

ContentSquare Data Engineering Test

Auto-complete

You are given a list of keywords (on the next page). Write a program that will offer up to 4 suggested keywords from the list, starting with the letters typed, **not case sensitive**. Similar to Google Autocomplete, except that results must be in alphabetical order. You will find examples at the end of this document.

Requirements

- You can use any programming language of your choice, preferably Scala or Java
- Do not make a web interface for input and output, a simple method taking a string and returning a list of strings is fine
- Do not use databases and complex libraries, write the completion logic yourself

Deliverable

- Sources of your program, commented when necessary
- Other artifacts and files required to run the program (like the list of keywords, if your program loads it)

Additional Questions

No code expected, please give your answers in a Readme file

- What would you change if the list of keywords was much larger (several millions) ?
- What would you change if the requirements were to match any portion of the keywords (for example, given the string “pro”, the program could suggest the keyword “reprobe”) ?

List of keywords

project runway
pinterest
river
kayak
progenex
progeria
pg&e
project free tv
bank
proactive
progesterone
press democrat
priceline
pandora
reprobe
paypal

Examples

Autocomplete(**"p"**)

pandora
paypal
pg&e
pinterest

Autocomplete(**"pr"**)

press democrat
priceline
proactive
progenex

Autocomplete(**“pro”**)

proactive
progenex
progeria
progesterone

Autocomplete(**“prog”**)

progenex
progeria
progesterone