REPOSITORY LINE LENGTH ANALYSIS INSIGHTS INTO PYTHON PACKAGES

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ABOUT ME

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CHARACTER LIMIT TWITTER

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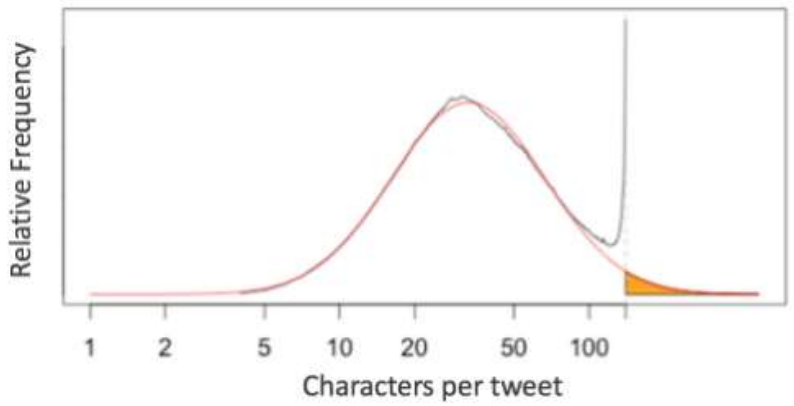
Exploring Line Lengths in Python Packages

Thu 09 November 2017

This week, Twitter upped their single-tweet character limit from 140 to 280, purportedly based on this interesting analysis of tweet lengths published on Twitter's engineering blog. The gist of the analysis is this: English language tweets display a roughly log-normal distribution of character counts, except near the 140-character limit, at which the distribution spikes:



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CHARACTER LIMIT
~~TWITTER~~ PYTHON PACKAGES

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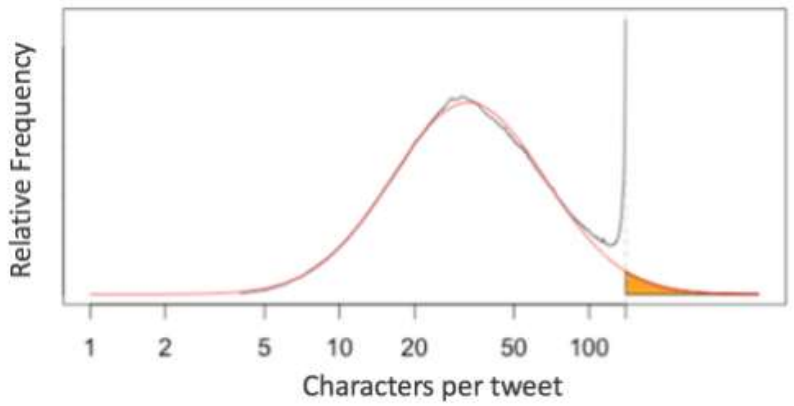
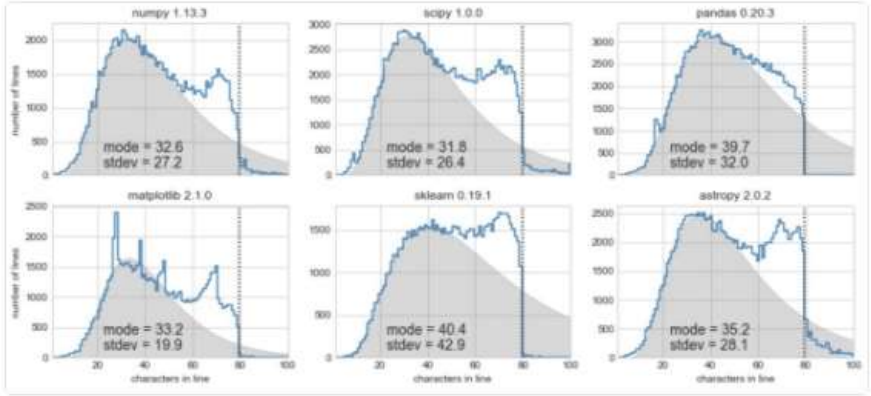


Jake VanderPlas
@jakevdp

New post: some data-driven ruminations on PEP8's 79 character limit & the mark it leaves on Python packages
jakevdp.github.io/blog/2017/11/0 ...

