type`, `itemid`, `threshold` to the `map link indicators` object.
[ZBXNEXT-8784](#) Added the `map link indicators` object.

mediatype

[ZBXNEXT-8885](#) Added action `#01: Add Zabbix media link` to the `mediatype` object.



Upgrade

Scenár 1 – Zabbix server vo verzii 7.0 alebo 7.2

- Zabbix server je čiastočne kompatibilný so Zabbix proxy po najbližšiu LTS verziu
- Po upgrade Zabbix servera budú fungovať Zabbix proxy servery v móde čiastočnej compatibility – zber údajov, remote commands
- Následne je potrebné postupne upgradovať Zabbix proxy servery – monitoring funguje, ale proxy server nie sú schopné získať novú konfiguráciu

Proxies							
☐ Name ▲	Mode	Encryption	State	Version	Last seen (age)	Item count	Required v
☐ Paris: proxy11	Active	None	Online	6.4.0	6m 8s	88	0
☐ Paris: proxy12	Active	None	Online	6.4.0	4m 18s	160	1.21
☐ Warsaw: proxy13	Active	None	Online	7.0.6 	6m 3s	45	0



Upgrade

Scenár 2 – Zabbix server vo verzii 6.4 a staršej

- Po uprade Zabbix servera nebudú Zabbix proxy servery kompatibilné so Zabbix serverom
- Upgrade Zabbix proxy serverov je nutné vykonať čo najskôr, nedochádza k odovzdávaniu údajov a monitoring je nefunkčný

Proxies

☐ Name ▲	Mode	Encryption	State	Version	Last seen (age)	Item count	Required version
☐ Paris: proxy10	Passive	CERT	Online	5.2.1 	5m 58s	16	0
☐ Paris: proxy11	Active	None	Online	6.4.0	6m 8s	88	0
☐ Paris: proxy12	Active	None	Online	6.4.0	4m 18s	160	1.21

Upgrade

Upgrade procedúra Zabbix servera

- Zastaviť procesy Zabbix servera
- Vytvoriť zálohu databázy
- Vytvoriť zálohu konfiguračných súborov Zabbix komponentov (Zabbix server, agent, frontend), PHP súborov
- Upgrade balíčka s konfiguráciou repozitára
- Upgrade komponentov Zabbixu
- Optimalizácia konfiguračných súborov
- Upgrade schémy databázy spustením novej verzie Zabbix servera a spustenie Zabbix komponentov
- Vyčistenie web prehliadača (cache, cookies)

Upgrade

Upgrade Zabbix proxy

- Ak proxy využíva SQLite, súbor s databázou bude vymazaný a vytvorí sa automaticky nový
- Na minimalizácia výpadkov a straty údajov počas aktualizácie, je vhodné zastaviť, aktualizovať a spustiť Zabbix server a následne upgradovať Zabbix proxy servery. Počas nedostupnosti Zabbix servera budú Zabbix proxy servery pokračovať v zbere údajov. Po spustení Zabbix servera budú proxy servery odosielať údaje na nový server a zostanú čiastočne funkčné.

Upgrade

TimescaleDB a nové hypertabuľky

- Ak pribudli medzi verziami nové hypertabuľky, upgrade automaticky nerieši ich vytvorenie (napr. verzia 7.0 a 7.2 prináša nové hypertabuľky)

Postup vytvorenia nových hypertabuliek

- Spustením novej verzie Zabbix servera aktualizovať existujúcu databázu.
- Po dokončení aktualizácie databázy zastaviť server Zabbix.
- Spustiť skript `postgresql/timescaledb/schema.sql` ktorý nakonfiguruje nové hypertabuľky





Upgrade

Zabbix server v HA konfigurácii

- Zastaviť všetky uzly klastra
- Ak databáza používa replikáciu, všetky uzly db klastra musia byť synchronizované a replikácia musí fungovať
- Vybrať jeden uzol, ktorý vykoná aktualizáciu databázy
- Zmeniť jeho konfiguráciu na standalone zakomentovaním HANodeName a vykonať upgrade
- Reštartovať uzol v režime HA
- Aktualizovať a spustiť zvyšok uzlov



