

NAGIOS

XI

> Installation, Configuration et Supervision
> Ubuntu / Debian · SNMP · NCPA · Auto-Discovery

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1. Introduction

Nagios XI est l'une des solutions de supervision d'infrastructures réseau parmi les plus utilisées au monde. Développée pour combiner flexibilité et adaptabilité, elle permet de gérer des problématiques de supervision complexes de manière simple et efficace.

Allant bien au-delà des fonctionnalités de base de supervision, Nagios XI est une solution complète d'alerte et de contrôle qui fournit une vue détaillée de l'infrastructure informatique, afin d'anticiper et de résoudre les problèmes avant qu'ils n'affectent les utilisateurs.

Nagios XI offre plusieurs protocoles et agents pour remonter l'état des équipements supervisés : **SNMP**, **NCPA** (Nagios Cross-Platform Agent), **NRPE** et **Auto-Discovery**.

2. Infrastructure requise

Pour ce laboratoire, les machines suivantes sont nécessaires :

- **Contrôleur de domaine Windows Server** : Avec le service DNS installé
- **PfSense** : Sert de routeur/pare-feu pour l'ensemble du réseau
- **Machine Debian (serveur Nagios)** : Adresse IP fixe : 172.20.0.34
- **Machine physique (poste de supervision)** : Pour accéder aux interfaces de gestion

3. Préparation de la machine Debian

3.1 Renommage de la machine

La machine Debian doit être renommée en **nagiosxi** avant l'installation. Ce renommage garantit une identification claire du serveur sur le réseau.

```
root@debian:~# hostnamectl set-hostname nagiosxi
```

Renommage de la machine en nagiosxi

3.2 Configuration de l'adresse IP et de la résolution DNS

Il est indispensable d'attribuer une adresse IP fixe au serveur Nagios et de configurer la résolution DNS afin que le serveur puisse communiquer avec les équipements à superviser.

```
root@nagiosxi:~# vim /etc/network/interfaces
```

Configuration de l'adresse IP fixe

```
# This file describes the network interfaces available on your system
# and how to activate them. For more information, see interfaces(5).

source /etc/network/interfaces.d/*

# The loopback network interface
auto lo
iface lo inet loopback

# The primary network interface
allow-hotplug ens33
iface ens33 inet static
address 172.20.0.34/24
gateway 172.20.0.250
```

Configuration de la résolution DNS

On effectue ensuite un test de résolution DNS pour s'assurer du bon fonctionnement :

```
root@nagiosxi:~# vim /etc/resolv.conf
```

Test de résolution DNS

3.3 Mise à jour de la distribution

Avant toute installation, il est recommandé de mettre à jour la distribution Debian :

```
apt update && apt upgrade -y
```

```
domain sitka.local
search sitka.local
nameserver 172.20.0.14
```

Mise à jour de la distribution Debian

4. Installation de Nagios XI

Il existe deux méthodes pour installer Nagios XI. Les deux réalisent une installation complète de l'application.

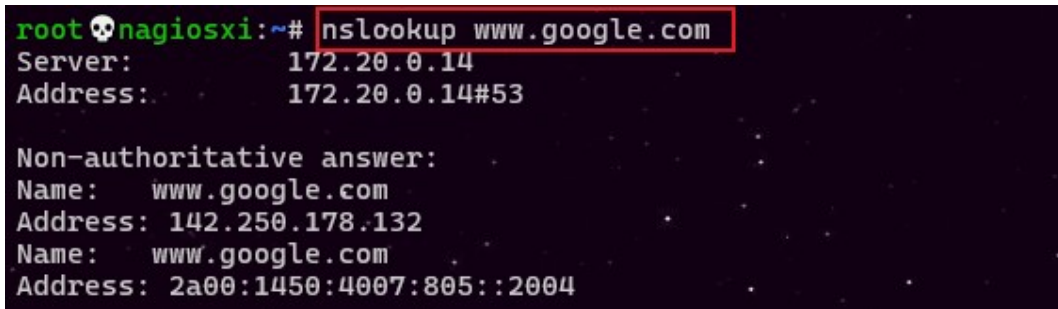
4.1 Méthode rapide (via curl)

Cette méthode télécharge et exécute directement le script d'installation officiel. Il faut d'abord installer **curl** s'il n'est pas présent sur le système :

```
apt install curl -y
```

Ensuite, on lance l'installation avec la commande :

```
curl https://assets.nagios.com/downloads/nagiosxi/install.sh | sh
```



```
root@nagiosxi:~# nslookup www.google.com
Server:      172.20.0.14
Address:     172.20.0.14#53

Non-authoritative answer:
Name:   www.google.com
Address: 142.250.178.132
Name:   www.google.com
Address: 2a00:1450:4007:805::2004
```

Installation rapide de Nagios XI via curl

4.2 Méthode manuelle (via wget)

La méthode manuelle offre plus de contrôle sur le processus d'installation :

Créer un répertoire temporaire :

```
mkdir ~/tmp
```

Se placer dans ce répertoire :

```
cd ~/tmp
```

Télécharger la dernière version de Nagios :

```
wget http://assets.nagios.com/downloads/nagiosxi/xi-latest.tar.gz
```

Décompresser l'archive :

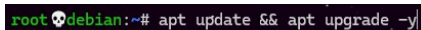
```
tar xvf xi-latest.tar.gz
```

Se placer dans le répertoire décompressé :

```
cd nagiosxi
```

Lancer l'installation :

```
./fullinstall
```



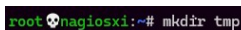
```
root@debian:~# apt update && apt upgrade -y
```

Création du répertoire tmp



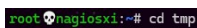
```
root@nagiosxi:~# apt install curl
```

Téléchargement de Nagios XI via wget



```
root@nagiosxi:~# mkdir tmp
```

Décompression et lancement de l'installation



```
root@nagiosxi:~# cd tmp
```

Progression de l'installation de Nagios XI

4.3 Finalisation sur le navigateur web

Une fois l'installation terminée, on finalise la configuration via le navigateur web à l'adresse suivante :

```
http://172.20.0.34/nagiosxi
```

■ ■ Note : Avant de finaliser l'installation, il est nécessaire de s'inscrire sur le site de Nagios pour obtenir une clé de licence permettant d'évaluer le produit pendant 60 jours.

Les étapes de finalisation sont les suivantes :

- Saisir le login et changer le mot de passe par défaut, puis cliquer sur **Finish install**.
- Se connecter à nouveau avec les identifiants **nagiosadmin / nagiosadmin**.
- Accepter les termes du contrat de licence.
- L'interface web de Nagios XI est alors accessible.

```
root@nagiosxi:~/tmp# tar xzfv xi-latest.tar.gz |
```

Page de finalisation de l'installation Nagios XI

```
root@nagiosxi:~/tmp# cd nagiosxi/
```

Interface web de Nagios XI après installation

5. Supervision des clients

Nagios XI propose plusieurs méthodes pour superviser les équipements du réseau. Les deux principales sont SNMP et NCPA.

5.1 Supervision d'une machine Windows

5.1.1 Via le protocole SNMP

Pour superviser un serveur Windows via SNMP, il faut d'abord installer le service SNMP :

Aller dans **Gérer** → **Ajouter des rôles et fonctionnalités**, choisir **Installation basée sur un rôle/fonctionnalité**, sélectionner le serveur local, puis cocher **Service SNMP** et **Fournisseur WMI SNMP**.

```
root@nagiosxi:~/tmp/nagiosxi# ./fullinstall |
```

Installation du service SNMP sur Windows Server

Une fois le service installé, on l'ouvre dans le gestionnaire de services et on configure ses propriétés :

- Onglet **Agent** : cocher toutes les cases dans la rubrique « Service ».
- Onglet **Sécurité** : ajouter la communauté **Snika** avec les droits appropriés, cocher « Accepter les paquets SNMP provenant de ces hôtes » et ajouter l'adresse IP du serveur Nagios.

```
Nagios XI Full Installer
=====
This script will do a complete install of Nagios XI by executing all necessary sub-scripts.
IMPORTANT: This script should only be used on a 'clean' install of CentOS, RHEL, Ubuntu LTS, Debian, or Oracle. Do NOT use this on a system that has been tasked with other purposes or has an existing
install of Nagios Core. To create such a clean install you should have selected only the base package in the OS installer.
Do you want to continue? [Y/n]
```

Configuration des propriétés SNMP – onglet Agent

```
CCM data imported OK.
RESULT=0
Running './F-startdaemons'...
Daemons started OK
RESULT=0
Running './Z-webroot'...
RESULT=0

Nagios XI Installation Complete!

You can access the Nagios XI web interface by visiting:
http://172.20.0.34/nagiosxi/
```

Configuration des propriétés SNMP – onglet Sécurité

Sur le serveur Nagios, on va dans **Configure** → **Configuration Wizard**, on sélectionne **Windows Server** et on saisit les paramètres de la machine à superviser.

