

codeway task-3

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In [1]: import random
import string

def generate_password(length):
    # Define the character sets for different complexity levels
    lower_case = string.ascii_lowercase
    upper_case = string.ascii_uppercase
    numbers = string.digits
    symbols = string.punctuation

    # Combine all character sets based on complexity level
    all_characters = lower_case + upper_case + numbers + symbols

    # Generate the password using random.choice() method
    password = ''.join(random.choice(all_characters) for _ in range(length))
    return password

def main():
    print("Welcome to the Password Generator!")
    length = int(input("Enter the desired length of the password: "))

    if length <= 0:
        print("Invalid length. Please enter a positive integer.")
        return

    password = generate_password(length)
    print("Generated Password:", password)

if __name__ == "__main__":
    main()
```

```
Welcome to the Password Generator!
Enter the desired length of the password: 18
Generated Password: .V>kJ&@>,MFf]yP!Z@
```

In []: