Problem Link:

<https://leetcode.com/problems/largest-triangle-area/description/?envType=daily-question&envId=2025-09-27>

Solution:

class Solution {

public:

double largestTriangleArea(vector<vector<int>>& points) {

int n = points.size();

double m = 0.0;

for(int i = 0; i < n; ++i)

{

for(int j = i + 1; j < n; ++j)

{

for(int k = j + 1; k < n; ++k)

{

vector<int>& a = points[i];

vector<int>& b = points[j];

vector<int>& c = points[k];

double area = 0.5 \* abs(

a[0] \* (b[1] - c[1]) +

b[0] \* (c[1] - a[1]) +

c[0] \* (a[1] - b[1])

);

m = max(m, area);

}

}

}

return m;

}

};