Tweet übersetzen



15:02 - 9. Nov. 2017

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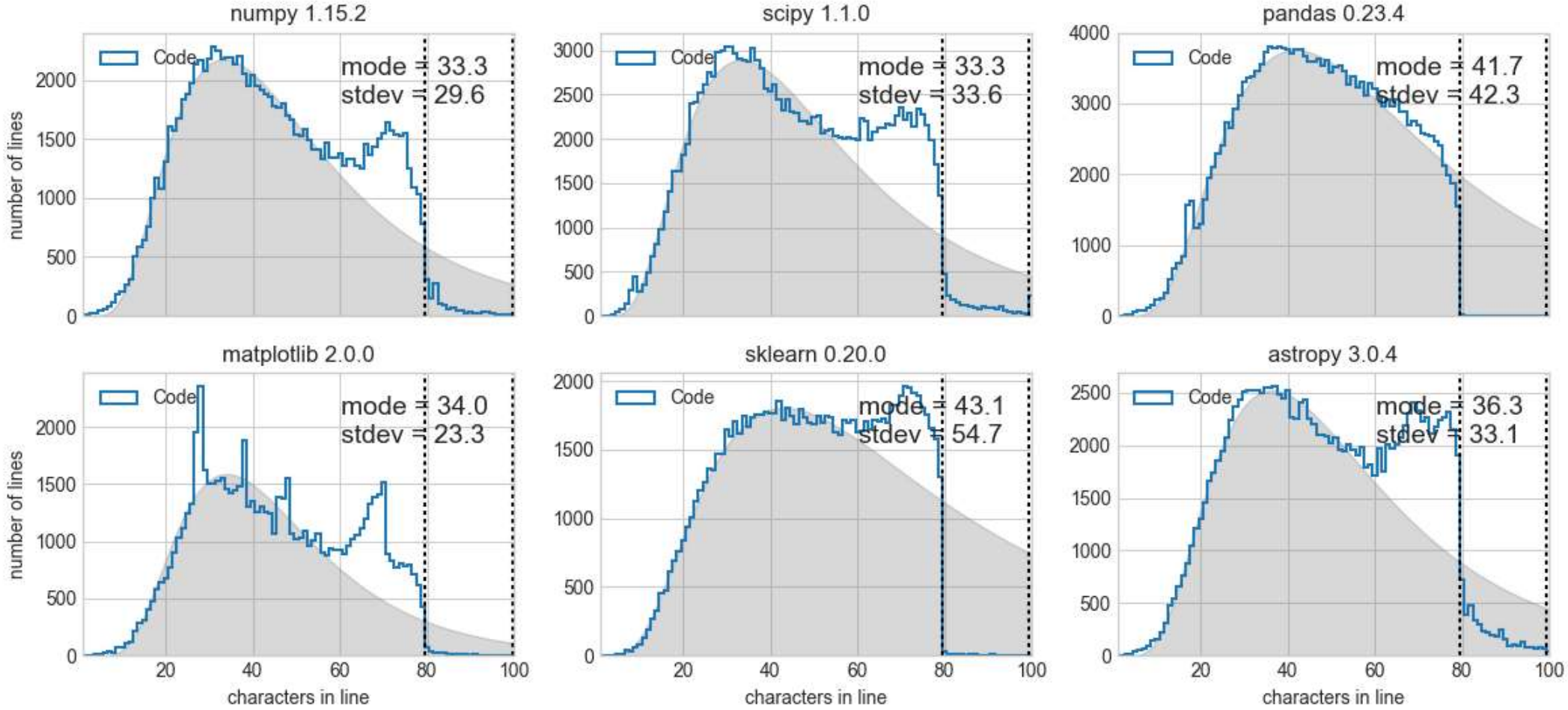
REPRODUCTION OF JAKES RESULTS OVERVIEW



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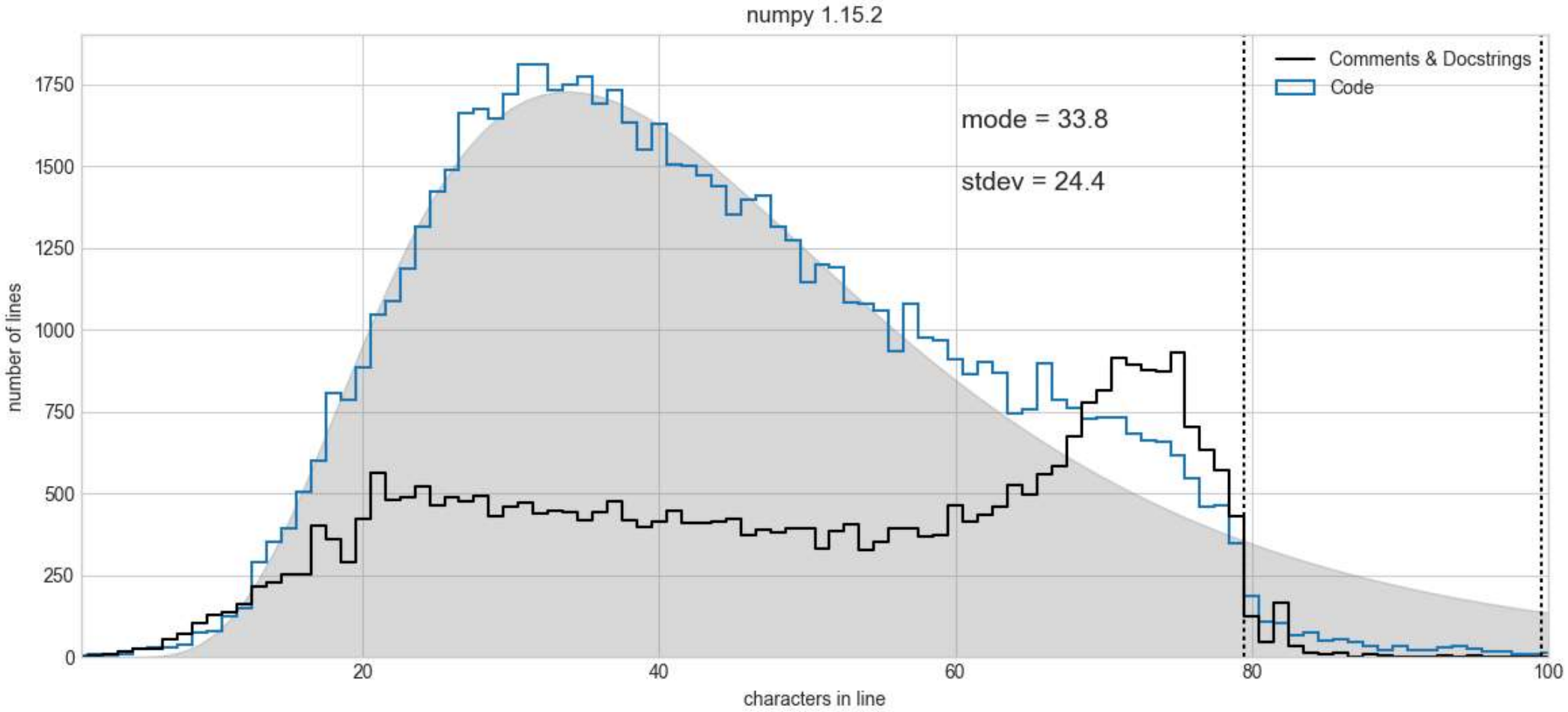
COMMENTS & DOCSTRINGS
WHAT CHANGES



