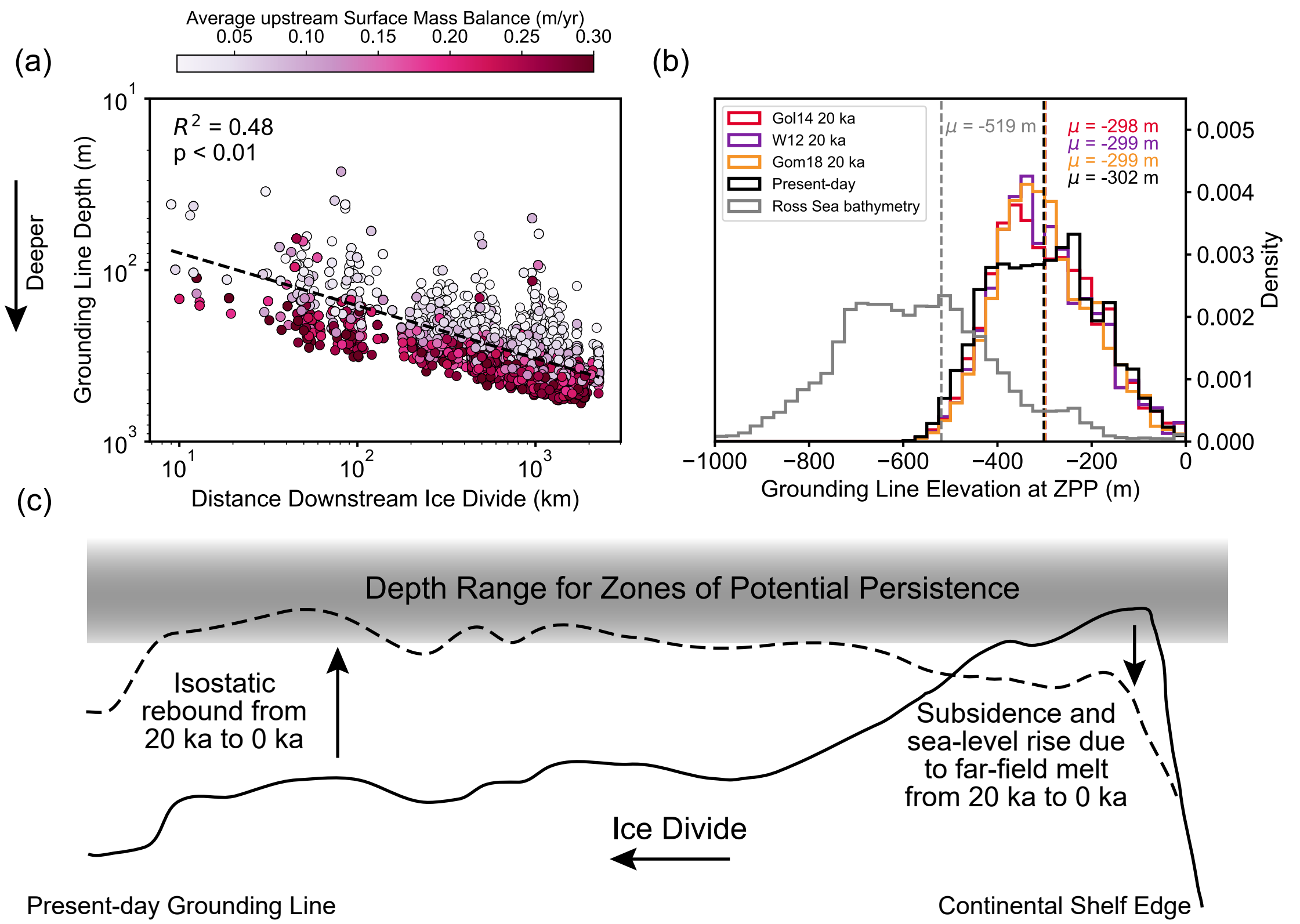
(a)
Average upstream Surface Mass Balance (m/yr)
0.05
0.10
0.15
0.20
0.25
0.30
R^2 = 0.48
p < 0.01
Deeper
Grounding Line Depth (m)
10^1
10^2
10^3
10^1
10^2
10^3
Distance Downstream Ice Divide (km)
(b)
GoI14 20 ka
W12 20 ka
Gom18 20 ka
Present-day
Ross Sea bathymetry
μ = -519 m
μ = -298 m
μ = -299 m
μ = -299 m
μ = -302 m
0.005
0.004
0.003
0.002
0.001
0.000
Density
−1000
−800
−600
−400
−200
0
Grounding Line Elevation at ZPP (m)
(c)
Depth Range for Zones of Potential Persistence
Isostatic
rebound from
20 ka to 0 ka
Subsidence and
sea-level rise due
to far-field melt
from 20 ka to 0 ka
Ice Divide
Present-day Grounding Line
Continental Shelf Edge