# 43. Multiply Strings

## SOLUTION IN C++

class Solution {

public:

string multiply(string num1, string num2) {

string s(num1.length() + num2.length(), '0');

for (int i = num1.length() - 1; i >= 0; --i)

for (int j = num2.length() - 1; j >= 0; --j) {

const int mult = (num1[i] - '0') \* (num2[j] - '0');

const int sum = mult + (s[i + j + 1] - '0');

s[i + j] += sum / 10;

s[i + j + 1] = '0' + sum % 10;

}

const int i = s.find\_first\_not\_of('0');

return i == string::npos ? "0" : s.substr(i);

}

};