

```
PS C:\Users\mkrief> terraform --version
Terraform v0.12.28

Your version of Terraform is out of date! The latest version
is 0.12.29. You can update by downloading from https://www.terraform.io/downloads.html
```

Here, we can see that we have installed version 0.12.28 and that the latest version is 0.12.29 (at the time of writing this recipe).

Finally, HashiCorp announced that the Terraform binary will soon be available in the Linux package manager. For more information, take a look at the following article: <https://www.hashicorp.com/blog/announcing-the-hashicorp-linux-repository>

See also

For more information on verifying the downloaded package, you can consult the HashiCorp documentation at <https://www.hashicorp.com/security.html>.

Installing Terraform using a script on Windows

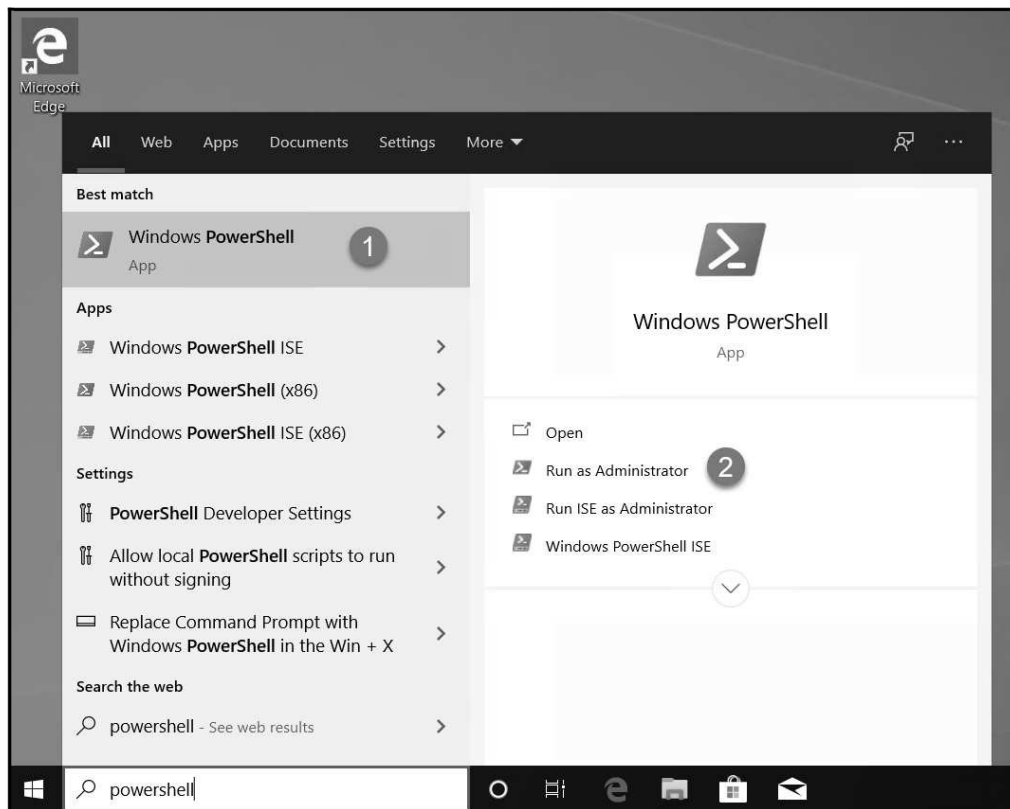
In this recipe, we will learn how to install Terraform on a Windows machine using a script that uses the **Chocolatey** software package manager.

Getting ready

To complete this recipe, you'll need to be using a Windows operating system and have Chocolatey (<https://chocolatey.org/>) installed, which is a Windows software package manager.

If you don't have Chocolatey installed, you can easily install it by following these steps:

1. Open a PowerShell terminal in administrator mode, as shown in the following screenshot:



2. Then, execute this following script in the terminal:

```
Set-ExecutionPolicy Bypass -Scope Process -Force;  
[System.Net.ServicePointManager]::SecurityProtocol =  
[System.Net.ServicePointManager]::SecurityProtocol -bor 3072; iex  
( (New-Object  
System.Net.WebClient).DownloadString('https://chocolatey.org/install.ps1'))
```



The complete installation documentation for Chocolatey is available at <https://chocolatey.org/install>.