Upgrade

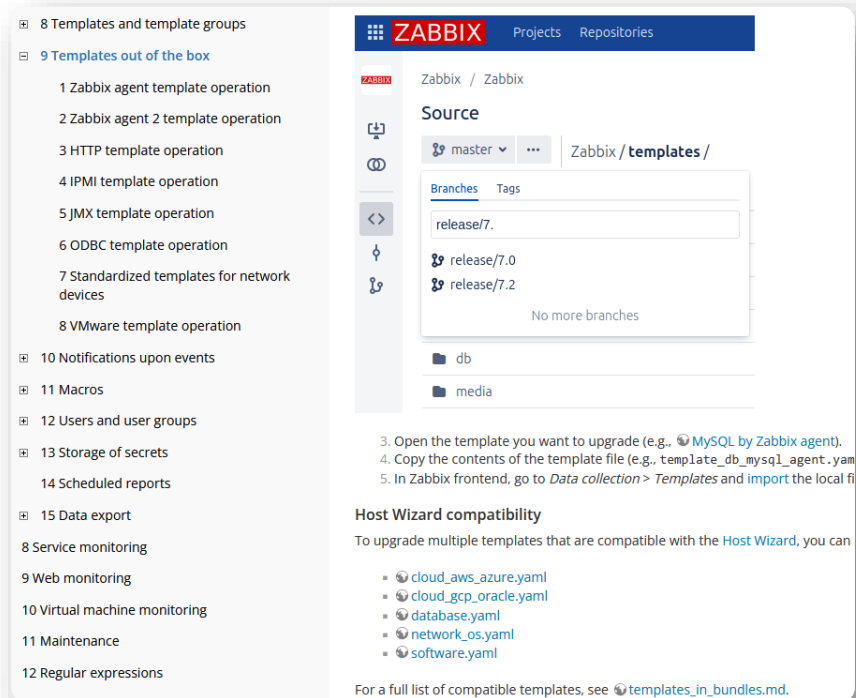
Šablóny, šablóny, šablóny...

- **Procedúra aktualizácie nerieši upgrade šablón! Zdrojom šablón je Zabbix Git repozitár.**
- Ak už využívané šablóny obsahujú prototypy hostov, na ktoré sú linkované šablóny obsahujúce iné prototypy hostov, aktualizácia na Zabbix 7.4 spôsobí, že všetky objavené hosty budú mať prototypy hostov definované v týchto šablónoch.
- Po aktualizácii na novú verziu je vždy potrebné upgradovať dve základné šablóny:
 - ✓ **Zabbix server health**
 - ✓ **Zabbix proxy health**
- **Aby šablóny fungovali s funkcionalitou Host Wizard, je potrebné ich upgradovať!**



Upgrade

Upgrade šablón pre funkcionality Host wizard



The screenshot shows the Zabbix web interface. On the left is a sidebar menu with categories like '8 Templates and template groups', '9 Templates out of the box', '10 Notifications upon events', '11 Macros', '12 Users and user groups', '13 Storage of secrets', '14 Scheduled reports', '15 Data export', '8 Service monitoring', '9 Web monitoring', '10 Virtual machine monitoring', '11 Maintenance', and '12 Regular expressions'. The main content area is titled 'ZABBIX Projects Repositories' and shows the 'Zabbix / Zabbix' path. Under the 'Source' section, there's a dropdown for 'master' and a search bar. A modal window displays 'Branches' with a search bar containing 'release/7.' and a list of branches: 'release/7.0' and 'release/7.2'. Below the modal, there are folders 'db' and 'media'. A list of instructions is provided: 3. Open the template you want to upgrade (e.g., MySQL by Zabbix agent). 4. Copy the contents of the template file (e.g., template_db_mysql_agent.yaml). 5. In Zabbix frontend, go to Data collection > Templates and import the local file. Below this, a section titled 'Host Wizard compatibility' states: 'To upgrade multiple templates that are compatible with the Host Wizard, you can' followed by a list of compatible templates: cloud_aws_azure.yaml, cloud_gcp_oracle.yaml, database.yaml, network_os.yaml, and software.yaml. At the bottom, it says: 'For a full list of compatible templates, see templates_in_bundles.md.'

8 Templates and template groups

9 Templates out of the box

- 1 Zabbix agent template operation
- 2 Zabbix agent 2 template operation
- 3 HTTP template operation
- 4 IPMI template operation
- 5 JMX template operation
- 6 ODBC template operation
- 7 Standardized templates for network devices
- 8 VMware template operation

10 Notifications upon events

11 Macros

12 Users and user groups

13 Storage of secrets

14 Scheduled reports

15 Data export

8 Service monitoring

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ZABBIX Projects Repositories

Zabbix / Zabbix

Source

master Zabbix / templates /

Branches Tags

release/7.

release/7.0

release/7.2

No more branches

db

media

3. Open the template you want to upgrade (e.g., MySQL by Zabbix agent).

4. Copy the contents of the template file (e.g., template_db_mysql_agent.yaml).

5. In Zabbix frontend, go to Data collection > Templates and import the local file.

Host Wizard compatibility

To upgrade multiple templates that are compatible with the Host Wizard, you can

- cloud_aws_azure.yaml
- cloud_gcp_oracle.yaml
- database.yaml
- network_os.yaml
- software.yaml

For a full list of compatible templates, see [templates_in_bundles.md](#).



