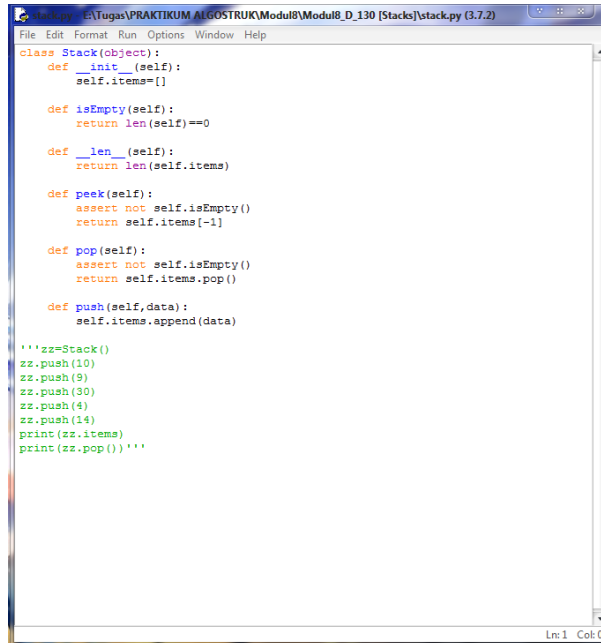


NAMA : PUJI NUGROHO
NIM : L200170123
KELAS : D
MODUL : 8

Class Stack



```
class Stack(object):
    def __init__(self):
        self.items=[]

    def isEmpty(self):
        return len(self)==0

    def __len__(self):
        return len(self.items)

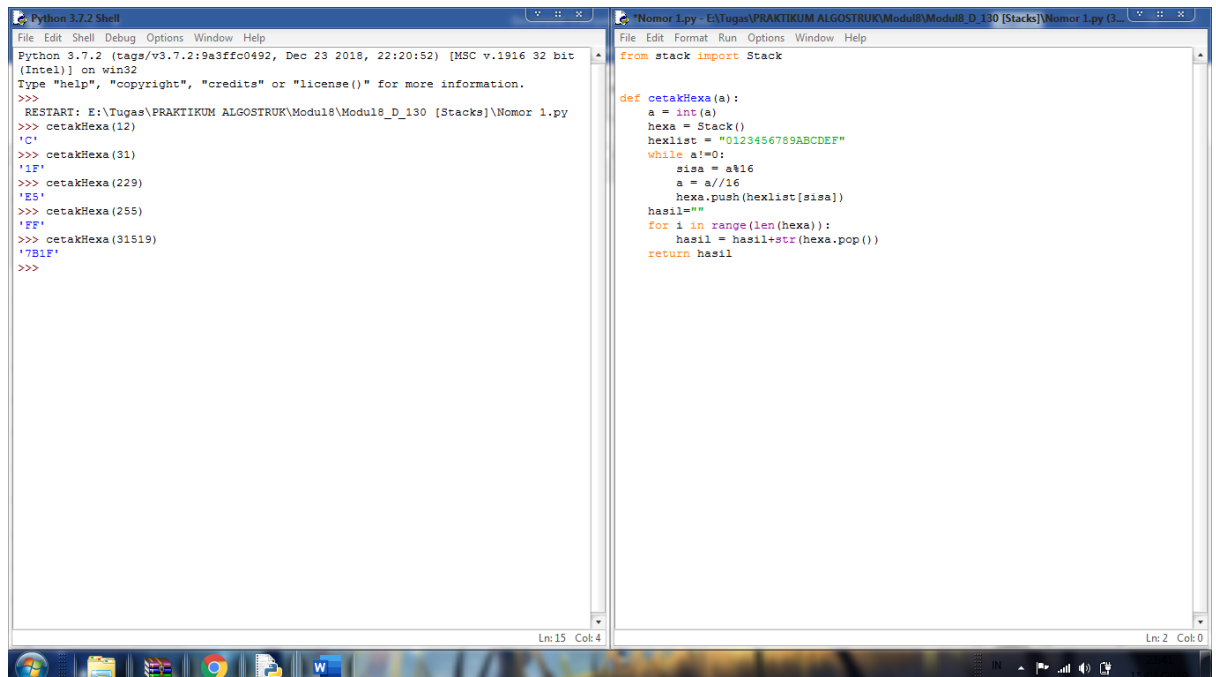
    def peek(self):
        assert not self.isEmpty()
        return self.items[-1]

    def pop(self):
        assert not self.isEmpty()
        return self.items.pop()

    def push(self, data):
        self.items.append(data)

'''zz=Stack()
zz.push(10)
zz.push(9)
zz.push(30)
zz.push(4)
zz.push(14)
print(zz.items)
print(zz.pop())'''
```

1.

