Mouse-Wheel-controlled resizing of text passages

Lukas Lamm, David Lechler, , ITT, SS14

1. Idea

The idea of our implemented interaction technique is to simplify and speed up text formattig. Often text needs to be formatted to improve readability and to structure content. Therefor we implemented a simple Text-Editor where users can input text of their choice. Using linebreaks the text is divided into paragraphs. To set different font sizes for each paragraph one needs to mark a text passage and select an appropriate font-size. To speed up this process and to simplify the interaction we decided to give users the ability to hover over text passages and select the appropriate font-size by using the mouse wheel. To give users feedback about the currently selected font-size a spherical widget shows up in the top right corner of the text editor when users scroll up or down.

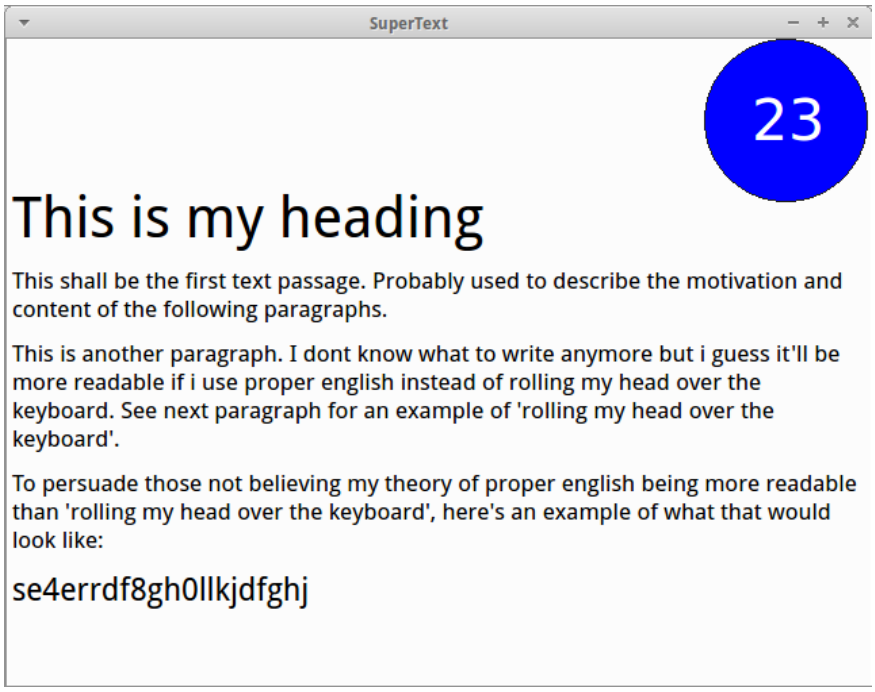

Illustration 1: Screenshot of the executed python script.

2. Advantages & limitations

The advantage of our implementation is a faster resizing of text passages without inconvenient marking paragraphs, pointing and selecting a appropriate text size.
A limitation of the demo application is that it is not possible to scroll longer text with the mousewheel.

Find a type of human-computer interaction that could be made more efficient or less error-prone. Invent an interaction technique
(or find one in HCI publications) that provides an advantage over traditional GUI interaction.

Examples:

- buttons that show a preview of the result of their action when you hover over them (e.g., for formatting text)
- checkboxes that can be toggled by dragging the mouse cursor across them
- scrollbars that can be set to automatically and slowly scroll down in order to ease reading
- …

Provide a **one-page** description of your novel interaction technique which may consist of illustrations, text, screenshots, etc. Shortly discuss advantages and limitations of the interaction technique.
Hand in the following file:
interaction_technique.pdf: a PDF document with a description of your interaction technique.

Points

- 2 Document handed in, contains text and image(s), well written and illustrated.
- 2 Novelty of interaction technique.
- 1 Adequate discussion of properties of the interaction technique.

Our ideas:

- kleiner Rechner bei dem Zahlen über Mausrad geändert werden können und sich die Berechnung autom. aktualisiert (wie vom Wimmer vorgeschlagen)
- Mausgesten zur Formatierung von Text
- Umsetzung von einem der obigen Beispielen…
- Vergrößern/Verkleinern von Text durch Mausrad