

**Problem 4.15.** Show that the problem of determining whether a CFG generates all strings in  $1^*$  is decidable. In other words, show that  $\{\langle G \rangle \mid G \text{ is a CFG over } \{0, 1\} \text{ and } 1^* \subseteq L(G)\}$  is a decidable language.

*Proof.*

□