Evaluae 623+-382/+\*2$3+

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Postfix | op1 | op1 | Result | opndstack |
| 6 |  |  |  | 6 |
| 2 |  |  |  | 6,2 |
| 3 |  |  |  | 6,2,3 |
| + | 2 | 3 | 5 | 6,5 |
| - | 6 | 5 | 1 | 1 |
| 3 |  |  |  | 1,3 |
| 8 |  |  |  | 1,3,8 |
| 2 |  |  |  | 1,3,8,2 |
| / | 8 | 2 | 4 | 1,3,4 |
| + | 3 | 4 | 7 | 1,7 |
| \* | 1 | 7 | 7 | 7 |
| 2 |  |  |  | 7,2 |
| $ | 7 | 2 | 49 | 49 |
| 3 |  |  |  | 49,3 |
| + | 49 | 3 | 52 | 52 |

Convert into potfix and evaluate

A+B-(C\*D) /E

where A = 4, B = 1 , C = 8 , D = 5 , E = 1

→ A+B-CD\*/E

A+B-CD\*E/

AB+-CD\*E/

AB+CD\*E/-

Evalutate $\*-A+BCD+EF 6,1,2,3,2,1

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Prefix | op1 | op2 | result | opndstack |
| 1 |  |  |  | 1 |
| 2 |  |  |  | 1,2 |
| + | 1 | 2 | 3 | 3 |
| 3 |  |  |  | 3,3 |
| 2 |  |  |  | 3,3,2 |
| 1 |  |  |  | 3,3,2,1 |
| + | 2 | 1 | 3 | 3,3,3 |
| 6 |  |  |  | 3,3,3,6 |
| - | 6 | 3 | 3 | 3,3,3 |
| \* | 3 | 3 | 9 | 3,9 |
| & | 9 | 3 | 729 | 729 |

Convert ((A-(B+C))\*D)$(E+F)

|  |  |  |
| --- | --- | --- |
| infix | postfix | opsstack |
| ( |  | ( |
| ( |  | (,( |
| A | A | (,( |
| - | A | (,(,- |
| ( | A | (,(,-,( |
| B | AB | (,(,-,( |
| + | AB | (,(,-,(,+ |
| C | ABC | (,(,-,(,+ |
| ) | ABC+ | (,(,-,( |
| ) | ABC+- | (, |
| \* | ABC+- | (,\* |
| D | ABC+-D | (,\* |
| ) | ABC+-D\* |  |
| $ | ABC+-D\* | $ |
| ( | ABC+-D\* | $,( |
| E | ABC+-D\*E | $,( |
| + | ABC+-D\*E | $,(,+ |
| F | ABC+-D\*EF | $,(,+ |
| ) | ABC+-D\*EF+ | $ |
|  | ABC+-D\*EF+$ |  |