



```
import math
def trig_calculator():
    print("Basic Trigonometry Calculator")
    print("Choose an option:")
    print("1. Sine")
    print("2. Cosine")
    print("3. Tangent")
    print("4. Cotangent")
    print("5. Secant")
    print("6. Cosecant")
    choice = int(input("Enter choice (1-6): "))
    if choice in [1, 2, 3, 4, 5, 6]:
        angle_deg = float(input("Enter angle in degrees: "))
        angle_rad = math.radians(angle_deg) # Convert to radians

        if choice == 1:
            result = math.sin(angle_rad)
            print(f"Sine({angle_deg}°) = {result}")
        elif choice == 2:
            result = math.cos(angle_rad)
            print(f"Cosine({angle_deg}°) = {result}")
        elif choice == 3:
            result = math.tan(angle_rad)
            print(f"Tangent({angle_deg}°) = {result}")
        elif choice == 4:
            result = 1 / math.tan(angle_rad)
            print(f"Cotangent({angle_deg}°) = {result}")
```

[13]



```
angle_deg = float(input("Enter angle in degrees: "))
angle_rad = math.radians(angle_deg) # Convert to radians

if choice == 1:
    result = math.sin(angle_rad)
    print(f"Sine({angle_deg}°) = {result}")
elif choice == 2:
    result = math.cos(angle_rad)
    print(f"Cosine({angle_deg}°) = {result}")
elif choice == 3:
    result = math.tan(angle_rad)
    print(f"Tangent({angle_deg}°) = {result}")
elif choice == 4:
    result = 1 / math.tan(angle_rad)
    print(f"Cotangent({angle_deg}°) = {result}")
elif choice == 5:
    result = 1 / math.cos(angle_rad)
    print(f"Secant({angle_deg}°) = {result}")
elif choice == 6:
    result = 1 / math.sin(angle_rad)
    print(f"Cosecant({angle_deg}°) = {result}")
else:
    print("Invalid choice! Please select a number between 1 and 6.")
```

[13] ✓ 5.2s

... Cosine(45.0°) = 0.7071067811865476