Refugeesimulation

Interactive Simulation WS15/16
Project Proposal

Markus Hofmann
University of Augsburg
markus.hofmann@student.uni-augsburg.de

Alexander Oks
University of Augsburg
alexander.oks@student.uni-augsburg.de

ABSTRACT
With our refugee-simulator we want to illustrate the flows of refugees in Europe according to decisions the user can take in some dialogues. In these he will get asked several questions about the current policy in Germany and policy towards Europe. It will all be displayed on an interactive map in 2D.

1. MOTIVATION
For about a year more and more refugees escapes from their homeland to take refuge in Europe. They are coming from countries like Syria in which war or civil war prevails. But also countries without war are affected. For example refugees from the Balkan States are coming to Europe caused by the bad financial situation. Driven by poverty and/or their fear of life they all their few belongings behind to find a better place to improve the standard of living. At the moment many thousand of refugees are arriving Europe. Hence this subject is often discussed lately. With our simulation we want to inform the user about potential causes and possible approaches of huge refugee flows arriving Germany and adjoining countries. Therefore we want to create fictitious "what-if"-scenarios, where the user can choose between many decisions about the refugee- and the general policy in their country to avoid a bigger crises.

2. CONCEPT IDEA
The user assumes the role of a head of state. He/she has to make decisions concerning internal, foreign and economic policy. Those decisions have influence on the people of the users country and on the other countries in the world which can lead to emerging refugee flows. The user has to decide what happens to the refugees which arrive at his country.

3. PROJECT REQUIREMENTS
In our simulation there should be four aspects that have to be involved.

3.1 Science
General refugee policy
The user in his role as described in section 2 have to take many several decisions about the general refugee policy. For simplification only the decision-making for Germany and ruling from the European Parliament will take place. Therefore the president or similar will be confronted with questions like which people are allowed to come to their country. Thereby it has to be considered if they are coming from a country in which war or civil war is already being waged or are they coming from a so called "save place", where there is more or less poverty but no acts of war (see 3.3). Of course we can not foretell how many refugees will arrive Europe on the long term. Accordingly we will make use of current mean values of refugee flows.

Financial policy
For some calculations the financial policy of a country or a state is very important. Germany for example have to spend up to ten billion euro for refugees, if they stay one year [2].

//TODO

Internal and foreign policy
//TODO

3.2 Gamification
In order to keep the user interested we define some main goals. One of the goals is to keep your citizens happy. The user also has to manage the finances of his/her country and manage the number of refugees. To accomplish those goals the user has to answer dialogs which occur on a regularly basis but also at some randomly generated special events.

3.3 Complexity
One of the most important parts of this project is simulating how refugee flows emerge, where they come from how they behave. In order to simulate those points we want to classify the countries in the world by the attributes happiness, poverty, starvation and state of war. Based on those attributes Refugee flows emerge and start moving around the map.

3.4 Aesthetics

The aesthetical experience is based on a 2D-world map which shows countries and their basic attributes (3.3). Furthermore we want to display refugee flows on the world map. They are represented visually either by dots, arrows or 2D sprites which move from one country to another on the world map. The user is interacting through dialogs which pop up as described in 3.2. A question and a set of answers are displayed inside of the up-popping windows.

4. CONZEPT USER-EXPERIENCE

//TODO

5. TIMELINE

We want to collect information about the topic till mid of November and come up with a logic model that represents the collected information as good as possible till end of November. In that time we also want to familiarize ourselves with Unity3D. Until mid of December we want to implement our model and build a prototype without focusing on the graphical aspect of the simulation. Until beginning of January we want to include graphical components and make last adjustments to the simulation. In the last weeks left we want to focus on working on our project report and prepare our presentation.

6. REFERENCES

[1] C. Holzmann and S. Oppl. Bluetooth in a nutshell. Website, 2003. zuletzt gesehen: 18.02.2015.

[2] M. Weingartner and P. Plickert. Asylbewerber kosten bis zu 10 milliarden euro. Website, 2015. visited on Okt. 24, 2015.