Exercises

$\langle 2 \rangle$ 1. Which of the following statements hold?

    (a) $\mathsf{B}xyz \xrightarrow{\mathsf{lo}}{}^* x(yz)$

    (b) $\mathsf{Y}x \xrightarrow{\mathsf{lo}}{}^* x(\mathsf{Y}x)$

$\langle 2 \rangle$ 2. Prove that the Y combinator has no normal form.

$\langle 3 \rangle$ 3. Which of the following statements hold?

    (a) $\mathsf{SB}(\mathsf{KI}) \leftrightarrow^* \mathsf{KI}$

    (b) $\mathsf{SKK}x \leftrightarrow^* \mathsf{I}x$

    (c) $\mathsf{SII}(\mathsf{SII}) \leftrightarrow^* \mathsf{Y}$