**1. WAP to print all even numbers until n.**

**n = int(input("Enter a number: "))**

**for i in range(n + 1):**

**if i % 2 == 0:**

**print(i, ": is an even number.")**

**2. WAP to print all odd numbers until n.**

**n = int(input("Enter a number: "))**

**for i in range(n + 1):**

**if i % 2 != 0:**

**print(i, ": is an odd number.")**

**3. WAP to print sum of series upto n.**

**n = int(input("Enter a number: "))**

**sum\_res = 0**

**for i in range(1, n + 1):**

**sum\_res += i**

**print("Sum of series up-to number",n,"=",sum\_res)**

**4. WAP to print factorial of a number .**

**num = int(input("Enter a number that you want factorial of: "))**

**res = num**

**for i in range(1, num):**

**res \*= i**

**print("Factorial of",num,"is",res)**

**5. WAP to print Fibonacci series upto n.**

**term = int(input("Enter a number for range: "))**

**first = 0**

**second = 1**

**third = 0**

**for i in range(term):**

**print(first, end=" ")**

**third = first + second**

**first = second**

**second = third**

**6. WAP to check if a given number is prime number or not.**

**n = int(input("Enter a number: "))**

**for i in range(2, n):**

**if n % i == 0:**

**print(n,": is not a Prime number")**

**break**

**else:**

**print(n,": is a Prime number")**

**7. WAP to print all integers upto n that aren’t divisible by 2 and3.**

**n = int(input("Enter a number: "))**

**for i in range(n):**

**if i % 2 != 0 and i % 3 != 0:**

**print(i,": is not divisible by 2 and 3.")**

**8. WAP to find which numbers are divisible by 7 and multiple of 5 in a given range.**

**start\_range = int(input("Enter a start range: "))**

**end\_range = int(input("Enter a end range: "))**

**for i in range(start\_range, end\_range):**

**if i % 7 == 0 and i % 5 == 0:**

**print(i, ": is divisible by 7 and 5")**

**9. WAP to print all numbers in a range divisible by a given number.**

**start\_range = int(input("Enter a number for start of range: "))**

**end\_range = int(input("Enter a number for end of range: "))**

**n = int(input("Enter the number: "))**

**for i in range(start\_range, end\_range + 1):**

**if i % n == 0:**

**print(i, ": is divisible by ",n)**

**10. WAP to check if given number is Perfect Number.**

**n = int(input("Enter a number: "))**

**sum\_of\_factors = 0**

**for i in range(1, n):**

**if n % i == 0:**

**sum\_of\_factors += i**

**if sum\_of\_factors == n:**

**print(n, "is a Perfect Number")**

**else:**

**print(n, "is not a Perfect Number")**

**11. WAP to check if given number Strong Number.**

**num = int(input("Enter a number: "))**

**quo = num**

**sum = 0**

**while quo != 0:**

**rem = quo % 10**

**quo = quo // 10**

**fact = 1**

**for i in range(2, rem+1):**

**fact \*= i**

**sum = sum + fact**

**if sum == num :**

**print(num,": is a Strong number")**

**else:**

**print(num, ": is not a Strong number")**

**12. WAP to print Armstrong number within a given range.**

**r = input("Enter range for armstrong number: ")**

**print("Armstrong number within range",r,"are :")**

**for num in range(1, int(r)):**

**size\_of\_num = len(str(num))**

**quo = int(num)**

**sum = 0**

**while quo != 0:**

**rem = quo % 10**

**quo = quo // 10**

**sum = sum + (rem \*\* size\_of\_num)**

**if sum == num:**

**print(num)**