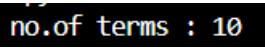8. Write a program to generate all the prime numbers using recursion
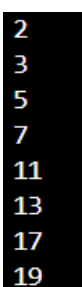
PROGRAM:

```python
def is_prime(n, i=2):
    if n <= 2:
        return True if n == 2 else False
    if n % i == 0:
        return False
    if i * i > n:
        return True
    return is_prime(n, i + 1)


def generate_primes(n):
    if n > 1:
        generate_primes(n - 1)
        if is_prime(n):
            print(n)


n=int(input("no.of terms: ")
generate_primes(n)
```

INPUT: no.of terms : 10

OUTPUT:
```
2
3
5
7
11
13
17
19
```

TIME COMPLEXITY :O(^n)