Multi-agent simulation for improving alcohol vending inside bars/dance clubs

Project Robots everywhere (0LAUK0), group 7

Wietske Blijjenberg, Jasper Dellaert, Daan Schalk, Sanne van Wijk, Job Willems

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PART I: Problem Statement

Describe the problem + objectives

Describe our 'product'

　　　Should be short

　　　How does it help our situation

Client and user.

Describe what other parties are interested

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PART I: Requirements and Constraints

List important requirements and constraints

    Explain in short why these are important

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PART II: State-of-the-art

Explain research topic

    Explain some of them here

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PART II: Problem Dissection & Research Results

List all our research topics (bar/patron components)

    Give important results here

    Show (with color or symbol) if component is used in simulation

        Explain why component should(n't) be in the simulation

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PART II: Problem Dissection & Research Results

Continue last page

Alcohol and social structures should fit here

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PART III: Simulation approach

Language: Java

Real-time visualization: Java swing

Result visualization: MATLAB

Short description:

Explain order:

Changeable parameters are loaded in. simulation runs in time segments of half minutes, meanwhile visualization provided. At end, all data stored to be read by Matlab

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PART III: Patron state

Shortly explain patron states

  States determine the intentions of the patrons

  Patron can only switch states when variable thresholds have been met

[state-diagram here]

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PART III: Simulation variables

List all used important variables, shortly explain how they affect the simulation

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PART III: Simulation in action

[video/ screenshots of simulation]

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PART IV: Results

[MATLAB results]

Explain result trends from few variables

!!!! Show income with and without tweaked parameters !!!!

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PART IV: Conclusion (& Discussion?)

Main conclusions, listed as changes to simulation variables

Discussion

     Could have done with more research data such as patron surveys

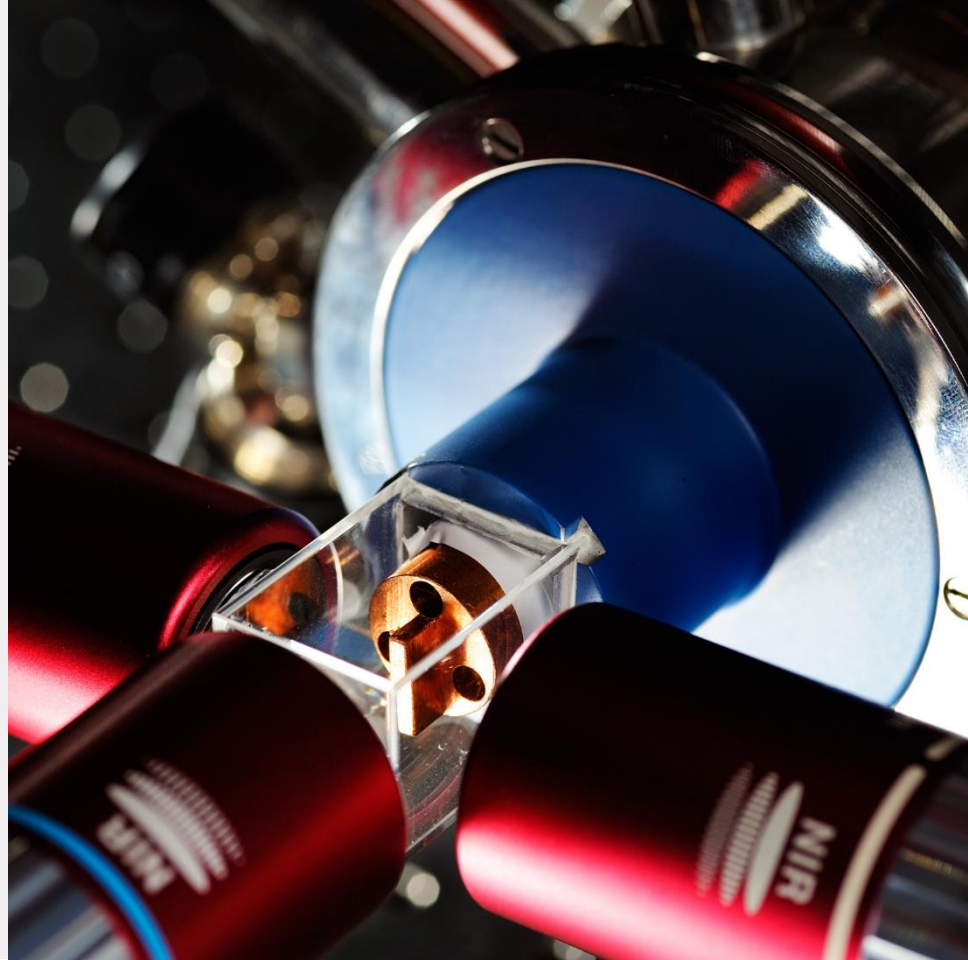   With more time, could have added more complex behavior/ more environmental elements

          For example: complex patron grouping and mingling behaviour

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Example of a text slide in two columns

- Example of an enumeration. This is fake text for illustration. Sitei labores appetere corrumpit, animal urbanitas sit ea.

- Example of a second enumeration. This is fake text for illustration. Sitei labores appetere. Qui intellegat mnesarchum.

