STACK-EMPTY(S)

1 **if** $S.top == 0$
2   **return** TRUE
3 **else return** FALSE

PUSH(S, x)

1 **if** $S.top == S.size$
2   **error** "overflow"
3 **else** $S.top = S.top + 1$
4      $S[S.top] = x$

POP(S)

1 **if** STACK-EMPTY(S)
2   **error** "underflow"
3 **else** $S.top = S.top - 1$
4   **return** $S[S.top + 1]$