using System.Collections;

using System.Collections.Generic;

using UnityEngine;

using UnityEngine.UI;

public class HotFluidOutTemp : MonoBehaviour

{

public HotFluidInputTemp HotFluidInputTempVal;

public Text HotFluidOutputText;

public ColdFluidInputTemp ColdFluidInputTempVal;

public HotFluidFlowRate HotFluidFlowRateVal;

public ColdFluidFlowRate ColdFluidFlowRateVal;

private double HotFluidInputTempValue = 0f;

private double ColdFluidInputTempValue = 0f;

private double HotFluidFlowRateValue = 0f;

private double ColdFluidFlowRateValue = 0f;

public double HotFluidOutputVal;

public double Qdot;

public double feedflow; // kg/s

public GameObject feed\_script;

// public double[] Tcout\_guess = new float[201];

// public float[] Thout\_guess = new float[201]

// public float[] Qdot\_guess = new float[201]

// public float[] Qdiff = new float[201]

// Start is called before the first frame update

void Start()

{

//for (int i = 0; i < 202; i++)

// {

// Tcout\_guess[i] = 100 + 0.5d\*i; // List of values that Tcout can have

// }

}

// Update is called once per frame

void Update()

{

if ((HotFluidInputTempVal != null) && (ColdFluidInputTempVal != null))

{

HotFluidInputTempValue = HotFluidInputTempVal.HotFluidInputTempVal;

ColdFluidInputTempValue = ColdFluidInputTempVal.ColdFluidInputTempVal;

HotFluidFlowRateValue = HotFluidFlowRateVal.HotFluidFlowRateVal;

ColdFluidFlowRateValue = ColdFluidFlowRateVal.ColdFluidFlowRateVal;

feedflow = feed\_script.GetComponent<feed\_script>().F0set;

// Qdot = 4184d\*feedflow\*()

HotFluidOutputVal = HotFluidInputTempValue \* HotFluidFlowRateValue + ColdFluidInputTempValue \* ColdFluidFlowRateValue;//placeholder function

HotFluidOutputText.GetComponent<Text>().text = "Hot Fluid Output Temperature: " + HotFluidOutputVal + " Kelvin";

}

}

}