2019 Assignment Example Solution

https://trinket.io/python/632e384512

Design	Implementation
| **Program design** <br><br> **Main Steps: Pseudocode** <br><br> 1. Store the endings <br><br> 2. Enter the number of students <br><br> 3. Start fixed loop for each student <br><br>     4. Enter first three letters of student's name <br><br>     5. Generate random number <br><br>     6. Generate username <br><br>     7. Display the username <br><br> 8. End Loop <br><br> **REFINEMENTS** <br><br> 4.1    Start conditional loop <br> 4.2       Get the first three letters of student's name <br> 4.3       If the length of the name is not equal to 3 then <br> 4.4          Display an error message <br> 4.5       End If <br> 4.6    Repeat until the name entered is 3 characters long <br><br><br> 6.1    If the first random number was generated add the first stored ending to the end of the first three letters of the student's name <br> 6.2    If the second random number was generated add the second stored ending to the end of the first three letters of the student's name <br> 6.3    If the third random number was generated add the third stored ending to the end of the first three letters of the student's name <br> 6.4    If the fourth random number was generated add the fourth stored ending to the end of the first three letters of the student's name <br> 6.5    If the fifth random number was generated add the fifth stored ending to the end of the first three letters of the student's name | ```python
#2019 Example Solution

endings=[""]*5
noOfStudents =0
partName =""
randomNo =0
userName = ""

import random

#Store Endings
endings[0]="ing"
endings[1]="end"
endings[2]="axe"
endings[3]="gex"
endings[4]="goh"

#Enter the number of students
noOfStudents=int(input("Enter the number of students"))

#Start fixed loop for each student
for counter in range(noOfStudents):

    #Enter and validate first 3 letters of name
    partName = input("Please enter first 3 letters of student name")
    while len(partName)!=3:
        partName = input("Re-enter only the first 3 letters")

    #Generate random number between 0 and 4 to pick random ending
    randomNo = random.randint(0,4)

    #Generate username - concatenate name to random ending
    userName = partName + endings[randomNo]

    #Display each username
    print("Student " + str(counter + 1)+ ":" + userName)

#End loop
``` |