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Chapter title of the presentation over two lines

Headline of a text slide with enumeration

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Sample slide with table and text

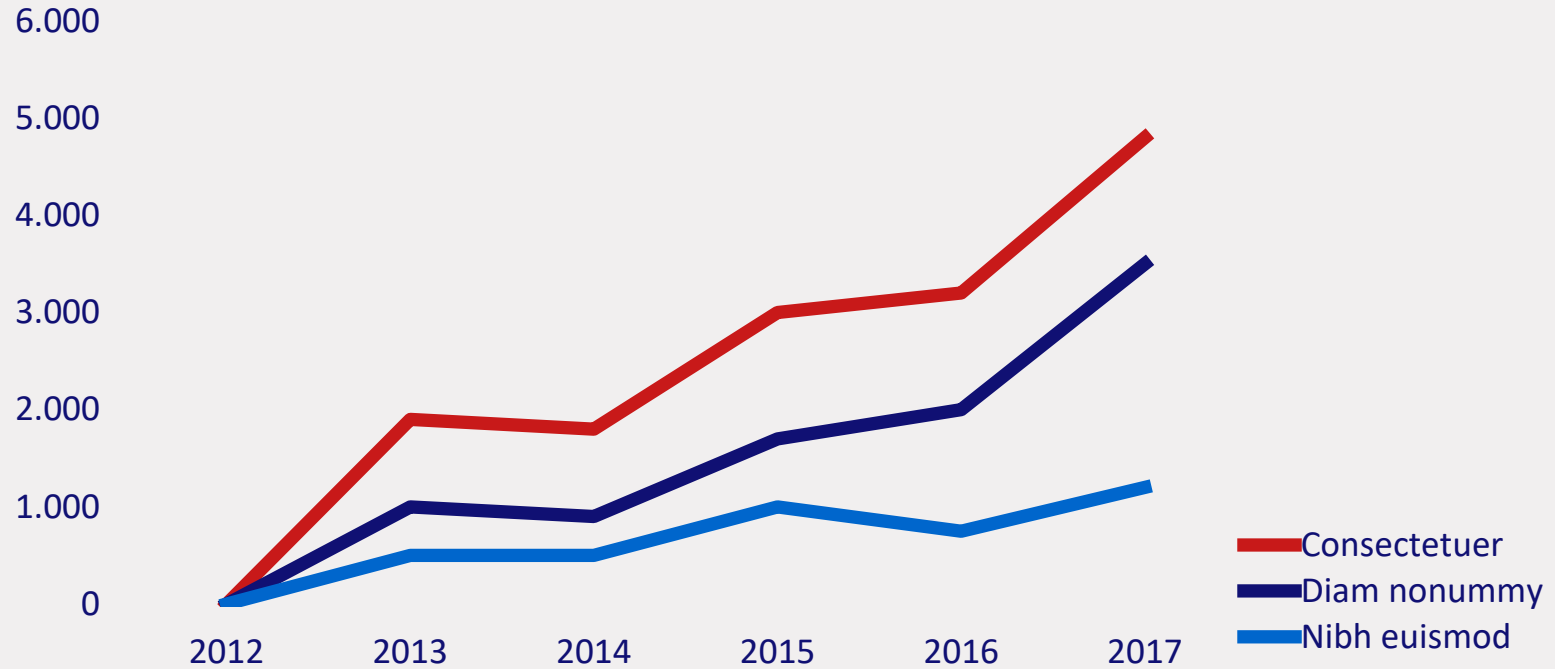| Description	2013	2014	2015	2016	2017
Item 1	920.000	1.120.000	1.055.000	1.200.000	1.330.000
Item 2	905.000	1.105.000	1.045.000	1.050.000	1.230.000
Item 3	916.000	1.116.000	1.046.000	1.120.000	1.300.000

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Sample slide with table and text

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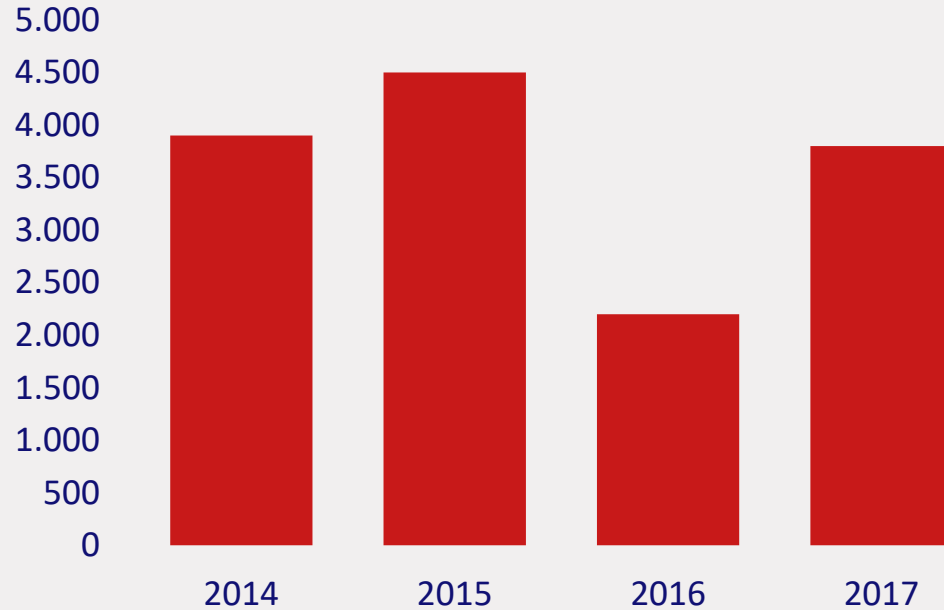
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Example chart - Line

Example chart - Pie

- ■ Consectetuer adipiscing
- ■ Sed diam nonummy
- ■ Nibh euismod
- ■ Tincidunt ut laoreet
- ■ Dolore magna aliquam
- ■ Erat volutpat

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Example chart - Column

Title of the presentation – by tab Insert -> Header text and Footer text

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Example chart - Column

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