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CLICKBAIT HEADLINE GENERATOR



Our website needs to trick people into looking at advertisements! But coming up with creative, original content is too hard.

Luckily, with the clickbait headline generator, we can make a computer come up with millions of outrageous, fake headlines. They're all low quality, but readers don't seem to mind. This program generates as many headlines as you need from a Mad Libs-style template.

There's a lot of text in this program for the headline templates, but the code itself is straightforward and suitable for beginners.

The Program in Action

When you run *clickbait.py*, the output will look like this:

Clickbait Headline Generator

By Al Sweigart al@inventwithpython.com

Our website needs to trick people into looking at ads!

Enter the number of clickbait headlines to generate:

> 1000

Big Companies Hate Him! See How This New York Cat Invented a Cheaper Robot

What Telephone Psychics Don't Want You To Know About Avocados

You Won't Believe What This North Carolina Shovel Found in Her Workplace

--snip--

14 Reasons Why Parents Are More Interesting Than You Think (Number 1 Will Surprise You!)

What Robots Don't Want You To Know About Cats

This Florida Telephone Psychic Didn't Think Robots Would Take Her Job. She Was Wrong.

How It Works

This program has several functions for generating different kinds of clickbait headlines. Each of them gets random words from STATES, NOUNS, PLACES, WHEN, and other lists. The functions then insert these words into a template string with the `format()` string method before returning this string. This is like a “Mad Libs” activity book, except the computer fills in the blanks, allowing the program to generate thousands of clickbait headlines in seconds.

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1. """Clickbait Headline Generator, by Al Sweigart al@inventwithpython.com
2. A clickbait headline generator for your soulless content farm website.
3. This code is available at https://nostarch.com/big-book-small-python-programming
4. Tags: large, beginner, humor, word"""
5.
6. import random
7.
8. # Set up the constants:
9. OBJECT_PRONOUNS = ['Her', 'Him', 'Them']
10. POSSESSIVE_PRONOUNS = ['Her', 'His', 'Their']
11. PERSONAL_PRONOUNS = ['She', 'He', 'They']
12. STATES = ['California', 'Texas', 'Florida', 'New York', 'Pennsylvania',
13.           'Illinois', 'Ohio', 'Georgia', 'North Carolina', 'Michigan']
14. NOUNS = ['Athlete', 'Clown', 'Shovel', 'Paleo Diet', 'Doctor', 'Parent',
15.          'Cat', 'Dog', 'Chicken', 'Robot', 'Video Game', 'Avocado',
16.          'Plastic Straw', 'Serial Killer', 'Telephone Psychic']
17. PLACES = ['House', 'Attic', 'Bank Deposit Box', 'School', 'Basement',
18.           'Workplace', 'Donut Shop', 'Apocalypse Bunker']
19. WHEN = ['Soon', 'This Year', 'Later Today', 'RIGHT NOW', 'Next Week']
20.
21.
22. def main():
23.     print('Clickbait Headline Generator')
24.     print('By Al Sweigart al@inventwithpython.com')
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25.     print()
26.
27.     print('Our website needs to trick people into looking at ads!')
28.     while True:
29.         print('Enter the number of clickbait headlines to generate:')
30.         response = input('> ')
31.         if not response.isdecimal():
32.             print('Please enter a number.')
33.         else:
34.             numberOfHeadlines = int(response)
35.             break # Exit the loop once a valid number is entered.
36.
37.     for i in range(numberOfHeadlines):
38.         clickbaitType = random.randint(1, 8)
39.
40.         if clickbaitType == 1:
41.             headline = generateAreMillennialsKillingHeadline()
42.         elif clickbaitType == 2:
43.             headline = generateWhatYouDontKnowHeadline()
44.         elif clickbaitType == 3:
45.             headline = generateBigCompaniesHateHerHeadline()
46.         elif clickbaitType == 4:
47.             headline = generateYouWontBelieveHeadline()
48.         elif clickbaitType == 5:
49.             headline = generateDontWantYouToKnowHeadline()
50.         elif clickbaitType == 6:
51.             headline = generateGiftIdeaHeadline()
52.         elif clickbaitType == 7:
53.             headline = generateReasonsWhyHeadline()
54.         elif clickbaitType == 8:
55.             headline = generateJobAutomatedHeadline()
56.
57.         print(headline)
58.     print()
59.
60.     website = random.choice(['wobsite', 'blog', 'Facebuuk', 'Googles',
61.                              'Facesbook', 'Tweedie', 'Pastagram'])
62.     when = random.choice(WHEN).lower()
63.     print('Post these to our', website, when, 'or you\'re fired!')
64.
65.
66. # Each of these functions returns a different type of headline:
67. def generateAreMillennialsKillingHeadline():
68.     noun = random.choice(NOUNS)
69.     return 'Are Millennials Killing the {} Industry?'.format(noun)
70.
71.
72. def generateWhatYouDontKnowHeadline():
73.     noun = random.choice(NOUNS)
74.     pluralNoun = random.choice(NOUNS) + 's'
75.     when = random.choice(WHEN)
76.     return 'Without This {}, {} Could Kill You {}'.format(noun, pluralNoun, when)
77.
78.
79. def generateBigCompaniesHateHerHeadline():