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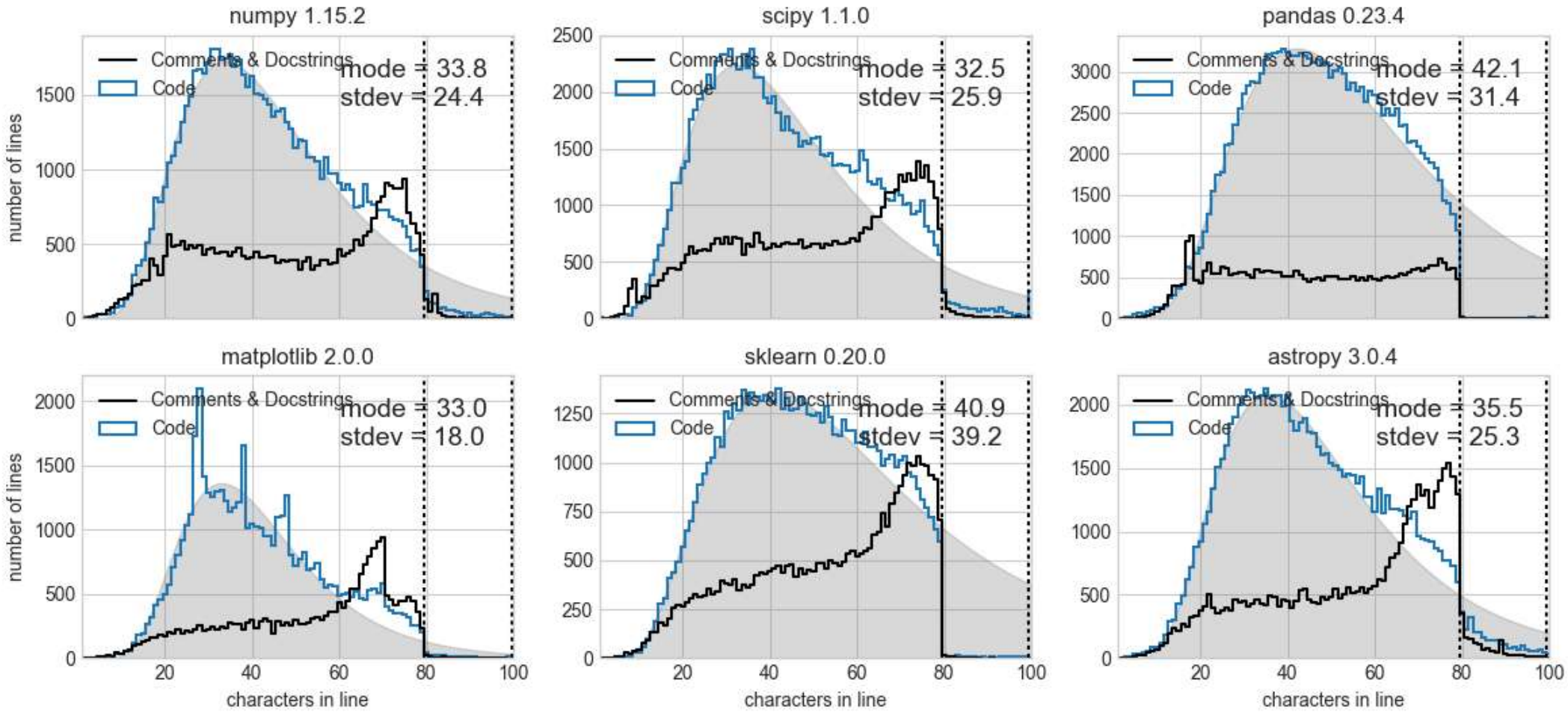
CODE VS. COMMENTS & DOCSTRINGS OVERVIEW