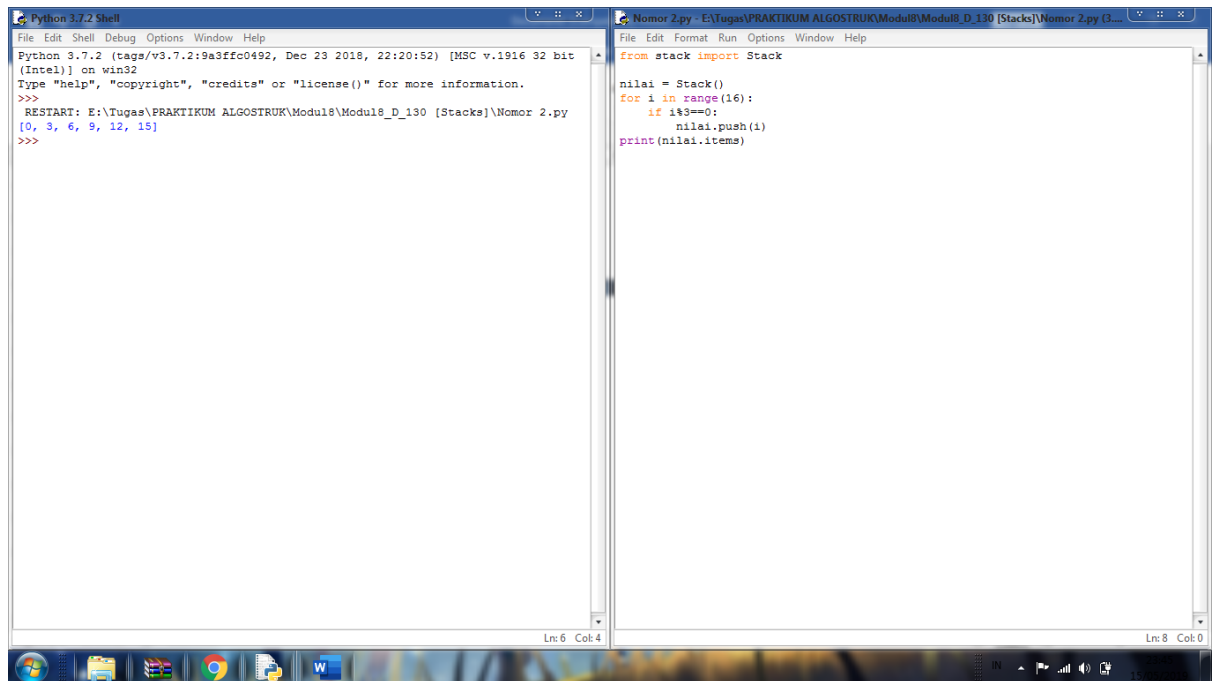


```
Python 3.7.2 Shell
Python 3.7.2 (tags/v3.7.2:9a3ffc0492, Dec 23 2018, 22:20:52) [MSC v.1916 32 bit (Intel)] on win32
Type "help", "copyright", "credits" or "license()" for more information.
>>>
RESTART: E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 1.py
>>> cetakHexa(12)
'12'
>>> cetakHexa(31)
'1F'
>>> cetakHexa(229)
'E5'
>>> cetakHexa(255)
'FF'
>>> cetakHexa(31519)
'7B1F'
>>>
```

```
Nomor 1.py - E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 1.py (3...
from stack import Stack

def cetakHexa(a):
    a = int(a)
    hexa = Stack()
    hexalist = "0123456789ABCDEF"
    while a!=0:
        sisa = a%16
        a = a//16
        hexa.push(hexalist[sisa])
    hasil=""
    for i in range(len(hexa)):
        hasil = hasil+str(hexa.pop())
    return hasil
```

2.



