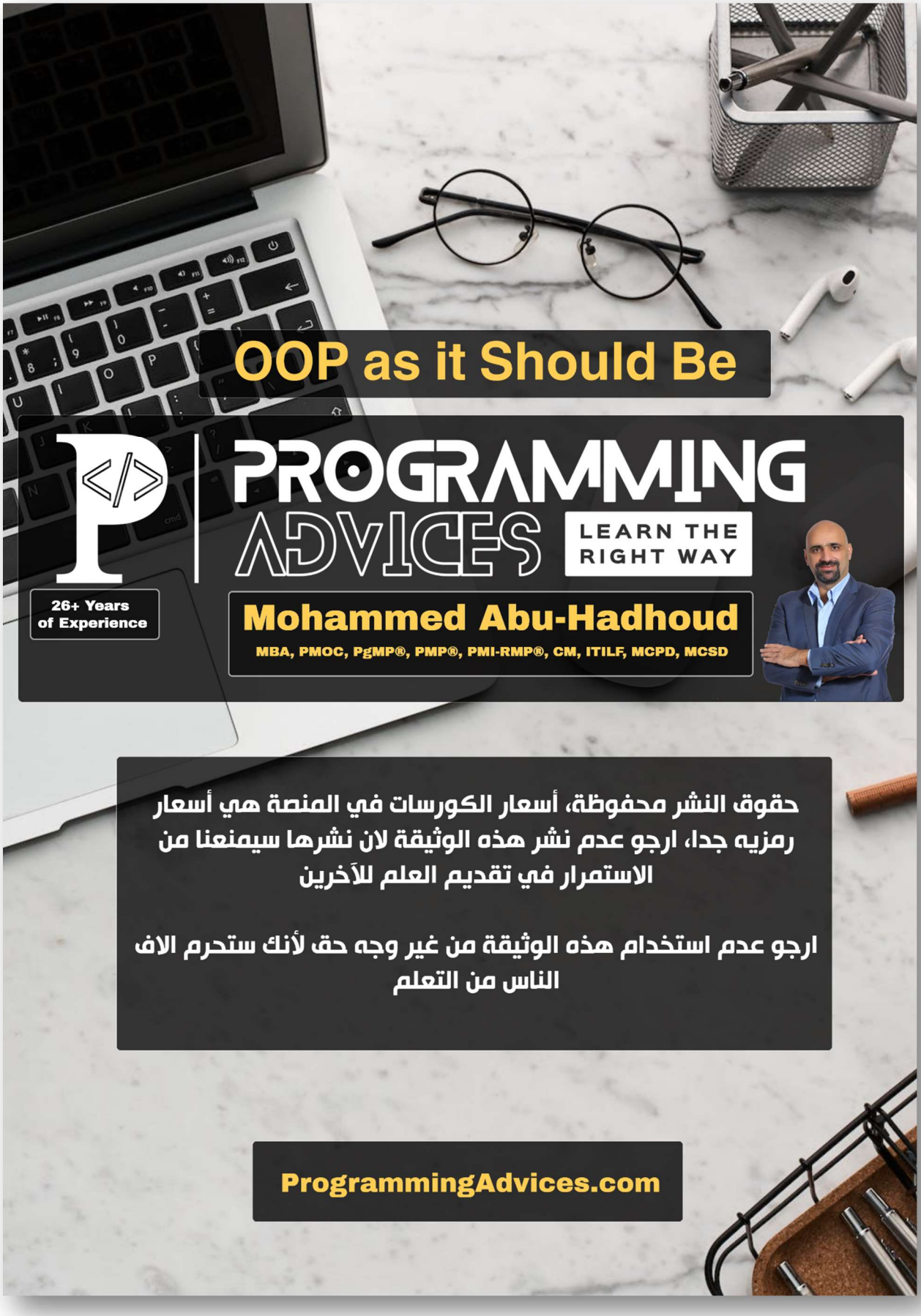
OOP as it Should Be
PROGRAMMING ADVICES
LEARN THE RIGHT WAY
26+ Years of Experience
Mohammed Abu-Hadhoud
MBA, PMOC, PgMP®, PMP®, PMI-RMP®, CM, ITILF, MCPD, MCSD
حقوق النشر محفوظة، أسعار الكورسات في المنصة هي أسعار رمزيه جدا، ارجو عدم نشر هذه الوثيقة لان نشرها سيمنعنا من الاستمرار في تقديم العلم للآخرين
ارجو عدم استخدام هذه الوثيقة من غير وجه حق لأنك ستحرم الاف الناس من التعلم
ProgrammingAdvices.com

```cpp
#include <iostream>

using namespace std;

class clsCalculator
{

private:

    float _Result = 0;
    float _LastNumber = 0;
    string _LastOperation = "Clear";
    float _PreviousResult = 0;

    bool _IsZero(float Number)
    {
        return (Number == 0);
    }

public:

    void Add(float Number)
    {
        _LastNumber = Number;
        _PreviousResult = _Result;
        _LastOperation = "Adding";
        _Result += Number;
    }

    void Subtract(float Number)
    {
        _LastNumber = Number;
        _PreviousResult = _Result;
        _LastOperation = "Subtracting";
        _Result -= Number;
    }
```

```
void Divide(float Number)
{

    _LastNumber = Number;

    if (_IsZero(Number))
    {
        Number = 1;
    }

    _PreviousResult = _Result;
    _LastOperation = "Dividing";
    _Result /= Number;
}

void Multiply(float Number)
{
    _LastNumber = Number;
    _LastOperation = "Multiplying";
    _PreviousResult = _Result;
    _Result *= Number;
}

float GetFinalResults()
{
    return _Result;
}

void Clear()
{
    _LastNumber = 0;
    _PreviousResult = 0;
    _LastOperation = "Clear";
    _Result = 0;
}
```

```
    void CancelLastOperation()
    {
        _LastNumber = 0;
        _LastOperation = "Cancelling Last Operation";
        _Result = _PreviousResult;
    }

    void PrintResult()
    {
        cout << "Result ";
        cout << "After " << _LastOperation << " " <<
_LastNumber << " is: " << _Result << "\n";
    }
};
```

```
int main()

{
    clsCalculator Calculator1;

    Calculator1.Clear();

    Calculator1.Add(10);
    Calculator1.PrintResult();

    Calculator1.Add(100);
    Calculator1.PrintResult();

    Calculator1.Subtract(20);
    Calculator1.PrintResult();

    Calculator1.Divide(0);
    Calculator1.PrintResult();

    Calculator1.Divide(2);
    Calculator1.PrintResult();

    Calculator1.Multiply(3);
    Calculator1.PrintResult();

    Calculator1.CancelLastOperation();
    Calculator1.PrintResult();

    Calculator1.Clear();
    Calculator1.PrintResult();

    system("pause>0");
    return 0;
}
```