Exercise 15 Give $B_P$ for $P$ as in Example 1.2.19. How many elements does $I_P$ have?

Exercise 16 For the program $P$ in Example 1.2.18, compute the following.

(a) $T_P(\{p(c), q(c, c)\})$

(b) $T_P(B_P)$

Exercise 17 With respect to Example 1.2.18, verify that $B_P$ is a pre-fixed point of $T_P$.

Exercise 18 Give three pre-fixed points and one fixed point of the $T_P$-operator for $P$ as in Exercise 14.

Exercise 19 Compute $T_P \uparrow n$ for all $n \in \mathbb{N}$ and $T_P \uparrow \omega$ for $P$ as in Example 1.2.19.

Exercise 20 Compute $T_P \uparrow n$ for all $n \in \mathbb{N}$ and $T_P \uparrow \omega$ for $P$ as in Exercise 14.

Exercise 21 Compute $T_P \uparrow n$ for all $n \in \mathbb{N}$ and $T_P \uparrow \omega$ for $P$ as in Exercise 9.

Exercise 22 Compute $T_P \uparrow n$ for all $n \in \mathbb{N}$ and $T_P \uparrow \omega$ for $P$ as in Example 1.2.8.

Exercise 23 Compute $T_P \uparrow n$ for all $n \in \mathbb{N}$ and $T_P \uparrow \omega$ for $P$ as in Example 1.2.7.