
```

syms s;
syms V;
matA = [2*s, -s, 0, -s;...
        -s, (s + 1/s), (-1/s), 0;...
        0, (-1/s), (2/s + 1), -1;...
        -s, 0, -1, (2*s+1)];
disp(matA);
matB = [V;0;0;0];
disp(matB);
currents = matA\matB;
disp(currents)
I3 = currents(3);
disp(I3)

[ 2*s,      -s,      0,      -s]
[ -s, s + 1/s,      -1/s,      0]
[  0,      -1/s, 2/s + 1,      -1]
[ -s,      0,      -1, 2*s + 1]

V
0
0
0

(2*V*s^4 + 4*V*s^3 + 4*V*s^2 + 2*V*s + V)/(s*(s^4 + 2*s^3 + 3*s^2 +
3*s + 2))
(s*(2*V*s^2 + 4*V*s + 3*V))/(s^4 + 2*s^3 + 3*s^2 +
3*s + 2)
(V*s*(s^2 + 2*s + 2))/(s^4 + 2*s^3 + 3*s^2 +
3*s + 2)
(V*(s^3 + 2*s^2 + 2*s + 1))/(s^4 + 2*s^3 + 3*s^2 +
3*s + 2)

(V*s*(s^2 + 2*s + 2))/(s^4 + 2*s^3 + 3*s^2 + 3*s + 2)

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