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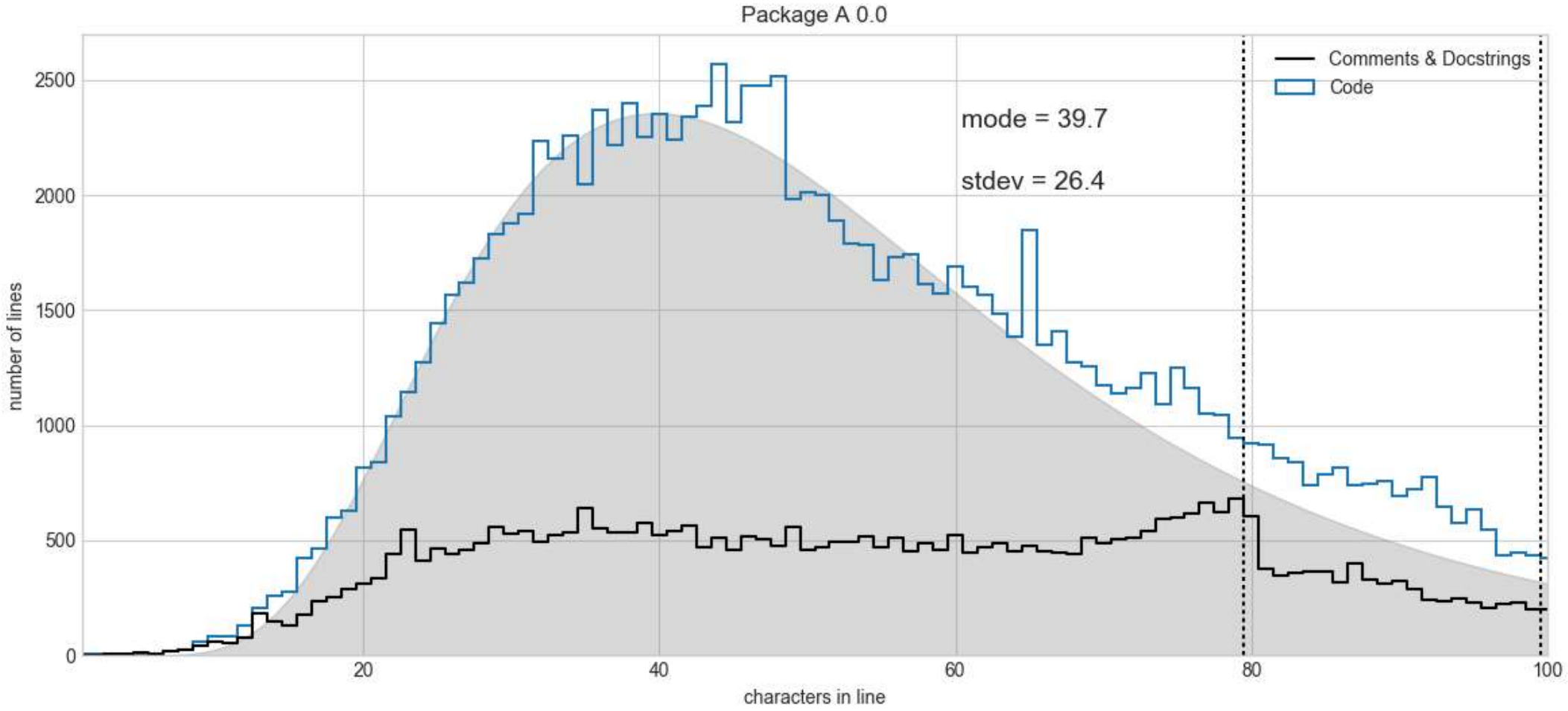
LET'S HAVE A LOOK ON CUSTOM CODE



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PUSH THE LIMITS
LINE LENGTH LIMITS

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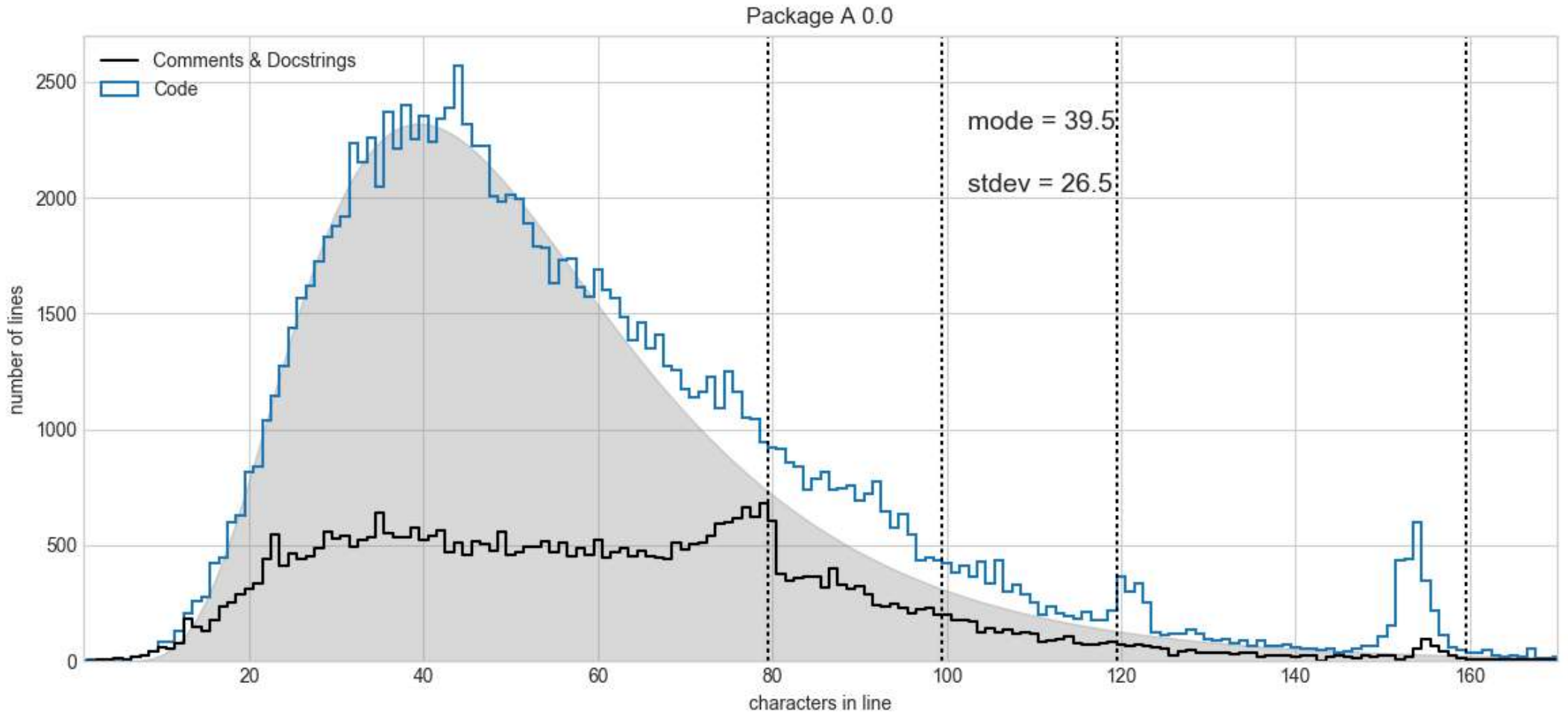

