Logger.cs

using System;

public class Logger

{

    private static Logger instance;

    private Logger()

    {

        Console.WriteLine("Logger instance created.");

    }

    public static Logger GetInstance()

    {

        if (instance == null)

        {

            instance = new Logger();

        }

        return instance;

    }

    public void Log(string message)

    {

        Console.WriteLine("Log: " + message);

    }

}

Program.cs

using System;

class Program

{

    static void Main(string[] args)

    {

        Logger logger1 = Logger.GetInstance();

        logger1.Log("First log message");

        Logger logger2 = Logger.GetInstance();

        logger2.Log("Second log message");

        if (logger1 == logger2)

        {

            Console.WriteLine("Both logger1 and logger2 are the same instance.");

        }

        else

        {

            Console.WriteLine("Different instances! Singleton failed.");

        }

    }

}

Output