Nagios XI Installation
Finalize your Nagios XI installation and step the initial configuration. These settings can be changed later.

General System Settings

Program URL:

Timezone:

Language:

User Interface Theme:

☐ Use HTTPS only (all HTTP requests will be redirected to HTTPS)

License Settings

License Type: ☒ Trial ☐ Licensed ☐ Free (Limited)

Trial includes unlimited nodes + enterprise features. Includes access to trial support.
[Click to get a trial key](#)

Trial Key:

Configuration Wizard – Supervision Windows via SNMP

Nagios XI Installation
Finalize your Nagios XI installation and step the initial configuration. These settings can be changed later.

Admin Account Settings

Username:

Password:

Full Name:

Email Address:

Admin Notification Settings

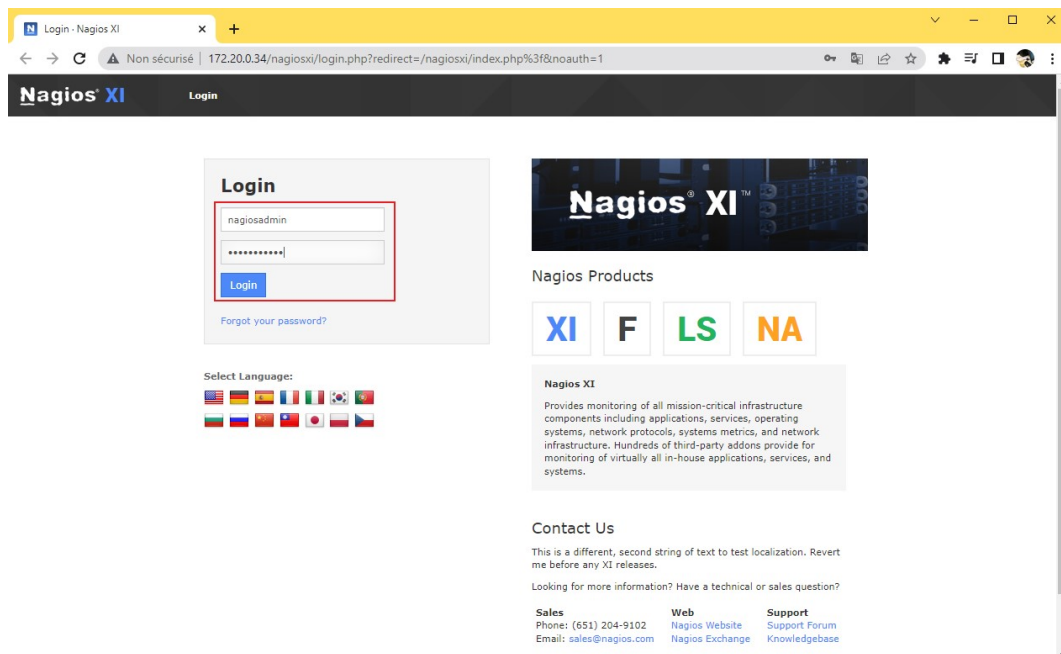
☒ Send this account email notifications [Advanced email notification settings](#)

Sélection des éléments à superviser

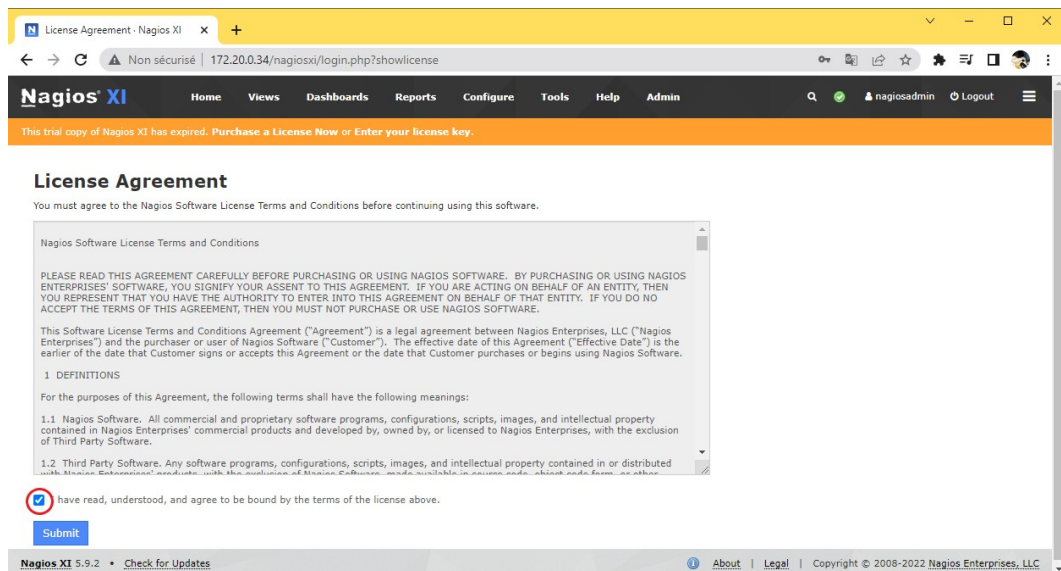
5.1.2 Via l'agent NCPA

L'agent NCPA (Nagios Cross-Platform Agent) offre une supervision plus riche que SNMP. Pour l'utiliser avec son interface web, un serveur IIS doit être installé au préalable.

Installation du serveur web IIS : **Gérer** → **Ajouter des rôles et fonctionnalités** → **Serveur Web (IIS)**. On peut vérifier l'installation en tapant **http://localhost** dans le navigateur du serveur.



Installation du rôle Serveur Web (IIS)



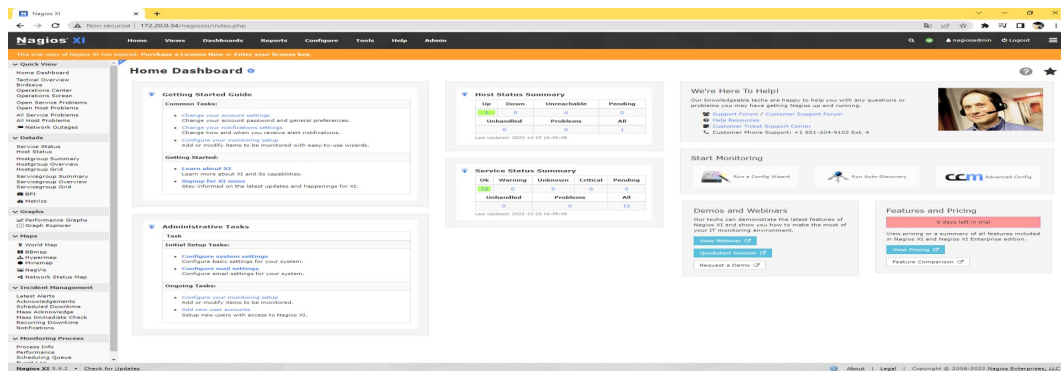
Vérification de l'installation du serveur IIS

On télécharge ensuite l'agent NCPA depuis :