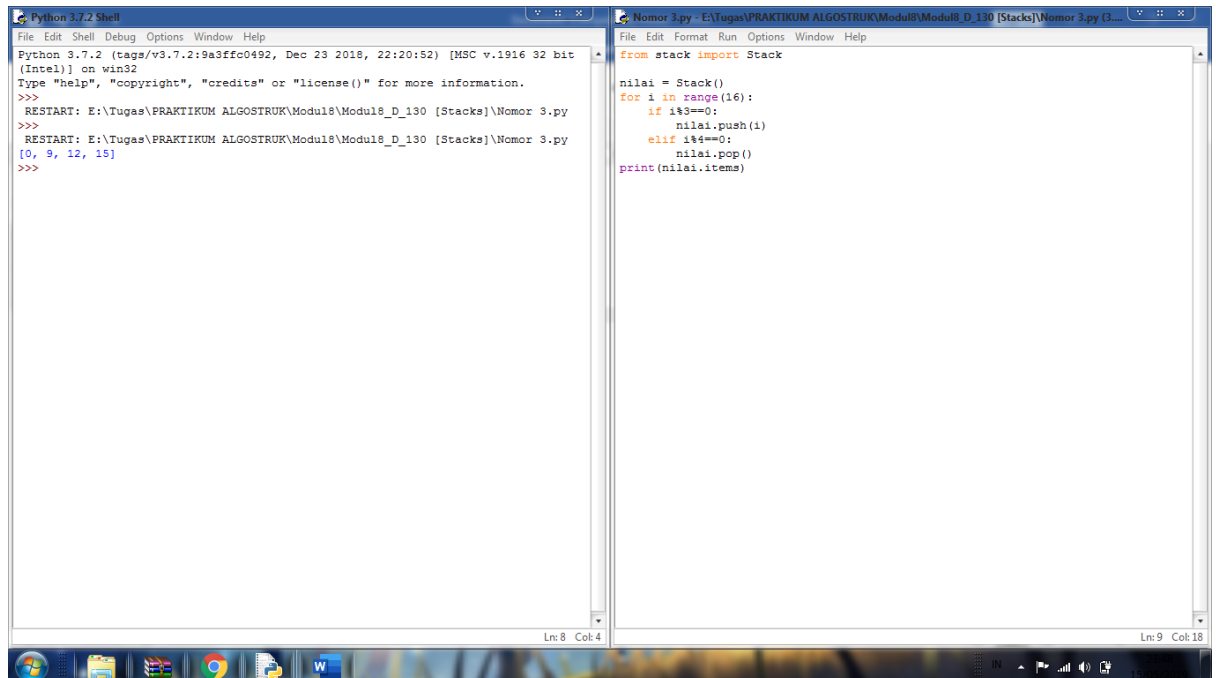
The screenshot shows a Windows desktop with two open windows. The left window is titled 'Python 3.7.2 Shell' and displays the Python interpreter's startup screen, including version information and a prompt. The right window is titled 'Nomor 2.py' and contains a Python script that imports the 'Stack' class from the 'stack' module, initializes a stack, and pushes the numbers 0 through 15 onto it. The taskbar at the bottom shows various icons, including the Start button, File Explorer, and several web browsers.

```
Python 3.7.2 Shell
File Edit Shell Debug Options Window Help
Python 3.7.2 (tags/v3.7.2:9a3ffc0492, Dec 23 2018, 22:20:52) [MSC v.1916 32 bit
(Intel)] on win32
Type "help", "copyright", "credits" or "license()" for more information.
>>>
RESTART: E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 2.py
[0, 3, 6, 9, 12, 15]
>>>
```

```
Nomor 2.py - E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 2.py (3...
File Edit Format Run Options Window Help
from stack import Stack

nilai = Stack()
for i in range(16):
    if i%3==0:
        nilai.push(i)
print(nilai.items)
```

3.



The screenshot shows a Windows desktop with two open windows. The left window is titled 'Python 3.7.2 Shell' and displays the Python interpreter's startup screen, including version information and a prompt. The right window is titled 'Nomor 3.py' and contains a Python script that imports the 'Stack' class from the 'stack' module, initializes a stack, and pushes the numbers 0 through 15 onto it. The taskbar at the bottom shows various icons, including the Start button, File Explorer, and several web browsers.

```
Python 3.7.2 Shell
File Edit Shell Debug Options Window Help
Python 3.7.2 (tags/v3.7.2:9a3ffc0492, Dec 23 2018, 22:20:52) [MSC v.1916 32 bit
(Intel)] on win32
Type "help", "copyright", "credits" or "license()" for more information.
>>>
RESTART: E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 3.py
>>>
RESTART: E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 3.py
[0, 9, 12, 15]
>>>
```

```
Nomor 3.py - E:\Tugas\PRAKTIKUM ALGOSTRUK\Modul8\Modul8_D_130 [Stacks]\Nomor 3.py (3...
File Edit Format Run Options Window Help
from stack import Stack

nilai = Stack()
for i in range(16):
    if i%3==0:
        nilai.push(i)
    elif i%4==0:
        nilai.pop()
print(nilai.items)
```