Scrapy version documentation

Scrapy is a fast high-level web crawling and web scraping framework, used to crawl websites and extract structured data from their pages. It can be used for a wide range of purposes, from data mining to monitoring and automated testing.

Getting help

Having trouble? We'd like to help!

• Try the :doc: 'FAQ < faq>' -- it's got answers to some common questions.

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 22); backlink
Unknown interpreted text role "doc".
```

• Looking for specific information? Try the ref. 'genindex' or ref. 'modindex'.

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 23); backlink
Unknown interpreted text role "ref".
```

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 23); backlink
Unknown interpreted text role "ref".
```

- Ask or search questions in StackOverflow using the scrapy tag.
- Ask or search questions in the Scrapy subreddit.
- Search for questions on the archives of the scrapy-users mailing list.
- Ask a question in the #scrapy IRC channel,
- Report bugs with Scrapy in our issue tracker.
- Join the Discord community Scrapy Discord.

First steps

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-
master\docs\[scrapy-master][docs]index.rst, line 42)

Unknown directive type "toctree".

.. toctree::
    :caption: First steps
    :hidden:

    intro/overview
    intro/install
    intro/tutorial
    intro/examples
```

:doc:\intro/overview\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 52); backlink
Unknown interpreted text role "doc".
```

Understand what Scrapy is and how it can help you.

:doc:\intro/install

```
resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 55); backlink
Unknown interpreted text role "doc".
```

Get Scrapy installed on your computer.

:doc:\intro/tutorial\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 58); backlink
Unknown interpreted text role "doc".
```

Write your first Scrapy project.

:doc:\intro/examples\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 61); backlink
Unknown interpreted text role "doc".
```

Learn more by playing with a pre-made Scrapy project.

Basic concepts

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-
master\docs\[scrapy-master][docs]index.rst, line 68)
Unknown directive type "toctree".
   .. toctree::
      :caption: Basic concepts
      :hidden:
      topics/commands
      topics/spiders
      topics/selectors
      topics/items
      topics/loaders
      topics/shell
      topics/item-pipeline
      topics/feed-exports
      topics/request-response
      topics/link-extractors
      topics/settings
      topics/exceptions
```

:doc:'topics/commands'

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 86); backlink
Unknown interpreted text role "doc".
```

Learn about the command-line tool used to manage your Scrapy project.

:doc:\topics/spiders\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 89); backlink Unknown interpreted text role "doc".
```

Write the rules to crawl your websites.

:doc:\topics/selectors\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 92); backlink
```

Unknown interpreted text role "doc".

Extract the data from web pages using XPath.

:doc:`topics/shell`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 95); backlink

Unknown interpreted text role "doc".

Test your extraction code in an interactive environment.

:doc:\topics/items\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 98); backlink

Unknown interpreted text role "doc".

Define the data you want to scrape.

:doc:\topics/loaders\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 101); backlink Unknown interpreted text role "doc".

Populate your items with the extracted data.

:doc:\topics/item-pipeline\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 104); backlink Unknown interpreted text role "doc".

F

Post-process and store your scraped data.

:doc:\topics/feed-exports\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 107); backlink Unknown interpreted text role "doc".

Output your scraped data using different formats and storages.

:doc:`topics/request-response`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 110); backlink Unknown interpreted text role "doc".

Understand the classes used to represent HTTP requests and responses.

:doc:'topics/link-extractors'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 113); backlink Unknown interpreted text role "doc".

Convenient classes to extract links to follow from pages.

:doc:\topics/settings\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-

```
resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 116); backlink Unknown interpreted text role "doc".
```

Learn how to configure Scrapy and see all ref. available settings <topics-settings-ref>'.

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 116); backlink Unknown interpreted text role "ref".
```

:doc:`topics/exceptions`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 120); backlink
Unknown interpreted text role "doc".
```

See all available exceptions and their meaning.

Built-in services

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 125)
```

Unknown directive type "toctree".

```
.. toctree::
    :caption: Built-in services
    :hidden:

    topics/logging
    topics/stats
    topics/email
    topics/telnetconsole
    topics/webservice
```

:doc:`topics/logging`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 136); backlink
Unknown interpreted text role "doc".
```

Learn how to use Python's builtin logging on Scrapy.

:doc:\topics/stats\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 139); backlink Unknown interpreted text role "doc".
```

Collect statistics about your scraping crawler.

:doc:\topics/email\

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 142); backlink
Unknown interpreted text role "doc".
```

Send email notifications when certain events occur.

:doc:`topics/telnetconsole`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 145); backlink
```

Unknown interpreted text role "doc".

Inspect a running crawler using a built-in Python console.