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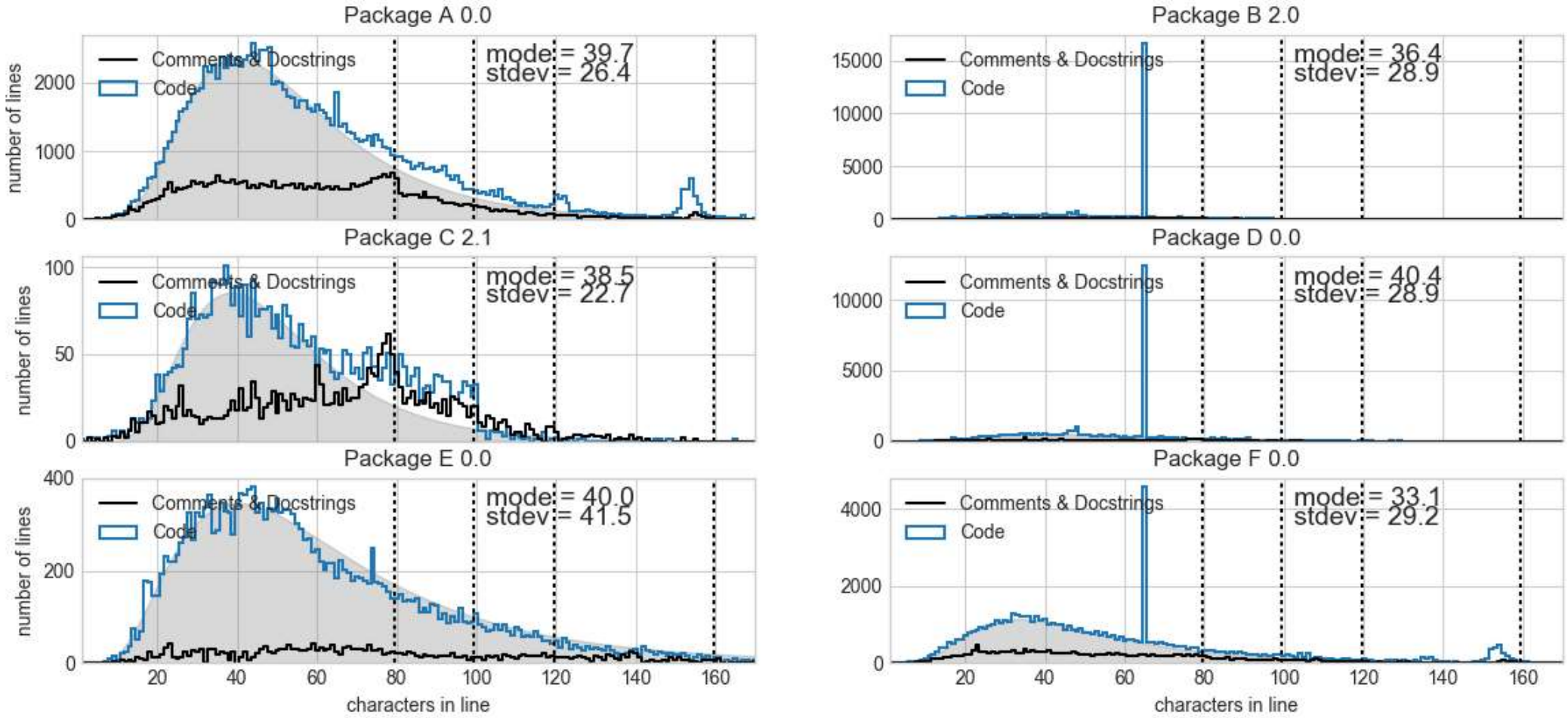
MORE CUSTOM CODE OVERVIEW