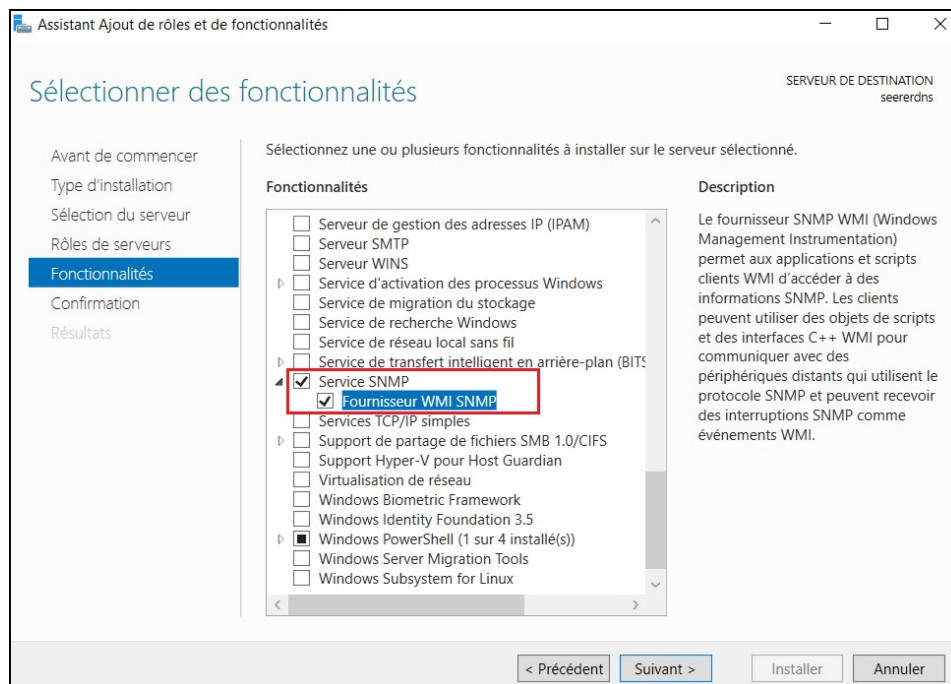
<https://www.nagios.org/ncpa/#downloads> (version Windows)

Lors de l'installation, dans le champ **Token**, on saisit le nom de la communauté **Sitka** et dans **Bind IP**, l'adresse IP du serveur client. L'interface NCPA est ensuite accessible à :

<https://172.20.0.50:5693>



Installation de l'agent NCPA sur Windows



Interface web de l'agent NCPA

5.2 Supervision d'une machine Linux

5.2.1 Via le protocole SNMP

Installation de l'agent SNMP sur Ubuntu :

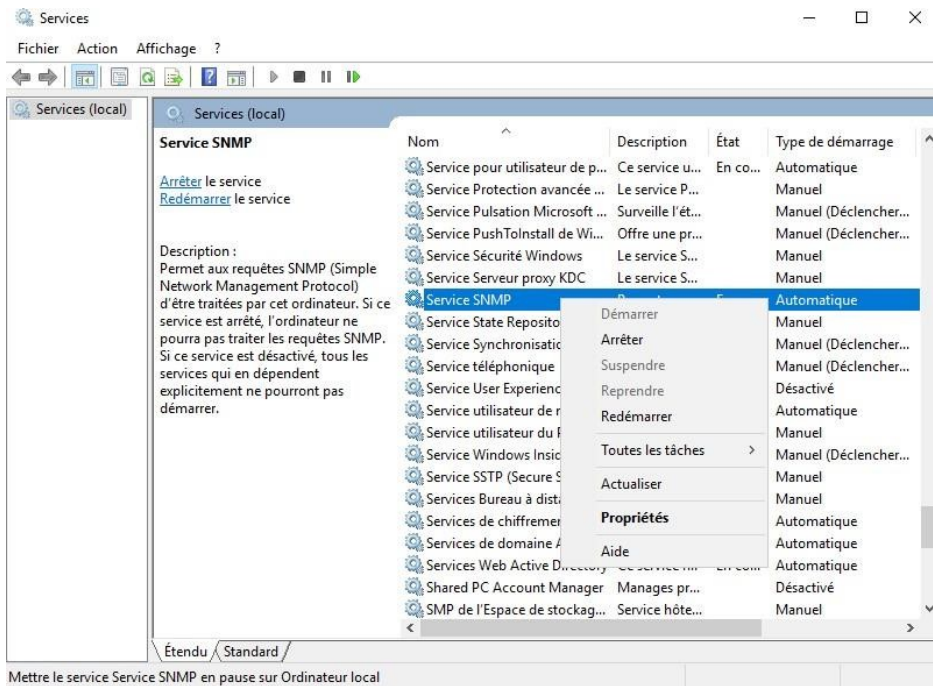
```
apt install snmpd snmp -y
```

On modifie le fichier de configuration **/etc/snmp/snmpd.conf** en effaçant le contenu existant et en ajoutant les lignes de configuration appropriées. On redémarre ensuite le service :

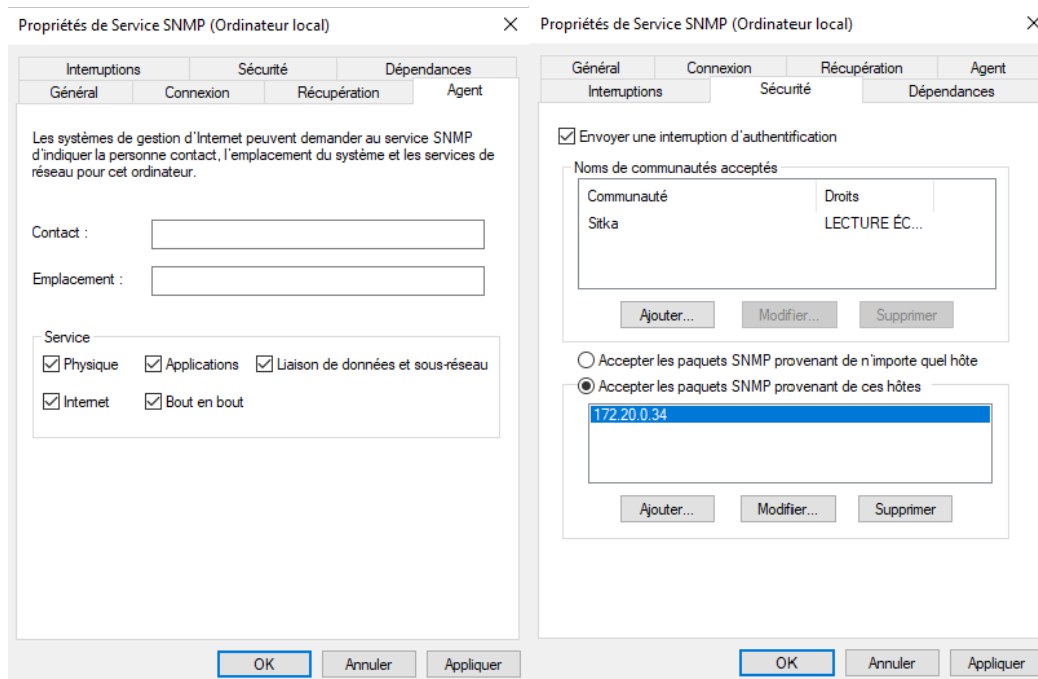
```
systemctl restart snmpd systemctl status snmpd
```

On peut tester le bon fonctionnement du service SNMP avec la commande suivante (qui affichera de nombreux OID si tout fonctionne) :

```
snmpwalk -v2c -c sitka localhost
```



Configuration du service SNMPD sur Ubuntu



Vérification du service SNMP sur Ubuntu

5.2.2 Via l'agent NCPA

Pour l'installation de l'agent NCPA sur Ubuntu, on peut utiliser le dépôt officiel Nagios ou télécharger directement le paquet :

