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Step 1: Start
Step 2: Input Primes and Message:
    2.1:Prompt "Enter prime numbers p and q" and store them as p and q.
    2.2:Prompt "Enter the number" to encrypt and store it as M.
        print("Enter prime numbers p and q: ")
        p, q = user input
        print("Enter the number: ")
        M = user input
Step 3: Calculate RSA Parameters:
    3.1:Compute n as p * q.
    3.2:Compute phi as (p - 1) * (q - 1).
        n = p * q
        phi = (p - 1) * (q - 1)
 Step 4: Find Public Key Exponent e:
    4.1:Starting from e = 2, find the smallest integer e such that gcd(e, phi) = 1.
Step 5: Calculate Private Key Exponent d:
    5.1:Find d such that (e * d) % phi = 1.
        while (e * d) % phi != 1:
          d = d + 1
Step 6: Encrypt the Message:
    6.1:Calculate the encrypted message using modular exponentiation: M^e % n.
        encrypted = (M^e) % n
Step 7: Display Encrypted Message:
    7.1:Print the encrypted message.
Step 8: Decrypt the Message:
    8.1:Calculate the decrypted message using modular exponentiation: encrypted^d % n.
Step 9: Display Decrypted Message:
    9.1:Print the decrypted message, confirming it matches M.
Step 10: Stop
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