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## Exercise #11 Generating Substrates

Group:

Email typed exercises:

To: *mackay@lri.fr; mbl@lri.fr*

Subject: *<last name> FSI: Ex #11: Generative Design*

Topic: *Text editing*

Brainstorm different ways of using the principles of reification, polymorphism and reuse to create new, more powerful ways of editing text. Can you create tools that do not require the user to first select the desired text and before applying a command such as Bold? Can you think of new, more powerful instruments or substrates?

1. Think of a new, more powerful instrument or substrate that lets users modify text. Describe your idea.

2. Explain how your idea embodies the design principles we have discussed in class. Remember that *reification* means taking an action or command and turning it into an interactive tool. *Polymorphism* allows the new tool to act on multiple types of graphical objects (or other digital objects). *Reuse* allows the user to reuse some aspect of the way the tool was previously used (input reuse) or the results of using the tool (output reuse). Does your system have a substrate? How do users discover your system? Appropriate it for different purposes? Can the user create expressive output by changing how they interact with it? Apply what you learned from the previous exercises.

Reification: \_\_\_\_\_

Polymorphism: \_\_\_\_\_

Reuse: \_\_\_\_\_

Substrates: \_\_\_\_\_

Discovery: \_\_\_\_\_

Appropriability: \_\_\_\_\_

Expressivity: \_\_\_\_\_