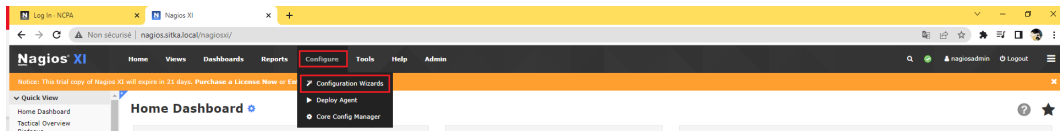
Ajout du dépôt Nagios dans `/etc/apt/sources.list.d/nagios.list` :

```
echo "deb https://repo.nagios.com/deb/jammy/" >> /etc/apt/sources.list.d/nagios.list
```

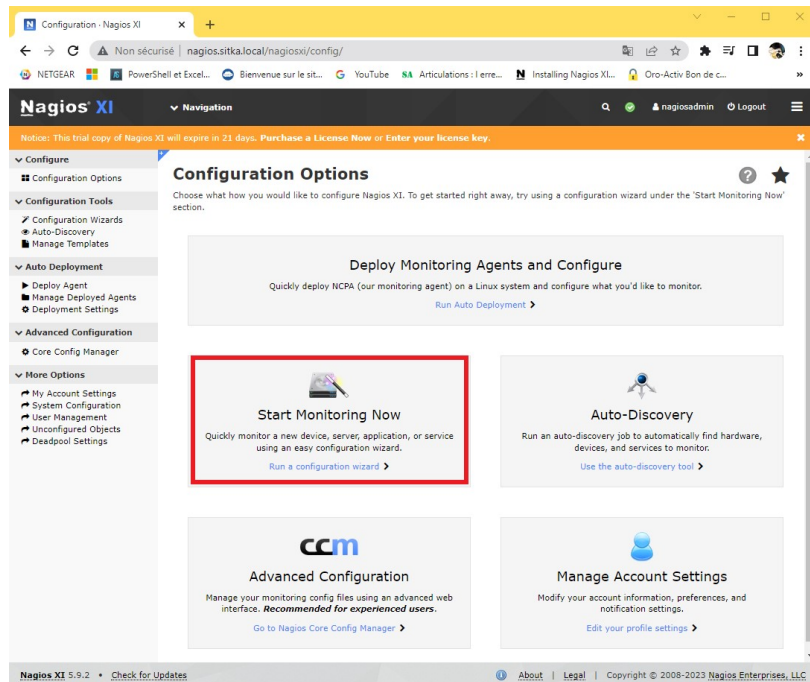
Ajout de la clé GPG Nagios puis installation :

```
apt update && apt install ncpa -y
```

On configure ensuite le fichier `/etc/ncpa.cfg` en modifiant la ligne `community_string = sitka` dans la section `[api]`, puis on redémarre le service.



Installation de l'agent NCPA sur Ubuntu



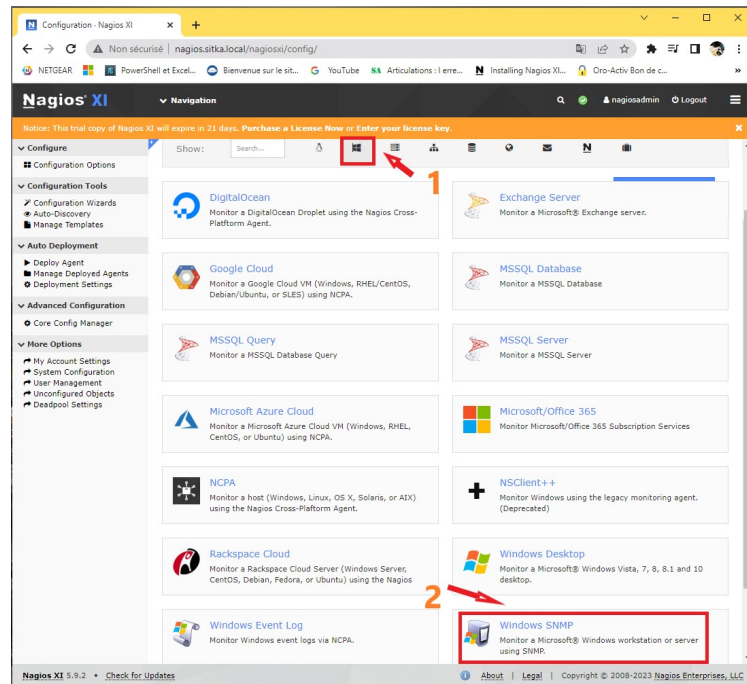
Configuration du community string dans ncpa.cfg

Méthode alternative – installation via le paquet .deb :

```
wget ncpa-2.4.0.u22.amd64.deb dpkg -i ncpa-2.4.0.u22.amd64.deb systemctl restart ncpa_listener
```

5.3 Supervision d'un site Internet

Nagios XI permet également de superviser la disponibilité et les performances d'un site web. Dans le menu **Configure** → **Configuration Wizards**, on recherche **website**, on sélectionne **Website URL** et on saisit l'URL du site à superviser ainsi que les paramètres souhaités.



Configuration de la supervision d'un site Internet

5.4 Supervision via Auto-Discovery

La fonctionnalité **Auto-Discovery** permet au serveur Nagios d'envoyer une requête broadcast sur un réseau pour découvrir automatiquement les machines qui y sont connectées. C'est une méthode particulièrement efficace pour inventorier rapidement un parc informatique.

Pour lancer une découverte automatique :

- Aller dans **Configure** → **Configuration Wizards** → onglet **Configuration Tools** → **Auto-Discovery**.
- Cliquer sur **+ New Auto-Discovery Job**.
- Spécifier le réseau à scanner (exemple : 172.20.0.0/24) et cliquer sur **Submit**.
- Une fois le job terminé (Status : Finished), cliquer sur l'icône **View job results**.
- Sélectionner les machines à superviser et cliquer sur **Deploy Agents to Selected Hosts**.
- Préciser pour chaque machine : adresse IP, système d'exploitation, paramètres d'identification et agent souhaité (NCPA par défaut).
- Cliquer sur **Deploy** pour installer les agents automatiquement.

Configuration - Nagios XI

Non sécurisé | nagios.sitka.local/nagiosxi/config/

NETGEAR PowerShell et Excel... Bienvenue sur le sit... YouTube SA Articulations : l'erre... Installing Nagios XI... Oro-Activ Bon de c...

Nagios XI Navigation

Notice: This trial copy of Nagios XI will expire in 21 days. Purchase a License Now or Enter your license key.

Configuration Wizard: Windows SNMP - Step 1

Windows Machine Information

IP Address: 172.20.0.13
The IP address of the Windows machine you'd like to monitor.

Operating System: Windows Server 2019

SNMP Settings

Specify the settings used to monitor the Windows machine via SNMP.

SNMP Version: 2c
The SNMP protocol version used to communicate with the machine.
You many need to use SNMP v1 if your Windows system language is not English.

SNMP Port: 161
The SNMP port to use, the default is port 161.

SNMP Version Settings

SNMP Community: sitka
The SNMP community string required used to query the Windows machine.

Back Next

Lancement d'un job Auto-Discovery

Configuration - Nagios XI

Non sécurisé | nagios.sitka.local/nagiosxi/config/

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Nagios XI Navigation

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Configuration Wizard: Windows SNMP - Step 2

Windows Machine Details

IP Address: 172.20.0.13

Host Name: 172.20.0.13
The name you'd like to have associated with this Windows machine.

Server Metrics

Specify which services you'd like to monitor for the Windows machine.

☒ Ping
Monitors the machine with an ICMP "ping". Useful for watching network latency and general uptime.

☒ CPU
Monitors the CPU (processor usage) on the machine.
80 % 90 %

☒ Physical Memory Usage
Monitors the physical (real) memory usage on the machine.
80 % 90 %

☒ Virtual Memory Usage
Monitors the virtual memory usage on the machine.
5 % 10 %

☒ Disk Usage
Monitors disk usage on the machine.

The wizard will populate detected drives automatically. To add more drives select a new drive from the dropdown list.

Résultats de l'Auto-Discovery

Configuration - Nagios XI

Non sécurisé | nagios.sitka.local/nagiosxi/config/

NETGEAR PowerShell et Excel... Bienvenue sur le sit... YouTube SA Articulations : l'erre... Installing Nagios XI... Oro-Activ Bon de c...

