using System;

using System.Collections.Generic;

using System.Linq;

using System.Text;

using System.Threading.Tasks;

using System.Globalization;

using System.Diagnostics;

namespace ConsoleApp1

{

public class Program

{

// static void Main(string[] args)

//{

//int[] numbers = new int[5] { 1, 2, 3, 4, 5 };

////foreach (var item in numbers)

////{

//// Console.WriteLine(item);

////}

//for (int i = 0; i < numbers.Length; i++)

//{

// Console.WriteLine(numbers[i]);

//}

//string[] students = { "Rocky", "Leyla", "Tofiq" };

//string[] students2 = new string[] { "Rocky", "Leyla", "Tofiq" };

//Console.WriteLine(students2.Length);

//students[0] = "Arif";

//foreach (var student in students)

//{

// Console.WriteLine(student);

//}

// string[] students = { "Rocky", "Leyla", "Tofiq" };

//string[] students2 = students;

//Console.WriteLine(students[0]);

//students2[0] = "Salam";

//Console.WriteLine(students[0]);

//var stud\_clone = students.Clone() as string[];

//students[0] = "Salam";

//if(stud\_clone != null)

//{

// foreach (var item in stud\_clone)

// {

// Console.WriteLine(item);

// }

//}

//var obj = students.Clone();

//if(obj is string[] stud\_clone)

//{

// foreach (var item in stud\_clone)

// {

// Console.WriteLine(item);

// }

//}

//else

//{

// Console.WriteLine("i can not convert");

//}

//string[] fruits = { "Apple", "PineApple", "Mango", "Pumela" };

//string[]copy=new string[fruits.Length];

//Array.Copy(fruits, 0, copy, 0, fruits.Length);

//foreach (var item in copy)

//{

// Console.WriteLine(item);

//}

//Array.Resize(ref fruits, fruits.Length + 1);

//var f = Console.ReadLine();

//fruits[fruits.Length - 1] = f;

//foreach (var item in fruits)

//{

// Console.Write($"{item} ");

//}

//string[] fruits = { "Apple", "Mango" };

//Console.WriteLine(fruits[0]);

//ChangeData(ref fruits);

//Console.WriteLine(fruits[0]);

// }

// static void ChangeData(ref string[] fruits)

// {

// //fruits[0] = "Salam";

// fruits = null;

// }

//static void Main(string[] args)

//{

// //int[] arr = { 1, 2, 3, 4, 5 };

// //var newArray = RemoveAt(arr, 3);

// //foreach (var item in newArray)

// //{

// // Console.WriteLine(item);

// //}

// //Reserve(10) =>array

// //InitArray(array) //1 ve 100 random

// //PrintArray(array)

// //GetSumOfEven(array)=>sum

// // Random random = new Random();

// // var result=random.Next(1, 200);

//}

//private static int[] RemoveAt(int[] source, int index)

//{

// int[] destination = new int[source.Length - 1];

// if (index > 0)

// {

// Array.Copy(source, 0, destination, 0, index);

// }

// if (index < source.Length - 1)

// {

// Array.Copy(source, index + 1, destination, index, source.Length - index - 1);

// }

// return destination;

//}

static void Main(string[] args)

{

//MultiDimensional Arrays

//1. Rectangular

//2. Jagged Array

//int[,] myarr = new int[3, 2]

//{

// {1,2},

// {3,4},

// {4,5},

//};

//foreach (var item in myarr)

//{

// Console.WriteLine(item);

//}

//Console.WriteLine(myarr.Rank);

//for (int i = 0; i < 3; i++)

//{

// for (int k = 0; k < 2; k++)

// {

// Console.Write($"{myarr[i,k]} ");

// }

// Console.WriteLine();

//}

//JAGGED ARRAY

//int[][] jaggedArray = new int[2][]

//{

// new int[2]{1,2},

// new int[5]{5,6,7,8,9}

//};

//int[][] jaggedArray = new int[2][];

//jaggedArray[0] = new int[3] { 1, 2, 3 };

//jaggedArray[1] = new int[3] { 1, 2, 5 };

//foreach (var array in jaggedArray)

//{

// foreach (var item in array)

// {

// Console.Write($"{item} ");

// }

// Console.WriteLine();

//}

// int[] numbers = new int[100000000];

// for (int i = 0; i < numbers.Length; i++)

// {

// numbers[i] = i + 1;

// }

// Stopwatch stopwatch = new Stopwatch();

// stopwatch.Start();

//// var index=Array.IndexOf(numbers, 99999999);

//// var index=Array.BinarySearch(numbers, 99999999);

// stopwatch.Stop();

// Console.WriteLine("Elapsed Time is {0} ms", stopwatch.ElapsedMilliseconds\*1000);

//var index=Array.IndexOf(numbers, 33);

//Console.WriteLine(index);

//Array.Sort(numbers);

//foreach (var item in numbers)

//{

// Console.WriteLine(item);

//}

//var index = Array.BinarySearch(numbers, 5);

//Console.WriteLine(index);

}

}

}