



Xiaoxiao Qin <xaqin@ucdavis.edu>

First assignment

2 messages

Kwan-Liu Ma <ma@cs.ucdavis.edu>
To: Xiaoxiao Qin <xaqin@ucdavis.edu>
Cc: Joseph Kotlarek <jtkotlarek@gmail.com>

Tue, Jun 18, 2019 at 11:57 AM

Xiaoxiao:

Your first homework assignment is given below.
When done, submit your program to Joseph and me.

Cheers,
Kwan-Liu

Homework 1

This first homework assignment serves as an introduction to Unity programming and data visualization.

A network or graph consists of nodes and links/edges which connect some of the nodes to represent particular relations of interest among them. Many fields of study such as social science, biological science, and cyber security produce and exploit network data. Visualize the provided network utilizing all of its node data (id, group, color, position). The due date for this assignment is 10 days after it is assigned. We will grade it on a desktop computer.

- The Dataset: [Lesmis-3d.json](#)
- The visualization should render every node in the correct position and color, and every edge properly connecting each node.
- The visualization should be interactive in two ways:
 - The user must be able to rotate the network in 3D space. The more intuitive and smooth the rotation is, the better.
 - The user must be able to hover over a node with the cursor to see the ID of the node (which should be positioned in a readable location near the node to which it belongs).
- The following tutorials/documentation may help you complete this task:
 - [Materials](#)
 - [Quaternions](#) / [Rotation and Orientation in Unity](#)
 - [UI Components](#)
 - [JsonUtility](#)
- The following tutorials/documentation are listed for reference, if you don't have any previous Unity experience:
 - [Download Unity3D](#) (Unity Hub and the latest version of Unity3D is recommended)
 - [Setting up Git with Unity using SourceTree](#)
 - Alternately: [How to Git with Unity](#)
 - [Using the Unity Interface](#)
 - [Essential Unity Concepts](#)
 - [Beginner Gameplay Scripting](#)
 - [Intermediate Gameplay Scripting](#)

Xiaoxiao Qin <xaqin@ucdavis.edu>
To: Kwan-Liu Ma <ma@cs.ucdavis.edu>
Cc: Joseph Kotlesek <jtkotlesek@gmail.com>

Tue, Jun 18, 2019 at 11:59 AM

Professor Ma,

Got it!

Thank you,

Best,
Xiaoxiao

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