Nagios XI Navigation

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Configure

- Configuration Options
- Configuration Tools**
 - Configuration Wizards
 - Auto-Discovery
 - Manage Templates
- Auto Deployment
 - Deploy Agent
 - Manage Deployed Agents
 - Deployment Settings
- Advanced Configuration
 - Core Config Manager
- More Options
 - My Account Settings
 - System Configuration
 - User Management
 - Unconfigured Objects
 - Deadpool Settings

Configuration Wizard: Windows SNMP - Step 3

Monitoring Settings

Define basic parameters that determine how the host and service(s) should be monitored.

Under normal circumstances:

Monitor the host and service(s) every minutes.

When a potential problem is first detected:

Re-check the host and service(s) every minutes up to times before sending a notification.

[< Back](#) [Next >](#) [Finish](#)

Nagios XI 5.9.2 [Check for Updates](#) [About](#) | [Legal](#) | Copyright © 2008-2023 Nagios Enterprises, LLC

Déploiement automatique des agents NCPA

Configuration - Nagios XI

Service Status - Nagios XI

Non sécurisé | nagios.sitka.local/nagiosxi/includes/components/xicore/status.php?host=172.20.0.13

NETGEAR PowerShell et Excel... Bienvenue sur le sit... YouTube SA Articulations : l'erre... Installing Nagios XI... Oro-Activ Bon de c...

Service Status

Host: 172.20.0.13

Host Status Summary

Up	Down	Unreachable	Pending
1	0	0	0
Unhandled	Problems	All	
0	0	1	

Last Updated: 2023-01-01 16:56:13

Service Status Summary

Ok	Warning	Unknown	Critical	Pending
0	0	0	0	11
Unhandled	Problems	All		
0	0	11		

Last Updated: 2023-01-01 16:56:13

Showing 1-11 of 11 total records

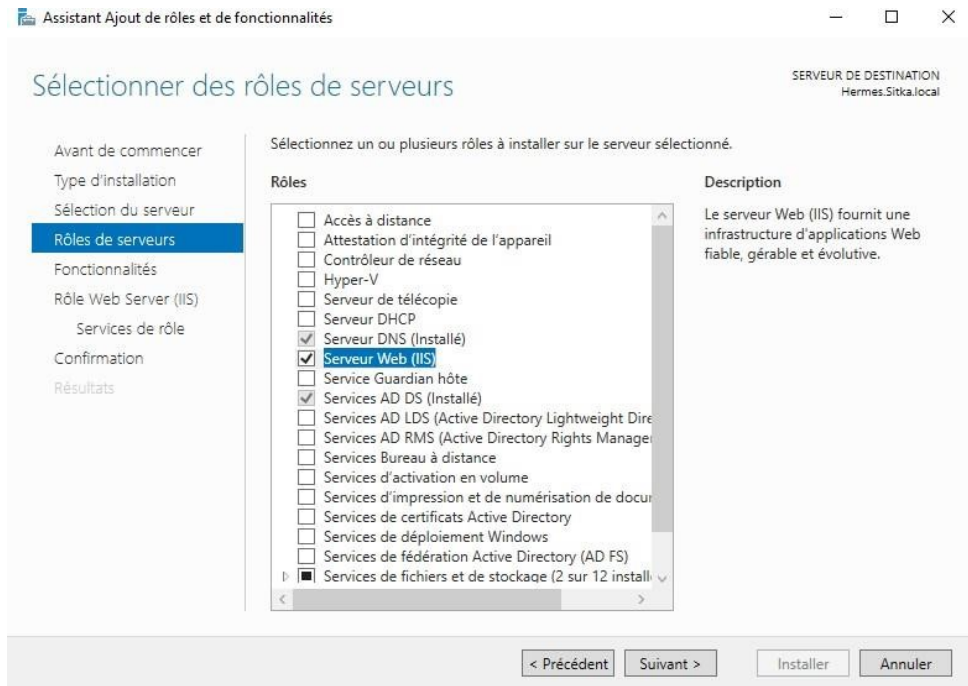
Page 1 of 1 15 Per Page Go Search...

Host	Service	Status	Duration	Attempt	Last Check	Status Information
172.20.0.13	CPU Usage	OK	N/A	1/5	2023-01-01 16:56:14	2 CPU, average load 0.0% < 80% : OK
	Drive C: Disk Usage	OK	N/A	1/5	2023-01-01 16:56:40	C:\ Label: Serial Number 6ef22d3c: 18%used(10931MB/61110MB) (<80%) : OK
	Physical Memory Usage	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:57:06
	Ping	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:57:32
	Serveur DHCP	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:57:58
	Serveur DNS	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:58:24
	Service SNMP	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:58:50
	Virtual Memory Usage	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:59:16
	dns.exe	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 16:59:42
	dwm.exe	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 17:00:08
	snmp.exe	Pending	N/A	1/5	N/A	Service check is pending... Check is scheduled for 2023-01-01 17:00:34

Page 1 of 1 15 Per Page Go

Last Updated: 2023-01-01 16:56:44

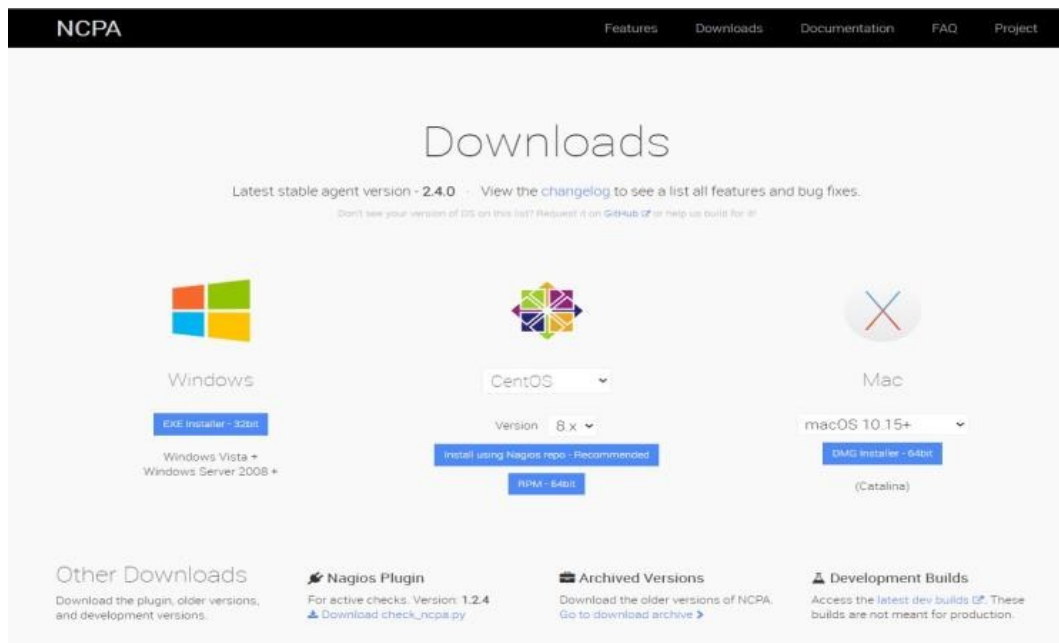
Configuration de la supervision après Auto-Discovery