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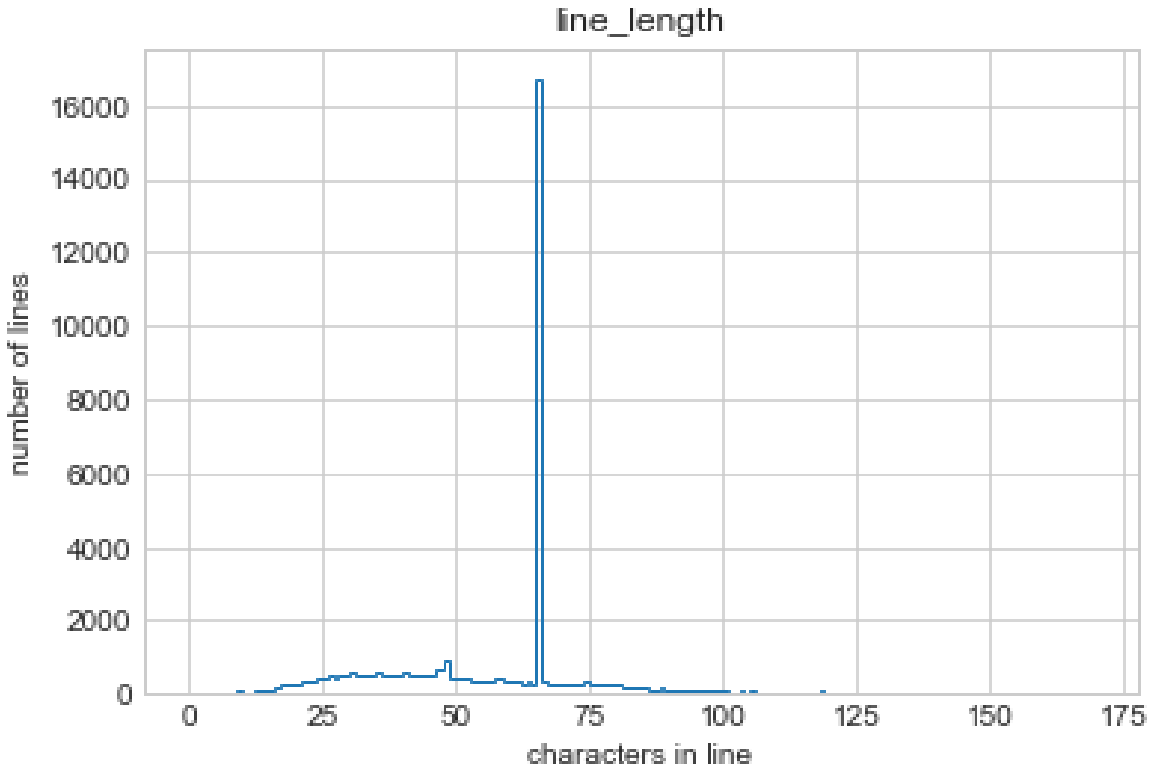
ANALYZE THE UNUSUAL SPIKES
A CLOSER LOOK



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ANALYZE THE UNUSUAL SPIKES
PANDAS TO THE RESCUE

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In [14]:
```
df = pd.DataFrame(data=[(len(line.rstrip('\n')), line) for line in set(iter_lines(alde_core))],
                  columns=('line_length', 'line'))

axis = df.hist(bins=range(170), histtype='step')
axis[0][0].set_xlabel("characters in line")
axis[0][0].set_ylabel("number of lines")
```

In [15]:
```
most_frequent_line_length = df['line_length'].value_counts().idxmax()
most_frequent_line_length
```

In [16]:
```
mask = df['line_length'] == most_frequent_line_length
df[mask].head(n=10)
```

Out[16]:

	line_length	line
2	65	\x69\xfc\xc0\x9d\x61\x63\xfd\x2e\xf9\x77\xf8\x...
3	65	\xfb\xd8\x84\xb8\xa8\xc7\x5f\x7c\xe9\x55\xc7\x...
4	65	\xef\x39\xd7\xb4\xf5\xce\x87\xc7\xcb\x65\x86\x...
7	65	parameter_model.chain.expert.max_samples_p...
8	65	\xef\xbe\x37\xb5\xd5\x9b\xb4\x6f\xde\xbd\xe7\x...
13	65	\x29\x1d\x79\x43\x91\x05\x85\x06\xa7\x3a\x6f\x...
18	65	\x9e\x93\x65\x59\xf7\xcf\x1a\x3b\x09\xbe\x09\x...
20	65	\x4d\x50\x54\x5c\x13\x37\xa0\xf4\x3b\x62\x8e\x...
23	65	\xa1\x76\x82\xcc\xf9\x2c\x13\xd2\x55\xff\xbb\x...
26	65	\x87\x4a\x2d\x64\x65\xd3\xe2\x67\x2a\x14\xe9\x...

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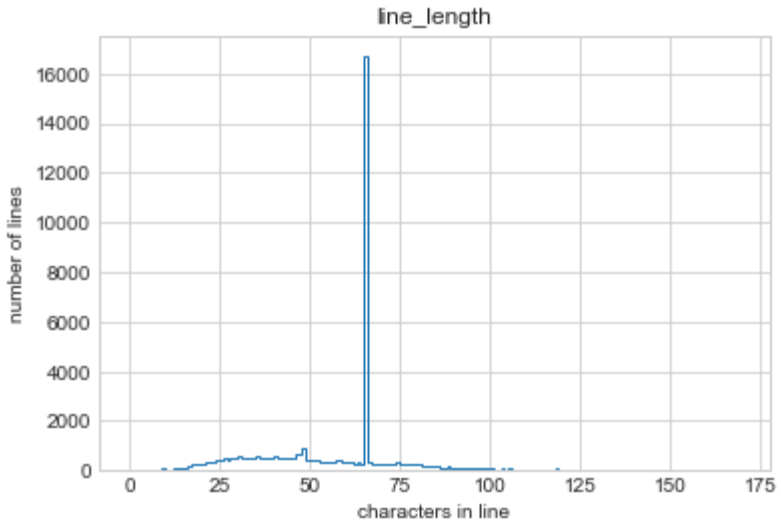
ANALYZE THE UNUSUAL SPIKES
DATA CLEANSING