:doc:`topics/webservice`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master][docs]index.rst, line 149); backlink
Unknown interpreted text role "doc".
```

Monitor and control a crawler using a web service.

Solving specific problems

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-
master\docs\[scrapy-master][docs]index.rst, line 154)
Unknown directive type "toctree".
   .. toctree::
      :caption: Solving specific problems
      :hidden:
      faq
      topics/debug
      topics/contracts
      topics/practices
      topics/broad-crawls
      topics/developer-tools
      topics/dynamic-content
      topics/leaks
      topics/media-pipeline
      topics/deploy
      topics/autothrottle
      topics/benchmarking
      topics/jobs
      topics/coroutines
      topics/asyncio
```

:doc:`faq`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 175); backlink
Unknown interpreted text role "doc".
```

Get answers to most frequently asked questions.

:doc:`topics/debug`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 178); backlink
Unknown interpreted text role "doc".
```

Learn how to debug common problems of your Scrapy spider.

:doc:`topics/contracts`

```
System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 181); backlink
Unknown interpreted text role "doc".
```

Learn how to use contracts for testing your spiders.

:doc:'topics/practices'

```
System\ Message:\ ERROR/3\ (\texttt{D:\nonboarding-resources\backslashsample-onboarding-resources})
```

resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 184); backlink Unknown interpreted text role "doc".

Get familiar with some Scrapy common practices.

:doc:`topics/broad-crawls`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 187); backlink Unknown interpreted text role "doc".

Tune Scrapy for crawling a lot domains in parallel.

:doc:\topics/developer-tools\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 190); backlink Unknown interpreted text role "doc".

Learn how to scrape with your browser's developer tools.

:doc:`topics/dynamic-content`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 193); backlink Unknown interpreted text role "doc".

Read webpage data that is loaded dynamically.

:doc:\topics/leaks\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 196); backlink Unknown interpreted text role "doc".

Learn how to find and get rid of memory leaks in your crawler.

:doc:\topics/media-pipeline\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 199); backlink Unknown interpreted text role "doc".

Download files and/or images associated with your scraped items.

:doc:\topics/deploy\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 202); backlink Unknown interpreted text role "doc".

Deploying your Scrapy spiders and run them in a remote server.

:doc:`topics/autothrottle`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 205); backlink

Unknown interpreted text role "doc".

Adjust crawl rate dynamically based on load.

:doc:`topics/benchmarking`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 208); backlink

Unknown interpreted text role "doc".

Check how Scrapy performs on your hardware.

:doc:`topics/jobs`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 211); backlink

Unknown interpreted text role "doc".

Learn how to pause and resume crawls for large spiders.

:doc:'topics/coroutines'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 214); backlink Unknown interpreted text role "doc".

Use the :ref:`coroutine syntax <async>`.

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 214); backlink Unknown interpreted text role "ref".

:doc:'topics/asyncio'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 217); backlink Unknown interpreted text role "doc".

Use :mod:'asyncio' and :mod:'asyncio'-powered libraries.

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 217); backlink Unknown interpreted text role "mod".

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 217); backlink

Unknown interpreted text role "mod".

Extending Scrapy

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 224)

Unknown directive type "toctree".

```
.. toctree::
    :caption: Extending Scrapy
    :hidden:

    topics/architecture
    topics/downloader-middleware
    topics/spider-middleware
    topics/extensions
    topics/api
    topics/signals
    topics/scheduler
    topics/exporters
```

:doc:'topics/architecture'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 239); backlink Unknown interpreted text role "doc".

Understand the Scrapy architecture.

:doc:`topics/downloader-middleware`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 242); backlink Unknown interpreted text role "doc".

Customize how pages get requested and downloaded.

:doc:`topics/spider-middleware`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 245); backlink Unknown interpreted text role "doc".

Customize the input and output of your spiders.

:doc:'topics/extensions'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 248); backlink Unknown interpreted text role "doc".

Extend Scrapy with your custom functionality

:doc:`topics/api`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 251); backlink Unknown interpreted text role "doc".

Use it on extensions and middlewares to extend Scrapy functionality

:doc:\topics/signals\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 254); backlink Unknown interpreted text role "doc".

See all available signals and how to work with them.

:doc:\topics/scheduler\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 257); backlink Unknown interpreted text role "doc".

Understand the scheduler component.

:doc:\topics/exporters\

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 261); backlink

Unknown interpreted text role "doc".

Quickly export your scraped items to a file (XML, CSV, etc).

All the rest

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 266)

Unknown directive type "toctree".

```
.. toctree::
    :caption: All the rest
    :hidden:
    news
    contributing
    versioning
```

:doc:`news`

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 275); backlink Unknown interpreted text role "doc".

See what has changed in recent Scrapy versions.

:doc:'contributing'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs] index.rst, line 278); backlink
Unknown interpreted text role "doc".

Learn how to contribute to the Scrapy project.

:doc:'versioning'

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 280); backlink Unknown interpreted text role "doc".

Understand Scrapy versioning and API stability.

Docutils System Messages

System Message: ERROR/3 (D:\onboarding-resources\sample-onboarding-resources\scrapy-master\docs\[scrapy-master] [docs]index.rst, line 5); backlink

Undefined substitution referenced: "version".