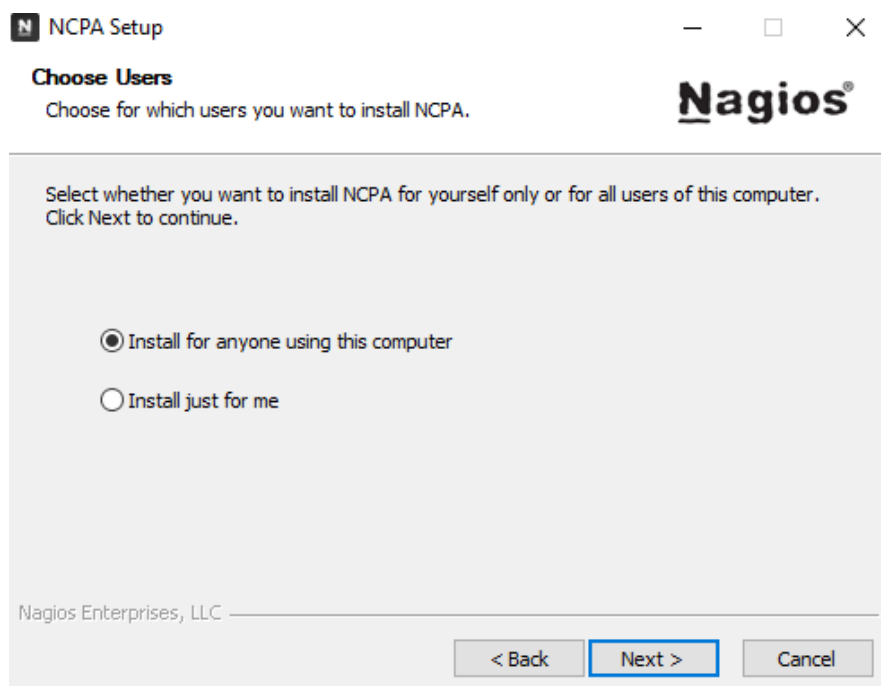
Capture d'écran Nagios XI – 32



Capture d'écran Nagios XI – 33



Capture d'écran Nagios XI – 34



Capture d'écran Nagios XI – 35

Listener Configuration

Nagios Cross-Platform Agent (NCPA)
Windows Version - 2.4.0

Nagios®

Set configuration for API access, active checks via check_ncpa.py, and connection settings for the web GUI. These options are related to the NCPA listener service.

API Configuration

Token

The token used for API access, active checks, and logging into the web GUI.

Listener Configuration

Bind IP

Bind Port

Advanced Listener Configuration

SSL Version

Log Level

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< Back **Next >** Cancel

Capture d'écran Nagios XI – 36

Log In · NCPA

https://172.20.0.50:5693/login

NCPA

Web GUI Log In

Log In

Capture d'écran Nagios XI – 37

```
root@ubuntu:~# apt install snmpd snmp -y
```

Capture d'écran Nagios XI – 38

```
root@ubuntu:~# echo "" > /etc/snmp/snmpd.conf
```

Capture d'écran Nagios XI – 39

```
root@ubuntu:~# vim /etc/snmp/snmpd.conf
```

Capture d'écran Nagios XI – 40

```
sysLocation    sitka
sysContact     root <root@sitka.local>

#Snmp écoute toutes les adresses IPv4 du serveur
agentaddress udp:161,udp6:[::1]:161

#nom de la communauté est sitka,avec l'argument {default} la communauté créée sera accessible par tout le monde,
#pour limiter l'accès à un réseau ou une adresse IP, il faut remplacer default par une notation CIRD
rocommunity    sitka default
```

Capture d'écran Nagios XI – 41

```
root@ubuntu:~# service snmpd restart
```

Capture d'écran Nagios XI – 42

```
root@ubuntu:~# service snmpd status
● snmpd.service - Simple Network Management Protocol (SNMP) Daemon.
   Loaded: loaded (/lib/systemd/system/snmpd.service; enabled; vendor preset: enabled)
   Active: active (running) since Mon 2023-01-02 09:26:30 UTC; 4min 5s ago
   Main PID: 16852 (snmpd)
     Tasks: 1 (limit: 4534)
    Memory: 3.6M
       CPU: 72ms
   CGroup: /system.slice/snmpd.service
           └─16852 /usr/sbin/snmpd -Low -u Debian-snmp -g Debian-snmp -I -smux mteTrigger mteTriggerConf -f

janv. 02 09:26:30 ubuntu systemd[1]: Starting Simple Network Management Protocol (SNMP) Daemon....
janv. 02 09:26:30 ubuntu systemd[1]: Started Simple Network Management Protocol (SNMP) Daemon..
```

Capture d'écran Nagios XI – 43

```
root@ubuntu:~# snmpwalk -v1 -c Sitka 172.20.0.51
```

Capture d'écran Nagios XI – 44

```
iso.3.6.1.2.1.1.1.0 = STRING: "Linux ubuntu 5.15.0-56-generic #62-Ubuntu SMP Tue Nov 22 19:54:14 UTC 2022 x86_64"
iso.3.6.1.2.1.1.2.0 = OID: iso.3.6.1.4.1.8072.3.2.10
iso.3.6.1.2.1.1.3.0 = Timeticks: (29623) 0:04:56.23
iso.3.6.1.2.1.1.4.0 = STRING: "root<root@sitka.local>"
iso.3.6.1.2.1.1.5.0 = STRING: "ubuntu",
iso.3.6.1.2.1.1.6.0 = STRING: "sitka"
iso.3.6.1.2.1.1.8.0 = Timeticks: (0) 0:00:00.00
iso.3.6.1.2.1.1.9.1.2.1 = OID: iso.3.6.1.6.3.10.3.1.1
iso.3.6.1.2.1.1.9.1.2.2 = OID: iso.3.6.1.6.3.11.3.1.1
iso.3.6.1.2.1.1.9.1.2.3 = OID: iso.3.6.1.6.3.15.2.1.1
iso.3.6.1.2.1.1.9.1.2.4 = OID: iso.3.6.1.6.3.1
iso.3.6.1.2.1.1.9.1.2.5 = OID: iso.3.6.1.6.3.16.2.2.1
iso.3.6.1.2.1.1.9.1.2.6 = OID: iso.3.6.1.2.1.49
iso.3.6.1.2.1.1.9.1.2.7 = OID: iso.3.6.1.2.1.50
iso.3.6.1.2.1.1.9.1.2.8 = OID: iso.3.6.1.2.1.4
iso.3.6.1.2.1.1.9.1.2.9 = OID: iso.3.6.1.6.3.13.3.1.3
iso.3.6.1.2.1.1.9.1.2.10 = OID: iso.3.6.1.2.1.92
iso.3.6.1.2.1.1.9.1.3.1 = STRING: "The SNMP Management Architecture MIB."
iso.3.6.1.2.1.1.9.1.3.2 = STRING: "The MIB for Message Processing and Dispatching."
iso.3.6.1.2.1.1.9.1.3.3 = STRING: "The management information definitions for the SNMP User-based Security Model."
iso.3.6.1.2.1.1.9.1.3.4 = STRING: "The MIB module for SNMPv2 entities"
iso.3.6.1.2.1.1.9.1.3.5 = STRING: "View-based Access Control Model for SNMP."
iso.3.6.1.2.1.1.9.1.3.6 = STRING: "The MIB module for managing TCP implementations"
iso.3.6.1.2.1.1.9.1.3.7 = STRING: "The MIB module for managing UDP implementations"
iso.3.6.1.2.1.1.9.1.3.8 = STRING: "The MIB module for managing IP and ICMP implementations"
iso.3.6.1.2.1.1.9.1.3.9 = STRING: "The MIB modules for managing SNMP Notification, plus filtering."
iso.3.6.1.2.1.1.9.1.3.10 = STRING: "The MIB module for logging SNMP Notifications."
iso.3.6.1.2.1.1.9.1.4.1 = Timeticks: (0) 0:00:00.00
```

Capture d'écran Nagios XI – 45

heimdall@sitka.local - Services: 50 x Configuration - Nagios XI x +

Non sécurisé | nagios.sitka.local/nagiosxi/config/

Nagios XI Home Views Dashboards Reports Configure Tools Help Admin

Notice: This trial copy of Nagios XI will expire in 20 days. Purchase a License Now or Enter your license key.

Configuration Wizard: Linux SNMP - Step 1

Linux Machine Information

IP Address: 172.20.0.51
The IP address of the Linux machine you'd like to monitor.

SNMP Settings

Specify the settings used to monitor the Linux machine via SNMP.

SNMP Version: 2c
The SNMP protocol version used to communicate with the machine.

SNMP Port: 161
The SNMP port to use, the default is port 161.

SNMP Version Settings

SNMP Community: sitka
The SNMP community string required used to query the Linux machine.