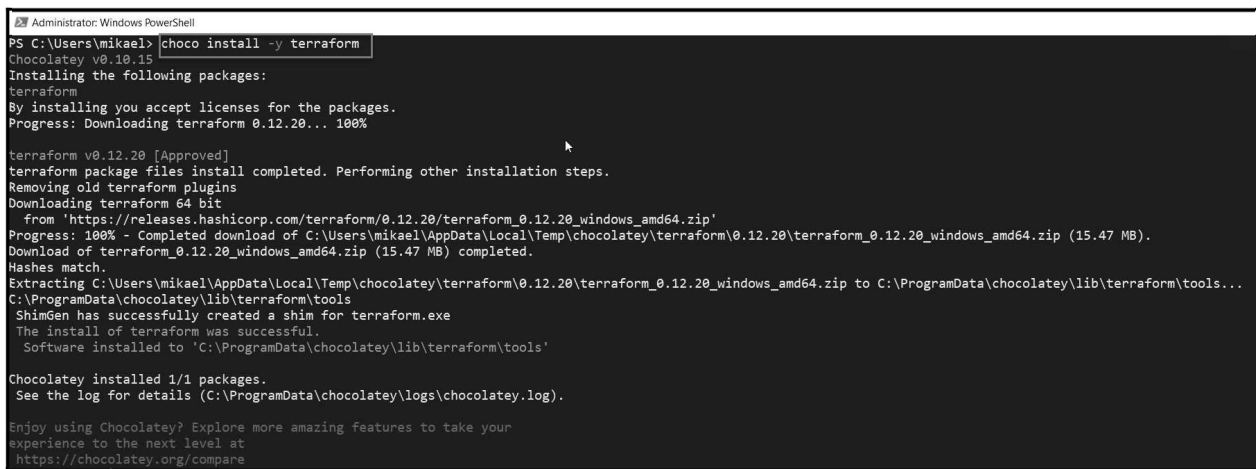
How to do it...

Perform the following steps:

1. Open a PowerShell command-line terminal in administrator mode.
2. Execute the following command:

```
choco install -y terraform
```

The following screenshot shows the execution of this command:



```
Administrator: Windows PowerShell
PS C:\Users\mikaël> choco install -y terraform
Chocolatey v0.10.15
Installing the following packages:
terraform
By installing you accept licenses for the packages.
Progress: Downloading terraform 0.12.20... 100%

terraform v0.12.20 [Approved]
terraform package files install completed. Performing other installation steps.
Removing old terraform plugins
Downloading terraform 64 bit
  from 'https://releases.hashicorp.com/terraform/0.12.20/terraform_0.12.20_windows_amd64.zip'
Progress: 100% - Completed download of C:\Users\mikaël\AppData\Local\Temp\chocolatey\terraform\0.12.20\terraform_0.12.20_windows_amd64.zip (15.47 MB).
Download of terraform_0.12.20_windows_amd64.zip (15.47 MB) completed.
Hashes match.
Extracting C:\Users\mikaël\AppData\Local\Temp\chocolatey\terraform\0.12.20\terraform_0.12.20_windows_amd64.zip to C:\ProgramData\chocolatey\lib\terraform\tools...
C:\ProgramData\chocolatey\lib\terraform\tools
ShimGen has successfully created a shim for terraform.exe
The install of terraform was successful.
  Software installed to 'C:\ProgramData\chocolatey\lib\terraform\tools'

Chocolatey installed 1/1 packages.
See the log for details (C:\ProgramData\chocolatey\logs\chocolatey.log).

Enjoy using Chocolatey? Explore more amazing features to take your
experience to the next level at
https://chocolatey.org/compare
```

The `-y` option is optional. It allows us to accept the license agreement automatically.

How it works...

When Chocolatey installs the Terraform package, it executes the scripts in the package source code, available at <https://github.com/jamestoyer/chocolatey-packages/tree/master/terraform>.

Then, by executing the script available at <https://github.com/jamestoyer/chocolatey-packages/blob/master/terraform/tools/chocolateyInstall.ps1>, Chocolatey downloads the Terraform ZIP file into the binary directory of Chocolatey's packages, which is already included in the `PATH` environment variable.

There's more...

When upgrading Terraform, it is possible to upgrade it directly with Chocolatey by executing the `choco upgrade -y terraform` command.

By default, the `choco install` command installs the latest version of the mentioned package. It is also possible to specify a specific version by adding the `--version` option to the command, which in our case would give us, for example, the following:

```
choco install -y terraform --version "0.12.28"
```

In this example, we have specified that we want to install version `0.12.28` of Terraform and not the latest version.



Be aware that the Terraform package from Chocolatey can have a time lag regarding the latest official version of Terraform, while in the Linux script, as shown in the *Installing Terraform on Linux* recipe, you can specify the latest version that has just been released.

See also

To learn about all the commands provided with Chocolatey, I suggest reading the following documentation: <https://chocolatey.org/docs/commands-reference#commands>

Executing Terraform in a Docker container

In the previous recipes of this chapter, we discussed how to install Terraform locally, either manually or via a script, depending on the local operating system.

In this recipe, we will learn how to run Terraform in a Docker container, which will allow us to enjoy the following benefits:

- There is no need to install Terraform locally.
- We can have a Terraform runtime environment independent of the local operating system.
- We can test our Terraform configuration with different versions of Terraform.

Let's get started!