pydot and graphviz error: Couldn't import dot_parser, loading of dot files will not be possible
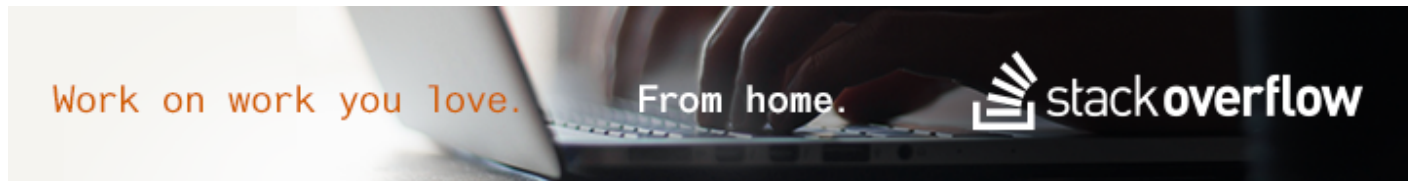
When I run a very simple code with pydot

```python
import pydot # import pydot or you're not going to get anywhere my friend :D

graph = pydot.Dot(graph_type='graph')

for i in range(3):

    edge = pydot.Edge("king", "lord%d" % i)
    graph.add_edge(edge)

vassal_num = 0
for i in range(3):
    for j in range(2):
        edge = pydot.Edge("lord%d" % i, "vassal%d" % vassal_num)
        graph.add_edge(edge)
        vassal_num += 1
```

```
graph.write_png('example1_graph.png')
```

It prints me the error message:

```
Couldn't import dot_parser, loading of dot files will not be possible.
```

I'm using python 2.7.3

python   python-2.7   graphviz   pydot

asked Apr 11 '13 at 14:42

Sadik
1,104   1   21   53

5   `pip install pydot2` should fix this issue. Much nicer than using `pip uninstall` because if you share
     code you can just add pydot2 to your requirements.txt and not have users run unfamiliar commands. –
     RussellStewart Jul 25 '15 at 20:45

11 Answers

Answer for `pydot >= 1.1` :

The incompatibility of (upstream) `pydot` has been fixed by 6dff94b3f1, and thus `pydot >= 1.1` will
be compatible with `pyparsing >= 1.5.7` .

Answer applicable to `pydot <= 1.0.28` :

For anyone else who comes across this, it is due to the changes in pyparsing from 1.x to the 2.x
release. To install pydot using pip, first install the older version of pyparsing:

```
pip install pyparsing==1.5.7
pip install pydot==1.0.28
```

If you did not install `pyparsing` using `pip` , but instead used `setup.py` , then have a look at this
solution to uninstall the package. Thanks @qtips.

edited May 23 at 10:39   answered Jul 27 '13 at 22:07

Ioannis Filippidis   **Jonathan**

2,244   1   20   27   **3,467**   1   10   14

Thanks for the timely answer. I needed it 3 hours after you posted it. – foresightyj Jul 28 '13 at 1:55

I installed NetworkX, GraphViz and pydot, but could not get Graphviz functionality to work with NetworkX (e.g. this NetworkX example failed). I kept getting: **global name 'dot_parser' is not defined**. Your solution solved this problem. – qtips Aug 6 '13 at 0:41

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1   also, `sudo pip uninstall` does not work if you have installed your package using `python setup.py install` in that case, follow this solution. This was at least the case on my Mountain Lion OSX Mac – qtips Aug 6 '13 at 0:43

`sudo` is obviously not always necessary, like if you're using a virtualenv. Other than that, this worked for me! – David Reynolds Nov 14 '13 at 10:43

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43   Why not just `pip install pyparsing==1.5.7` ? – Suor Jun 13 '14 at 7:19

There is a new package in the pip repo called pydot2 that functions correctly with pyparsing2. I couldn't downgrade my packages because matplotlib depends on the newer pyparsing package.

Note: python2.7 from macports

edited Apr 11 '14 at 20:08   answered Jan 31 '14 at 20:22

Dana the Sane

9,651   6   38   69

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6   IMHO This answer should be considered over the pyparsing downgrading Idea. Works for me perfectly with networkx too. Thanks ! – Raghav RV Jul 5 '14 at 16:38

Still giving this error but dot_parser error gone. You must install pydot for `pydotprint` to work. – deeperx Oct 23 '14 at 10:55

pydot used a private module variable (_noncomma) from pyparsing. The below diff fixes it to use
for pyparsing 2.0.1:

```
diff --git a/dot_parser.py b/dot_parser.py
index dedd61a..138d152 100644
--- a/dot_parser.py
+++ b/dot_parser.py
@@ -25,8 +25,9 @@ from pyparsing import __version__ as pyparsing_version
 from pyparsing import ( nestedExpr, Literal, CaselessLiteral, Word, Upcase, OneOrMore,
ZeroOrMore,
       Forward, NotAny, delimitedList, oneOf, Group, Optional, Combine, alphas, nums,
       restOfLine, cStyleComment, nums, alphanums, printables, empty, quotedString,
-      ParseException, ParseResults, CharsNotIn, _noncomma, dblQuotedString, QuotedString,
ParserElement )
+      ParseException, ParseResults, CharsNotIn, dblQuotedString, QuotedString,
ParserElement )

+_noncomma = "".join( [ c for c in printables if c != "," ] )

 class P_AttrList:
```

<div align="right">

answered Aug 31 '13 at 11:49

Gabi Davar
849   9   12

</div>

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2   Just for completeness, here's the issue report for pydot which reports this issue and the fix mentioned by
     @Gabi Davar. – Jack Kelly Oct 16 '13 at 9:11

     Thanks! thanks!! I was breaking my head over this! – Shankar Dec 7 '13 at 4:14

I forked the pydot repository [1], applied the Gabi Davar patch and some changes to support
python-3. The package is available in the PyPI [2].