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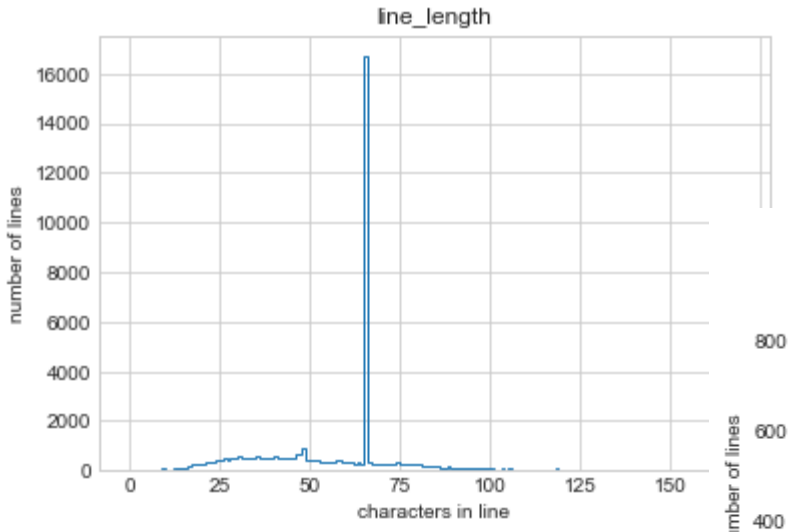
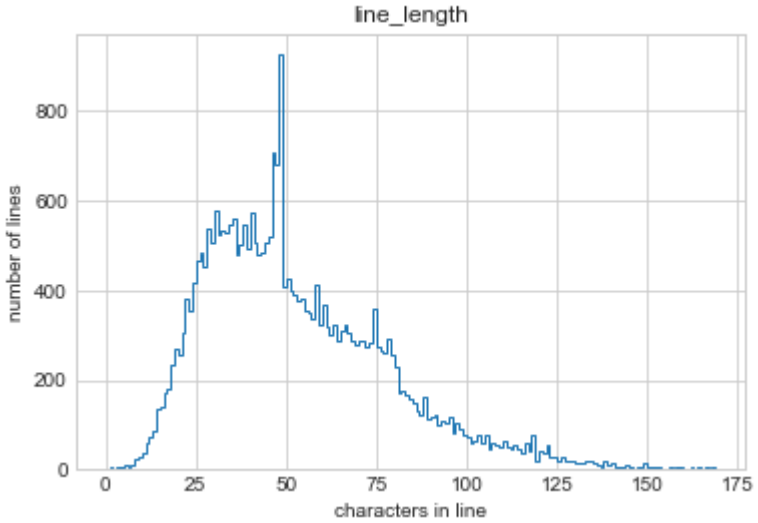
DATA CLEANSING



Postscript Icons



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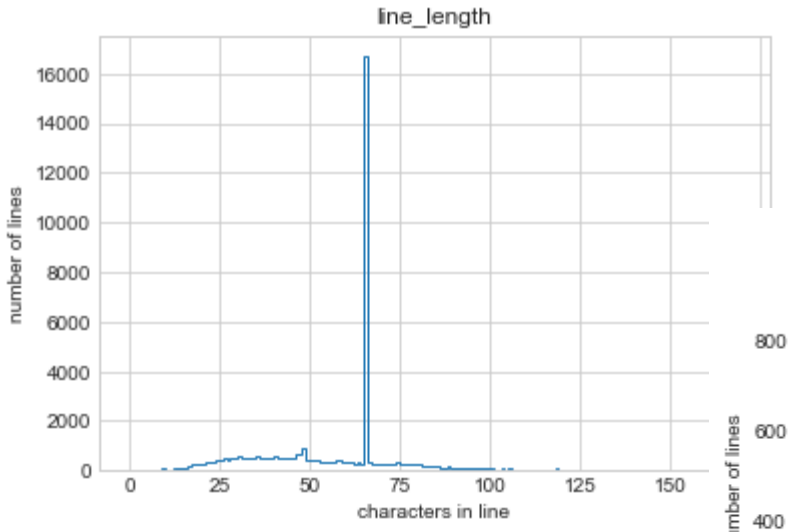

