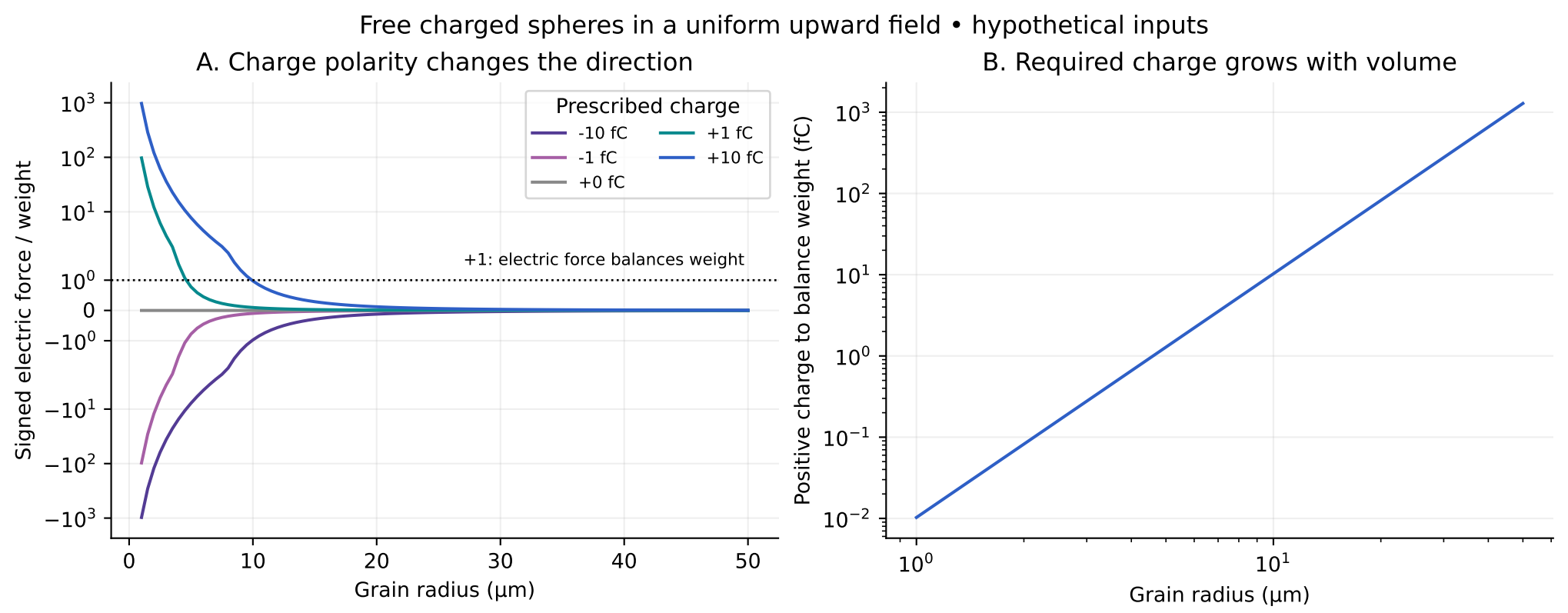

Free charged spheres in a uniform upward field • hypothetical inputs
A. Charge polarity changes the direction
B. Required charge grows with volume
Prescribed charge
-10 fC
-1 fC
+0 fC
+1 fC
+10 fC
+1: electric force balances weight
Signed electric force / weight
Grain radius (μm)
Positive charge to balance weight (fC)
Grain radius (μm)
E = 10,000 V/m; density = 2,500 kg/m³. No adhesion, drag or charging model; not a dust-clearing prediction.