Cheers

- [1] https://pypi.python.org/pypi/pydot2/1.0.32

- [2] https://pypi.python.org/pypi/pydot2

edited May 11 at 0:58   answered Jan 30 '14 at 16:53

Ioannis Filippidis   david villa
2,244   1   20   27   **146**   2   4

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1   The PyPI page appears to be down. That's too bad! Any ideas why? – Dav Clark Nov 12 '14 at 16:32

the pip package seems to be broken. `pip install...` failed in the middle without explicit error. Looks like the manifest and the actual files don't match. I checkout the git repo, and `mv README.rst README` then `python setup.py install` . This worked for me :-) – Kenji Noguchi Dec 17 '14 at 19:20

2   the link, pypi.python.org/pypi/pydot2, is broken but `pip install pydot2` works and this link, pypi.python.org/pypi/pydot2/1.0.32, works. – Mark Mikofski Feb 17 '15 at 19:45

```
$ sudo pip uninstall pydot

$ sudo pip install pydot2
```

See the following link: http://infidea.net/troubleshooting-couldnt-import-dot_parser-loading-of-dot-files-will-not-be-possible/

answered Jun 29 '15 at 5:04

Jing Zhang
61   1   1

While this link may answer the question, it is better to include the essential parts of the answer here and provide the link for reference. Link-only answers can become invalid if the linked page changes. – Ethan Furman Jun 29 '15 at 6:55

The solution was not to install pydot from somewhere, but "python-pydot" from official ubuntu repositories.

edited Aug 25 '13 at 20:40   answered Apr 11 '13 at 15:29

Sadik
1,104   1   21   53

As of 25-Aug-2013 `pip install python-pydot` does not work for me (distribution not found); `pip install pydot` does. So I don't think it's that `pydot` is necessarily unofficial. Perhaps you were installing via an OS distribution instead? – Owen S. Aug 25 '13 at 19:38

3 Not with pip, `sudo apt-get install python-pydot` did it for me. – Sadik Aug 25 '13 at 20:38

That would probably work because Ubuntu currently has `python-pyparsing` at 1.5.2, which avoids the version incompatibility listed above. I went with the fix above and haven't had problems since. Thanks! – Owen S. Aug 25 '13 at 20:41

1 Unfortunately in Ubuntu as of Saucy pyparsing has been upgraded but pydot has not been patched appropriately. – Tully May 20 '14 at 6:18

1 I've filed a ticket to fix the Ubuntu package: bugs.launchpad.net/ubuntu/+source/pydot/+bug/1321135 – Tully May 20 '14 at 6:45

There are now at least 2 more versions that appear to support PyParsing-2 and Python-3:

- PyDotPlus by Carlos Jenkins with a nice travis buildbot and fancy documentation. However you will need to change its folder name from `site-packages\pydotplus` to `site-packages\pydot` for it to work with existing programs that import pydot.

- pydot3k by bmcorser. **Sadly, did not work!**

- prologic/pydot by James Mills linked to from the official pydot Google code page as ...

  > a branch for Python 3 compatibility

- and here is a working link to David Villa's pydot2 which works fine:
  https://pypi.python.org/pypi/pydot2/1.0.32

answered Feb 17 '15 at 20:05

Mark Mikofski
7,311 1 23 40

This worked for me (Mac OS X 10.9 with Python 2.7.10 on Anaconda):

```
conda uninstall pydot
```

Then,

```
conda install pydot
```

Pyparsing is then downgraded (from 2.x to 1.5.7) upon pydot's installation. Future Googlers: this allowed me to install and import Theano correctly.

answered Aug 10 '15 at 1:29

scottlittle
395   3   16

I had the problem again and my above solution did not work. If that is true for you and you are also using Anaconda on a Mac with El Capitan, try this:

```
conda install --channel https://conda.anaconda.org/RMG graphviz`
conda install --channel https://conda.anaconda.org/RMG pydot
```

answered Jan 28 at 2:57

scottlittle
395   3   16

On OSX Mavericks the following did the trick... I got the same error but at the bottom there was also a complaint that the graphviz executable was not present... I think the problem was i had installed graphviz prior to the other modules?

```
brew uninstall graphviz
brew install graphviz
```

answered Jan 14 '15 at 14:58

ecordo
21   1

this did not work for me :(– Climbs_lika_Spyder Jun 16 '15 at 18:31

worked for MacOS El capitan – Yauhen Jan 13 at 15:38

Worked for me too. TY – Err Hunter May 3 at 12:31

You need to downgrade pyparsing from version 2.x to version 1.5.7 to get pydot to work correctly.

For win-64, using Conda, this worked for me:

```
conda install -c https://conda.anaconda.org/Trentonoliphant pyparsing=1.5.7
```

I then disabled/uninstalled the 2.x version and reloaded pyparsing in my script:

```
pyparsing = reload(pyparsing)
pydot = reload(pydot)
```

To check whether you have the right version running:

```
print pyparsing.__version__
```

answered Apr 14 at 8:42

Sander van den Oord
103   1   5