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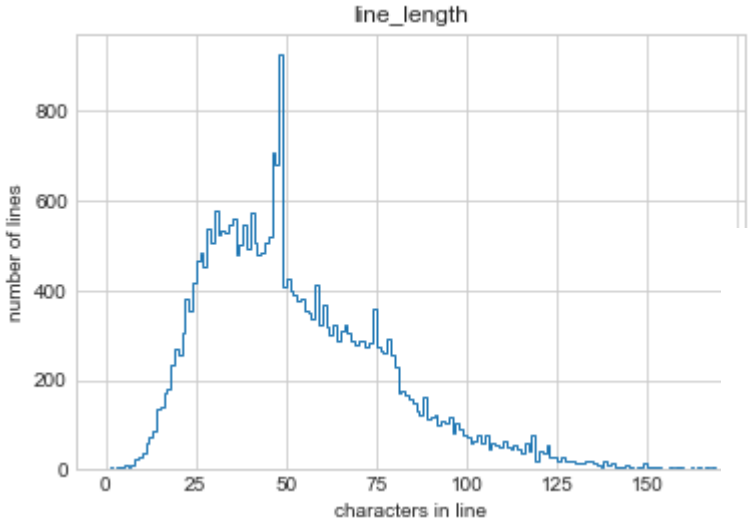
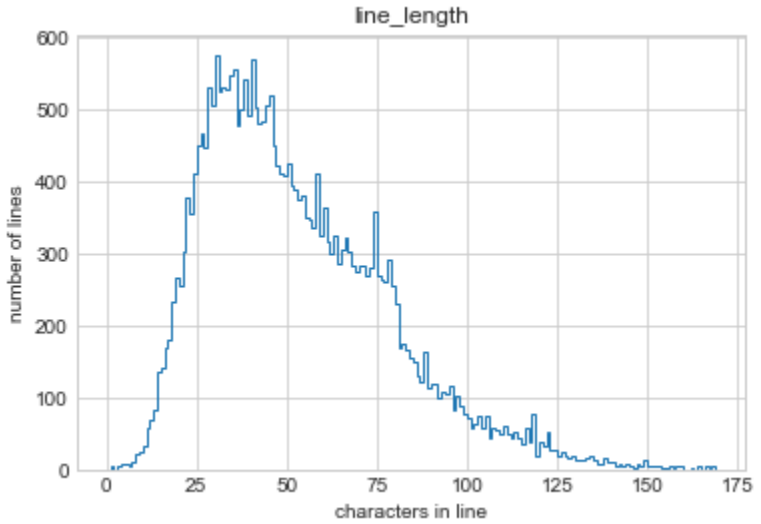


Colormaps



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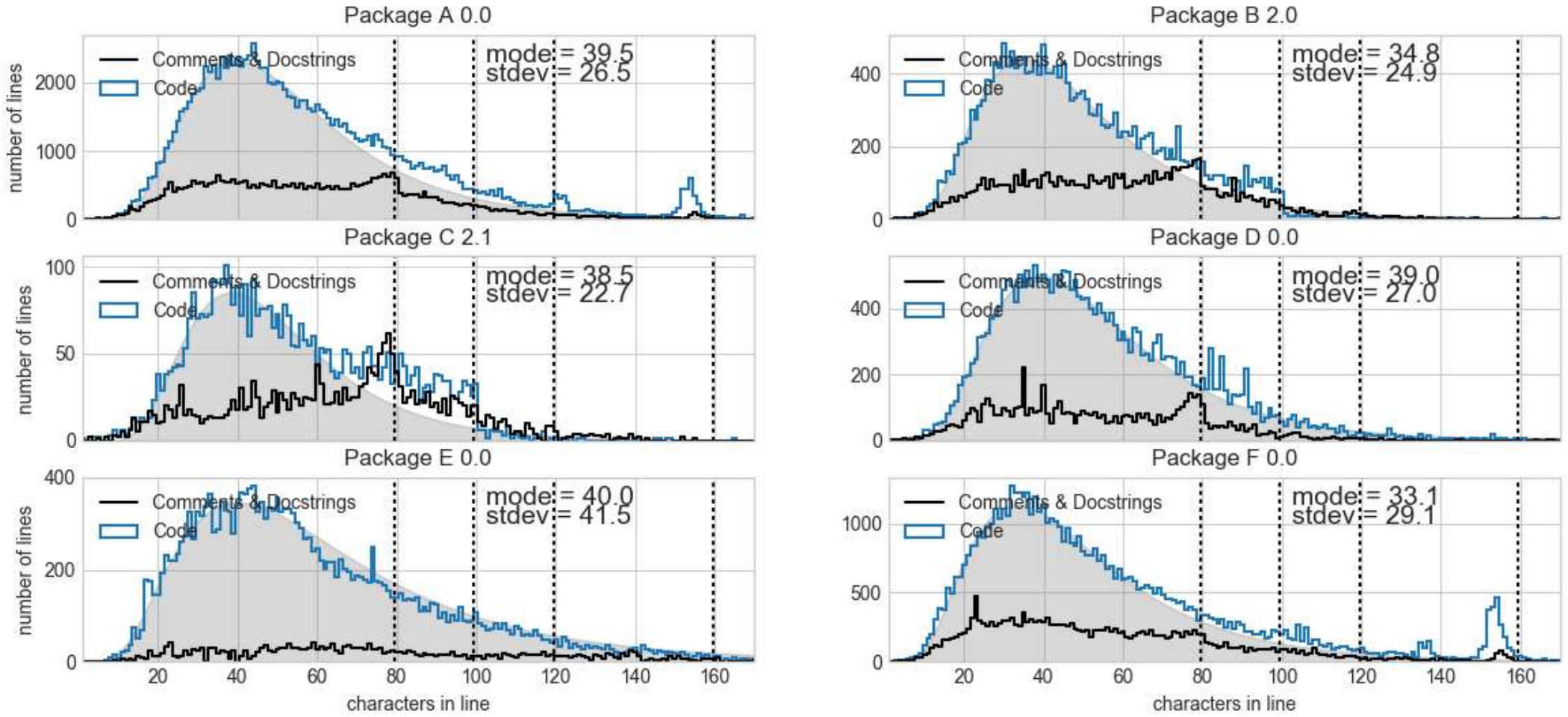
MORE CUSTOM CODE OVERVIEW PART II



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QUESTIONS

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RESOURCES

- http://jakevdp.github.io/blog/2017/11/09/exploring-line-lengths-in-python-packages/
- https://twitter.com/jakevdp/status/928759782625853440
- https://pandas.pydata.org/
- http://jupyter.org/

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