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80.     pronoun = random.choice(OBJECT_PRONOUNS)
81.     state = random.choice(STATES)
82.     noun1 = random.choice(NOUNS)
83.     noun2 = random.choice(NOUNS)
84.     return 'Big Companies Hate {}! See How This {} {} Invented a Cheaper
        {}'.format(pronoun, state, noun1, noun2)

85.
86.
87. def generateYouWontBelieveHeadline():
88.     state = random.choice(STATES)
89.     noun = random.choice(NOUNS)
90.     pronoun = random.choice(POSSESSIVE_PRONOUNS)
91.     place = random.choice(PLACES)
92.     return 'You Won\'t Believe What This {} {} Found in {} {}'.format(state, noun,
        pronoun, place)

93.
94.
95. def generateDontWantYouToKnowHeadline():
96.     pluralNoun1 = random.choice(NOUNS) + 's'
97.     pluralNoun2 = random.choice(NOUNS) + 's'
98.     return 'What {} Don\'t Want You To Know About {}'.format(pluralNoun1, pluralNoun2)
99.
100.
101. def generateGiftIdeaHeadline():
102.     number = random.randint(7, 15)
103.     noun = random.choice(NOUNS)
104.     state = random.choice(STATES)
105.     return '{} Gift Ideas to Give Your {} From {}'.format(number, noun, state)
106.
107.
108. def generateReasonsWhyHeadline():
109.     number1 = random.randint(3, 19)
110.     pluralNoun = random.choice(NOUNS) + 's'
111.     # number2 should be no larger than number1:
112.     number2 = random.randint(1, number1)
113.     return '{} Reasons Why {} Are More Interesting Than You Think (Number {} Will
        Surprise You!)'.format(number1, pluralNoun, number2)

114.
115.
116. def generateJobAutomatedHeadline():
117.     state = random.choice(STATES)
118.     noun = random.choice(NOUNS)
119.
120.     i = random.randint(0, 2)
121.     pronoun1 = POSSESSIVE_PRONOUNS[i]
122.     pronoun2 = PERSONAL_PRONOUNS[i]
123.     if pronoun1 == 'Their':
124.         return 'This {} {} Didn\'t Think Robots Would Take {} Job. {} Were
            Wrong.'.format(state, noun, pronoun1, pronoun2)
125.     else:
126.         return 'This {} {} Didn\'t Think Robots Would Take {} Job. {} Was
            Wrong.'.format(state, noun, pronoun1, pronoun2)

127.
128.

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129. # If the program is run (instead of imported), run the game:
130. if __name__ == '__main__':
131.     main()
```

After entering the source code and running it a few times, try making experimental changes to it. On your own, you can also try to figure out how to do the following:

- Add additional types of clickbait headlines.
- Add new categories of words, beyond NOUNS, STATES, and so on.

Exploring the Program

Try to find the answers to the following questions. Experiment with some modifications to the code and rerun the program to see what effect the changes have.

1. What error message do you get if you delete or comment out `numberOfHeadlines = int(response)` on line 34?
2. What error message do you get if you change `int(response)` to `response` on line 34?
3. What error message do you get if you change line 19 to `WHEN = []`?

