```
89
 90
91 # In[16]:
 92
 93
94 vocabulary = []
95 vocabulary = " ".join([word.lemma_ for word in doc if word not in
    spacy_stopwords])
 96 print(vocabulary)
 97
98
99 # In[17]:
100
101
102 for token in doc:
        print(token, token.pos_)
103
104
105
106 # In[18]:
107
108
109 verbs = [token.text for token in doc if token.pos_ == "VERB"]
nouns = [token.text for token in doc if token.pos_ == "NOUN"]
print('Verbs ',len(verbs),'Nouns ',len(nouns))
print('Verbs ',verbs)
113
114
115 # In[19]:
116
117
118 for token in doc:
        print(token, token.lemma_)
119
120
121
122 # In[20]:
123
124
125 import nltk
126 from nltk.stem import WordNetLemmatizer,PorterStemmer
127
128
129 # In[21]:
130
131
132 words = []
133
134 words = " ".join(token.text for token in doc)
135 words
136
137
```