network_os.yaml

Cisco IOS by SNMP
Cisco IOS prior to 12.0_3_T by SNMP
Cisco IOS versions 12.0_3_T-12.2_3.5 by SNMP
ICMP Ping
Linux by Prom
Linux by SNMP
Linux by Zabbix agent
Linux by Zabbix agent active
Mikrotik by SNMP
Windows by SNMP
Windows by Zabbix agent
Windows by Zabbix agent active

software.yaml

Apache by HTTP
Apache by Zabbix agent
Apache by Zabbix agent active
Kubernetes API server by HTTP
Kubernetes cluster state by HTTP
Kubernetes Controller manager by HTTP
Kubernetes Kubelet by HTTP
Kubernetes nodes by HTTP
Kubernetes Scheduler by HTTP
Nginx by HTTP
Nginx by Zabbix agent
Nginx by Zabbix agent active
Remote Zabbix proxy health
Remote Zabbix server health
VMware
VMware FQDN
VMware Guest
VMware Hypervisor

cloud_gcp_oracle.yaml

GCP by HTTP
GCP Cloud SQL MSSQL by HTTP
GCP Cloud SQL MSSQL Replica by HTTP
GCP Cloud SQL MySQL by HTTP
GCP Cloud SQL MySQL Replica by HTTP
GCP Cloud SQL PostgreSQL by HTTP
GCP Cloud SQL PostgreSQL Replica by HTTP
GCP Compute Engine Instance by HTTP
Oracle Cloud Autonomous Database by HTTP
Oracle Cloud Block Volume by HTTP
Oracle Cloud Boot Volume by HTTP
Oracle Cloud by HTTP
Oracle Cloud Compute by HTTP
Oracle Cloud Networking by HTTP
Oracle Cloud Object Storage by HTTP

database.yaml

MSSQL by ODBC
MSSQL by Zabbix agent 2
MySQL by ODBC
MySQL by Zabbix agent
MySQL by Zabbix agent 2
MySQL by Zabbix agent 2 active
MySQL by Zabbix agent active
Oracle by ODBC
Oracle by Zabbix agent 2
PostgreSQL by ODBC
PostgreSQL by Zabbix agent
PostgreSQL by Zabbix agent 2
PostgreSQL by Zabbix agent 2 active
PostgreSQL by Zabbix agent active

cloud_aws_azure.yaml

AWS by HTTP
AWS Cost Explorer by HTTP
AWS EC2 by HTTP
AWS ECS Cluster by HTTP
AWS ECS Serverless Cluster by HTTP
AWS ELB Application Load Balancer by HTTP
AWS ELB Network Load Balancer by HTTP
AWS Lambda by HTTP
AWS RDS instance by HTTP
AWS S3 bucket by HTTP
Azure Backup Jobs by HTTP
Azure by HTTP
Azure Cosmos DB for MongoDB by HTTP
Azure Cost Management by HTTP
Azure Microsoft SQL Database by HTTP
Azure Microsoft SQL DTU Database by HTTP
Azure Microsoft SQL Serverless Database by HTTP
Azure MySQL Flexible Server by HTTP
Azure MySQL Single Server by HTTP
Azure PostgreSQL Flexible Server by HTTP
Azure PostgreSQL Single Server by HTTP
Azure SQL Managed Instance by HTTP
Azure Virtual Machine by HTTP
Azure VM Scale Set by HTTP



Upgrade

Ako upraviť custom šablóny pre Host wizard:

- Šablónu je potrebné exportovať, upraviť exportovaný súbor a následne importovať:
 - Pridajte element šablóny **wizard_ready** na označenie compatibility s funkcionalitou Host Wizard
 - Voliteľne je možné pridať element šablóny **readme** alebo **config** podľa potreby

Configure host (2/2)

To complete the setup, configure the following variables (host macros).

Seconds since the last Zabbix agent seen

 ▾

Macro: {AGENT.TIMEOUT}

Timeout after which agent is considered unavailable.

☒ Interfaces control

Macro: {IFCONTROL}

Control for operational state "link down" of interfaces.

^ Thresholds

Time since the last agent data was received

 ▾

Macro: {AGENT.NODATA_TIMEOUT}

Threshold value of time since the last data was received from the agent.

Threshold of CPU utilization expressed

 ▾

Macro: {CPU.UTIL.CRIT}

Critical threshold of CPU utilization expressed in %. In the range from 0 to 100



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Recertifikácie na verziu 7.0

Pre certifikovaných špecialistov (**ZCS**), profesionálov (**ZCP**) alebo expertov (**ZCE**) na verziu 6.0 ponuka Upgrade školení na verziu 7.0

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webinárov!

ZCS Upgrade



ZCP Upgrade



ZCE Upgrade



Ste majiteľmi certifikátov na verziu 5.0 alebo starších?
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Konzultácia, upgrade, problém...?

Zabbix konzultácia zdarma

Kontaktujte nás, sme pripravení vám kedykoľvek pomôcť. Navyše, prvú konzultáciu poskytujeme zdarma. Cez platformu MS Teams nám môžete predstaviť váš problém a spoločne sa pokúsime nájsť riešenie. Vyplňte formulár a my vás budeme kontaktovať, aby sme si dohodli termín vašej konzultácie zdarma.

* Polia označené hviezdíčkou sú povinné.

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Otázky

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