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Capture d'écran Nagios XI – 46

```
root@ubuntu:~# apt install apache2 -y
```

Capture d'écran Nagios XI – 47

NCPA
Features
Downloads
Documentation
FAQ
Project

Downloads

Latest stable agent version - **2.4.0** - View the [changelog](#) to see a list all features and bug fixes.

Don't see your version of OS on this list? Request it on [GitHub](#) or help us build for it!



Windows

EXE Installer - 32bit

Windows Vista +
Windows Server 2008 +



Ubuntu

Install using Nagios repo - Recommended

Ubuntu 19+	DEB - 32bit	DEB - 64bit
Ubuntu 14-18	DEB - 32bit	DEB - 64bit



Mac

macOS 10.15+

DMG Installer - 64bit

(Catalina)

Other Downloads

Download the plugin, older versions, and development versions.

Nagios Plugin

For active checks. Version: **1.2.4**

[Download check_ncpa.py](#)

Archived Versions

Download the older versions of NCPA.

[Go to download archive](#)

Development Builds

Access the latest dev builds. These builds are not meant for production.

Capture d'écran Nagios XI – 48

Install From Nagios DEB Repository

Since NCPA 2.1.3, the DEB Ubuntu binaries can also be found in the Nagios repository. We recommend installing the DEB using this method if you'd like to be able to upgrade using apt-get in the future.

Installing the Nagios Repository

Add the following into `/etc/apt/sources.list.d/nagios.list`:

Ubuntu

22.04 LTS

20.04 LTS

18.04 LTS

16.04 LTS

```
deb https://repo.nagios.com/deb/jammy /
```

For other versions of Ubuntu [find the repo here](#).

Add the Nagios public GPG key:

```
wget -qO - https://repo.nagios.com/GPG-KEY-NAGIOS-V2 | apt-key add -
```

Update your repos:

```
apt-get update
```

Installing NCPA

Once the repo has been added to apt, just install NCPA with the apt-get command.

```
apt-get install ncpa
```

Close

Capture d'écran Nagios XI – 49

```
root@ubuntu:~# echo "deb https://repo.nagios.com/deb/jammy /" >> /etc/apt/sources.list.d/nagios.list
```

Capture d'écran Nagios XI – 50

```
root@ubuntu:~# wget -qO - https://repo.nagios.com/GPG-KEY-NAGIOS-V2. | apt-key add -
```

Capture d'écran Nagios XI – 51

```
root@ubuntu:~# apt update
```

Capture d'écran Nagios XI – 52

```
root@ubuntu:~# apt-get install ncpa
```

Capture d'écran Nagios XI – 53

```
root@ubuntu:~# vim /usr/local/ncpa/etc/ncpa.cfg
```

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```
[api]
#
# The token that will be used to log into the basic web GUI (API browser, graphs, top charts, etc)
# and to authenticate requests to the API and requests through check_ncpa.py
#
community_string = sitka
```

Capture d'écran Nagios XI – 55

```
root@ubuntu:~# /etc/init.d/ncpa_listener restart
Stopped NCPA Listener
Started NCPA Listener

root@ubuntu:~# /etc/init.d/ncpa_listener status
NCPA Listener: Service is running. (pid 18043)
```

Capture d'écran Nagios XI – 56



Linux Server

Monitor a remote Linux server, with NCPA.

Capture d'écran Nagios XI – 57



Configuration Wizard: Linux Server - Step 1



Setup NCPA

The agent should be installed before you continue running this wizard.

- [Download the latest version of NCPA](#) for the system you would like to monitor
- Follow the [installation instructions \(PDF version\)](#) and configure the token for the agent

Connect to NCPA

Address:

The IP address or FQDNS name used to connect to NCPA.

Port:

Port used to connect to NCPA. Defaults to port 5693.

☒ Do not verify SSL certificate

Token:

Authentication token used to connect to NCPA.

System:

Used to set the icon for the host.

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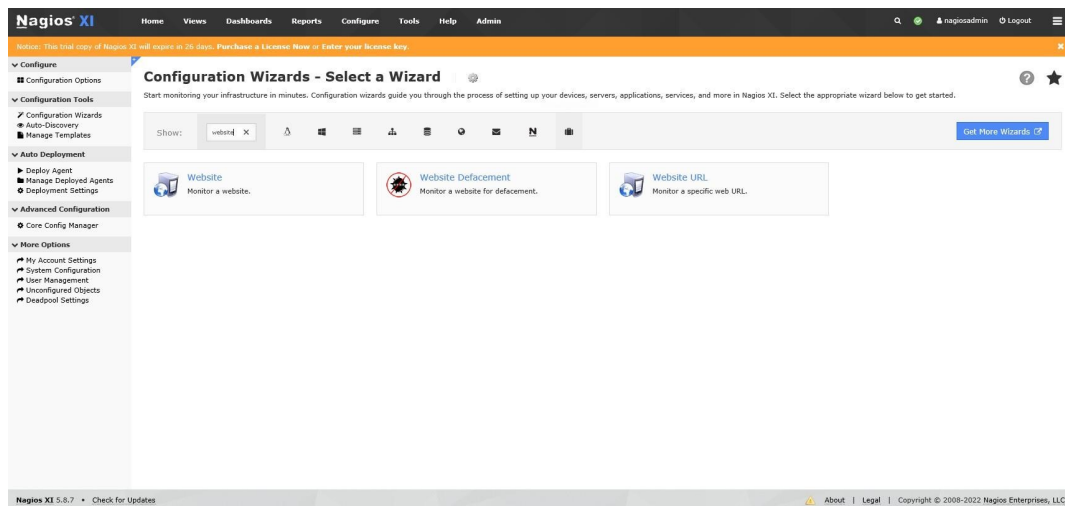
Capture d'écran Nagios XI – 58

```
root@ubuntu:~# wget https://assets.nagios.com/downloads/ncpa/ncpa-2.4.0.u22.amd64.deb
```

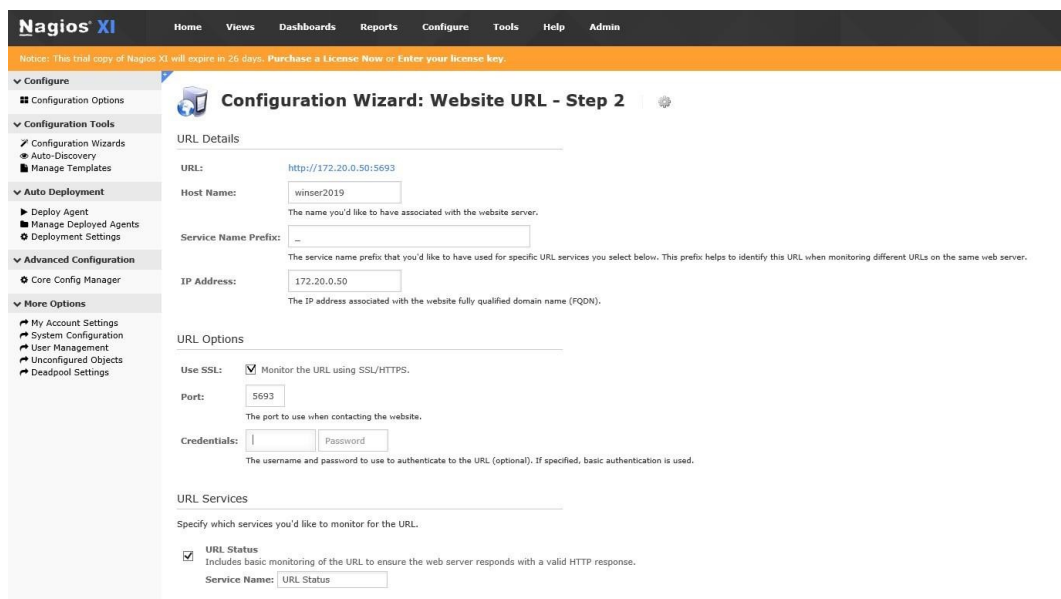
Capture d'écran Nagios XI – 59

