**3Sum closest**

Given an array *S* of *n* integers, find three integers in *S* such that the sum is closest to a given number, target. Return the sum of the three integers. You may assume that each input would have exactly one solution.

class Solution **{**

public int threeSumClosest**(**int**[]** nums**,** int target**)** **{**

Arrays**.**sort**(**nums**);**

int targ**=**nums**[**0**]+**nums**[**1**]+**nums**[**2**];** //Pick any combination of three elements

**for(**int i**=**0**;**i**<**nums**.**length**-**2**;**i**++){**

**if(**i**==**0 **||(**nums**[**i**-**1**]!=**nums**[**i**])){**

int low **=** i**+**1**,** hi**=**nums**.**length**-**1**;**

**while(**low**<**hi**){**

int sum **=**nums**[**i**]+**nums**[**low**]+**nums**[**hi**];**

**if(**Math**.**abs**(**target**-(**sum**))<**Math**.**abs**(**target**-**targ**)){** //Check the diference

targ**=(**nums**[**low**]+**nums**[**hi**]+**nums**[**i**]);**

**}else** **if** **(**sum**<**target**)** low**++;**

**else** hi**--;** //Move indices

**}**

**}**

**}**

**return** targ**;**

**}**

**}**