

Application of Stack

Evaluation of postfix expression:

Algorithm

- 1) Add) to postfix expression.
- 2) Read postfix expression Left to Right until) encountered
- 3) If operand is encountered, push it onto Stack
[End If]
- 4) If operator is encountered, Pop two elements
 - i) A -> Top element
 - ii) B-> Next to Top element
 - iii) Evaluate B operator A
push B operator A onto Stack
- 5) Set result = pop
- 6) 6) END

Expression: 456*+

INPUT SYMBOL	STACK	CALCULATION
4	4	
5	4 5	
6	4 5 6	
*	4	5*6=30
+	4 30	4+30=34

RESULT=34