SKILL-TEST						
Course Code: CPE 201L	Program: BSCpE					
Course Title: Data Structure and Algorithm	Date Performed: August 30 2025					
Section: 2-A	Date Submitted: August 30 2025					
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1.Objectives

- This activity was meant to assess the capability of students on coding
- This was meant to strengthen the basic knowledge of students on the code

2. Discussion

In this activity we created a program that appends each character of our full name and traverse each character, in my case I use the array, queue and stack to be able to finish my program.

3. Materials and Equipment

- Google colab
- Queue, stack and array

4. Procedure

- Understand the problem
- Choose the class I will use on the program
- Execute the program

5. Output

```
from collections import deque
class Stack: 1 usage
       self.stack = []
   def push(self, dataval): 1usage
        self.stack.append(dataval)
       return True
   def pop(self):
       if len(self.stack) <= 0:</pre>
          return "Stack is empty"
       else:
       return self.stack.pop()
   def retrieve(self): 1 usage
       print("Stack Traversal:")
       for item in reversed(self.stack):
      print(item)
def traverse_name_with_custom_stack_and_queue(full_name): 1usage
   queue = deque()
    stack = Stack()
   for char in full_name:
       queue.append(char)
       stack.push(char)
    print("Queue Traversal:")
   for char in queue:
```

<pre>C:\Users\compu\PycharmProjects\pythonProject' Queue Traversal:</pre>	\.venv\Scripts\python.exe	"C:\Users\compu\PycharmPro	jects\pythonProject\lab 5.py"
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Stack Traversal:			
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```
peque operacions.
Dequeued from front: M
Dequeued from rear: G
Queue after dequeue operations:
Process finished with exit code 0
```

6. Conclusion

In conclusion, this activity allows me to evaluate my current skills and identify areas for improvement. While I have a basic understanding of the concepts, I recognize that my knowledge isn't fully refined yet. I need to dedicate more time to studying and practicing the application of these classes so that I can better utilize them in future projects. This will not only strengthen my understanding but also enhance my ability to apply these skills effectively.

Criteria	Ratings							Pts			
SO 7 PI 1 Student Outcome 7.1 Acquire and apply new knowledge from outside sources. threshold: 4.8 pts	6 pts Excellent Educational interests and pursuits exist and flourish outside classroom requirements, knowled and/or experiences are pursued independent and applies knowledg learned into practice	interests al exist and fl outside cla dge requirement and/or exp pursued in	nd pursuits ourish	4 pts Satisfactory Look beyond classroom requirements, showing interest in pursuing knowledge independently		nd Begins to look beyond classroom requirements, showing interest in pursuing		Relies on classroom instruction s, only		1 pts Very Poor No initiative or interest in acquiring new knowledge	6 pts
Student Outcome 7.2 Learn independently threshold: 4.8 pts	6 pts Excellent Completes an assigned task independently and practices continuous improvement	5 pts Good Completes an assigned task without supervision or guidance	4 pts Satisfactory Requires minimal guidance to complete an assigned task	3 pts Unsatisfactory Requires detailed or step-by-step instructions to complete a task		y iled ep	2 pts Poor Shows little interest to complete a task independently		1 pts Very Poor No interest to complete a task independently		6 pts
Student Outcome 7.3 Critical thinking in the broadest context of technological change threshold: 4.8 pts	6 pts Excellent Synthesizes and integrates information from a variety of sources; formulates a clear and precise perspective; draws appropriate conclusions	5 pts Good Evaluate information from a variety of sources; formulates a clear and precise perspective.	4 pts Satisfactory Analyze information from a variet sources; formulates a clear and precise perspective.	factory Unsatisfactory Apply the mation gathered a variety of informat formulat problem and see		on to	2 pts Poor Gather and summarized the information from a variety of sources but failed to formulate the problem		V G ir	pts fery Poor sather information rom a variety f sources	6 pts
Student Outcome 7.4 Creativity and adaptability to new and emerging technologies threshold: 4.8 pts	6 pts Excellent Ideas are combined in original and creative ways in line with the new and emerging technology trends to solve a problem or address an issue.	5 pts Good Ideas ar creative and adapt the new knowledge to solve a probler or address an issue	Ideas are creative in solving a	or	3 pts Unsatisi Shows s creative solve th	ways to	ini att em de cre	ots or Shows tiative and empt to velop eative ideas solve the oblem	V lo	pts fery Poor deas are opied or estated from he sources onsulted	6 pts