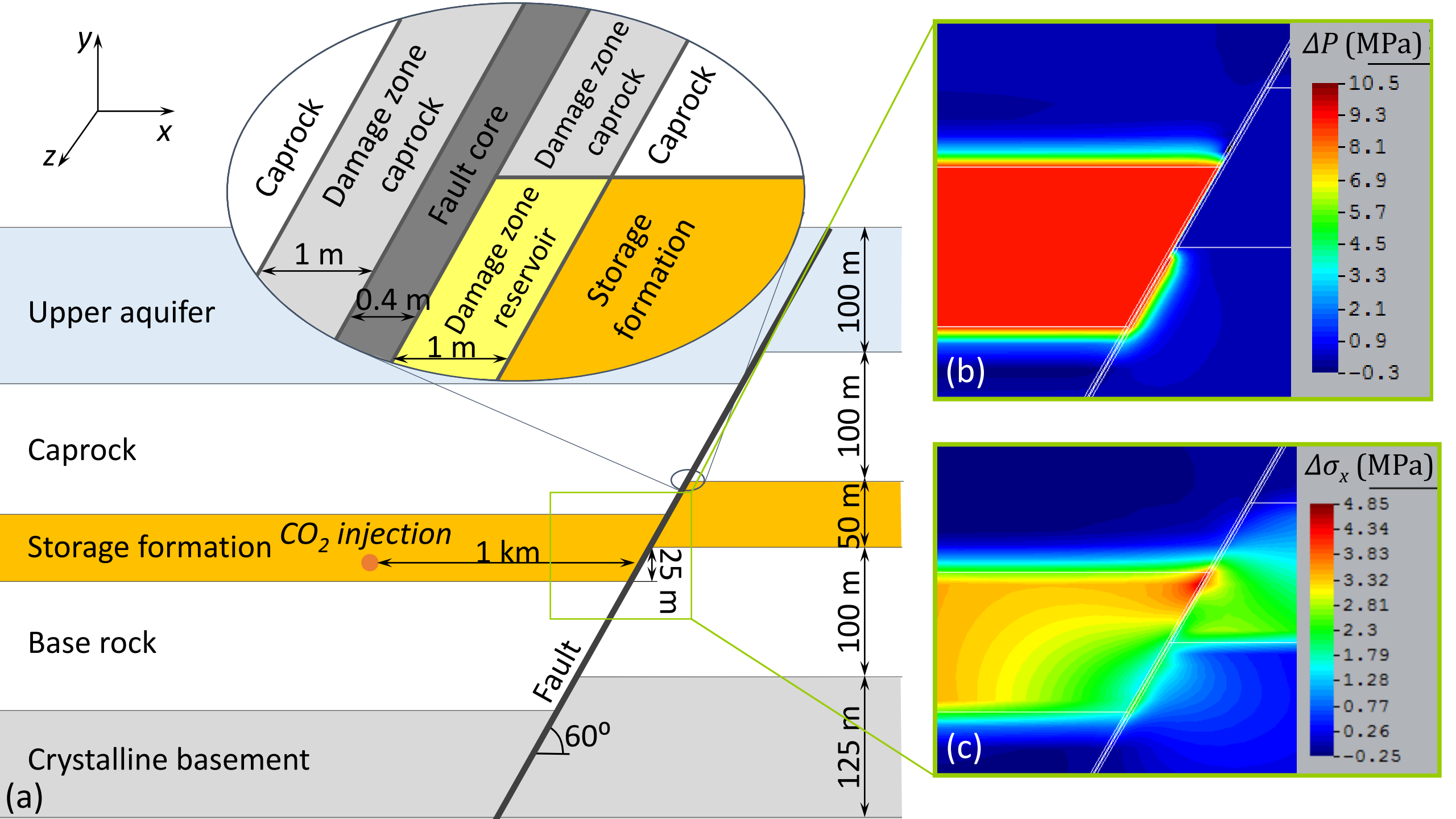
y
x
z
Caprock
Damage zone caprock
Fault core
Damage zone caprock
Caprock
Damage zone reservoir
Storage formation
1 m
0.4 m
1 m
Upper aquifer
Caprock
Storage formation
CO_2 injection
1 km
25 m
Base rock
Fault
60°
Crystalline basement
(a)
100 m
100 m
50 m
100 m
125 m
ΔP (MPa)
10.5
9.3
8.1
6.9
5.7
4.5
3.3
2.1
0.9
-0.3
(b)
$\Delta\sigma_x$ (MPa)
4.85
4.34
3.83
3.32
2.81
2.3
1.79
1.28
0.77
0.26
-0.25
(c)