```
root@ubuntu:~# dpkg -i ncpa-2.4.0.u22.amd64.deb
```

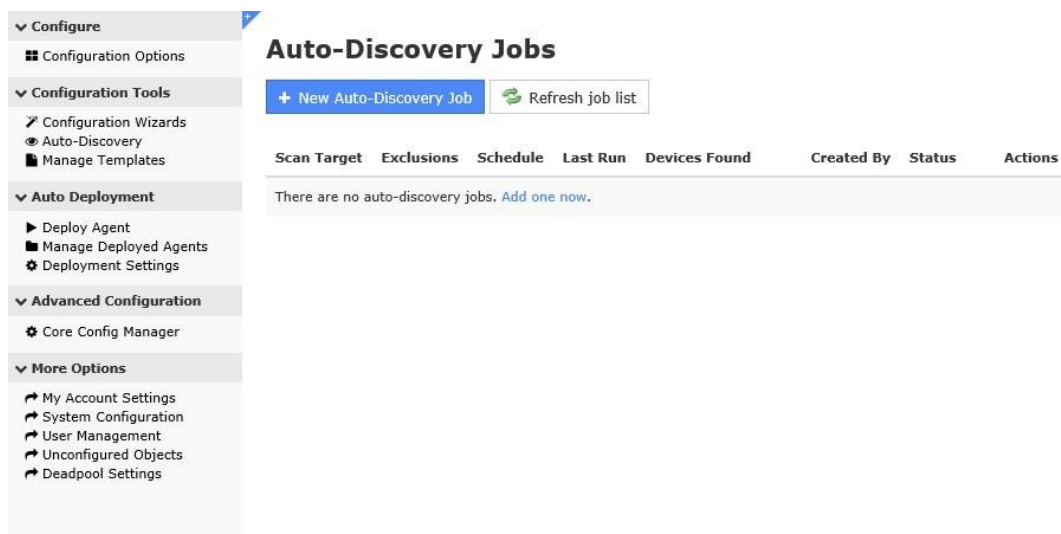
Capture d'écran Nagios XI – 60



Capture d'écran Nagios XI – 61



Capture d'écran Nagios XI – 62



Capture d'écran Nagios XI – 63

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New Auto-Discovery Job

Use this form to configure an auto-discovery job.

Scan Target: 172.20.0.0/24

Enter an network address and netmask to define the IP ranges to scan.

Exclude IPs:

An optional comma-separated list of IP addresses and/or network addresses to exclude from the scan.
Note: The excluded addresses may be pinged, but they will not be scanned for open/available services via nmap.

Schedule: Frequency: One Time

Specify the schedule you would like this job to be run.

OS Detection: On

Attempt to detect the operating system of each host.
Note: OS detection may cause the scan to take longer to complete and may not be 100% accurate.

Scan Delay: ms

Adjust delay between probes to a given host.
If set, this option causes Nmap to wait at least the given amount of time between each probe it sends to a given host.
This is particularly useful in the case of rate limiting, milliseconds.

System DNS: Off

Use system DNS.

Custom Ports:

Specify Custom ports. Ex: 22; 1-65535; U:53,111,137,T:21-25,80,139,8080,S:9

Submit Cancel

Capture d'écran Nagios XI – 64

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Auto-Discovery Jobs

Auto-discovery job added.

+ New Auto-Discovery Job Refresh job list

Scan Target	Exclusions	Schedule	Last Run	Devices Found	Created By	Status	Actions
172.20.0.0/24	-	Once	2022-02-19 12:50:37	2 New / 4 Total	nagiosadmin	Finished	   



Capture d'écran Nagios XI – 65

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Scan Results

Back To Auto-Discovery Jobs

Scan Summary

Scan Date: 2022-02-19 13:10:19

Scan Address: 172.20.0.0/24

Excludes: -

Initiated By: nagiosadmin

Total Hosts Found: 4

New Hosts Found: 2 [Show only new](#)

Processing Options

Export Data As: [CSV](#)

Configure Basic Monitoring: [New hosts only](#)

[Both old and new hosts](#)

Discovered Items

The hosts below were discovered during the auto-discovery scan. Hosts identified as Linux servers with SSH available and no agent already deployed have been pre-selected for Agent Deployment.

[Show discovered services](#)

☐	Address	Host Name	Type	Device/Operating System [Accuracy]	MAC Vendor	Agent Deployed	Status
☐	172.20.0.14	172.20.0.14	Windows Server	Microsoft Windows Server 2012 [92%]	VMware	No	Old
☐	172.20.0.34	172.20.0.34	Linux Server	Linux 2.6.32 [100%]		No	New
☒	172.20.0.52	172.20.0.52	Linux Server	Linux 2.6.32 [96%]	VMware	No	Old
☐	172.20.0.250	172.20.0.250	Unknown		VMware	No	New

Deploy Agents to Selected Hosts

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Deploy Agent

Deploy an agent to a system or a list of systems. Select monitoring type, credentials, and checks to run on the system. [View past auto deploy jobs.](#)

IP Addresses
(or Hostnames)

172.20.0.52

List one host per line. A single list of comma separated values is also valid.

Operating System

Linux

Credentials

Auth Type

Password

Username

root

If not using root user, the user should have access to become root using sudo.

Password

Deployment Settings

Agent Software

NCPA

Deploy

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Configuration Wizard: Auto-Discovery - Step 1

Auto-Discovery Job

Job:

Scan of 172.20.0.0/24 @ 2022-02-19 12:50:37 - Found 2 New / 4 Total Hosts

Select the auto-discovery job you wish to use for choosing new hosts and services to monitor. If you wish, you can also [launch a new discovery job.](#)

Show:

All Hosts

Choose whether you'd like to see results from all hosts that were found during the scan, or only new hosts that aren't currently being monitored.

Default Services:

Common

Select the types of services that you would like to be selected for monitoring by default. You can override individual services on the next page.

Host Addresses:

IP Addresses

Select the type of addresses that you would prefer to use for newly configured hosts.

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Configuration Wizard: Auto-Discovery - Step 2

Scan Results

The hosts and services below were discovered during the auto-discovery scan. Select the hosts and services you'd like to monitor.

☐	Address	Type	OS	Status	Host Name	Services			
						☐ Service Name	Service	Port	Protocol
☐	172.20.0.14	Windows Server	Microsoft Windows Server 2012	Old	172.20.0.14	☐	TCP Port 53 - domain	domain	53 TCP
						☐	TCP Port 88 - kerberos	kerberos	88 TCP
						☐	TCP Port 135 - epmap	epmap	135 TCP
						☒	NetBIOS	netbios-ssn	139 TCP
						☒	LDAP	ldap	389 TCP
						☐	TCP Port 445 - microsoft-ds	microsoft-ds	445 TCP
						☒	RDP	ms-wbt-server	3389 TCP
☐	172.20.0.34	Linux Server	Linux 2.6.32	New	172.20.0.34	☒	SSH	ssh	22 TCP
						☒	HTTP	http	80 TCP
						☒	LDAP	ldap	389 TCP
						☒	HTTPS	https	443 TCP
☒	172.20.0.52	Linux Server	Linux 2.6.32	Old	172.20.0.52	☒	SSH	ssh	22 TCP
☐	172.20.0.250	Unknown		New	172.20.0.250	☐	TCP Port 53 - domain	domain	53 TCP
						☒	HTTP	http	80 TCP

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Capture d'écran Nagios XI – 69

```
root@nagiosxi:~/tmp/nagiosxi# ./fullinstall |
```

Capture d'écran Nagios XI – 70

```
=====
Nagios XI Full Installer
=====
```

```
This script will do a complete install of Nagios XI by executing all necessary sub-scripts.
```

```
IMPORTANT: This script should only be used on a 'clean' install of CentOS, RHEL, Ubuntu LTS, Debian, or Oracle. Do NOT use this on a system that has been tasked with other purposes or has an existing install of Nagios Core. To create such a clean install you should have selected only the base package in the OS installer.
```

```
Do you want to continue? [Y/n]
```

Y

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