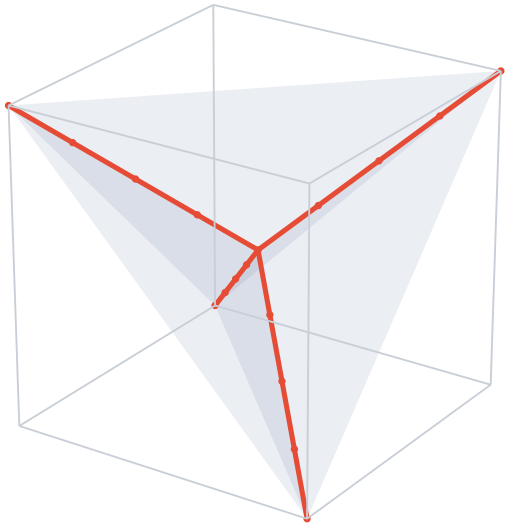
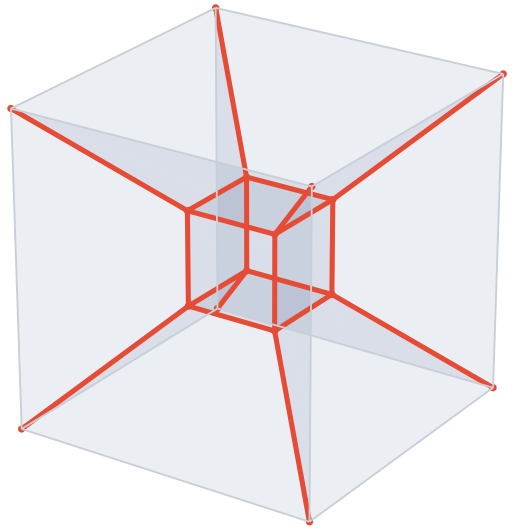
FROTH / From one border to a four- and seven-cell complex

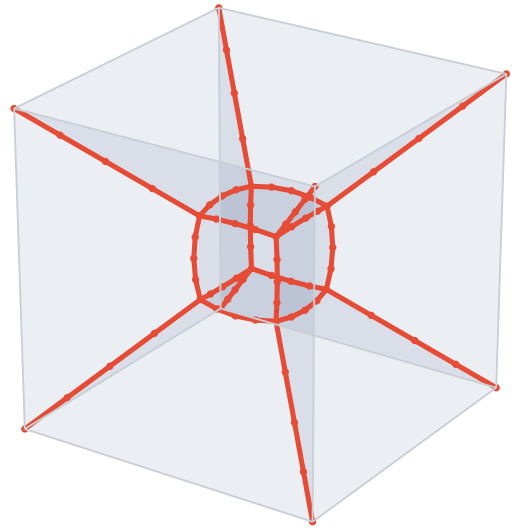
Four cells / six shared films



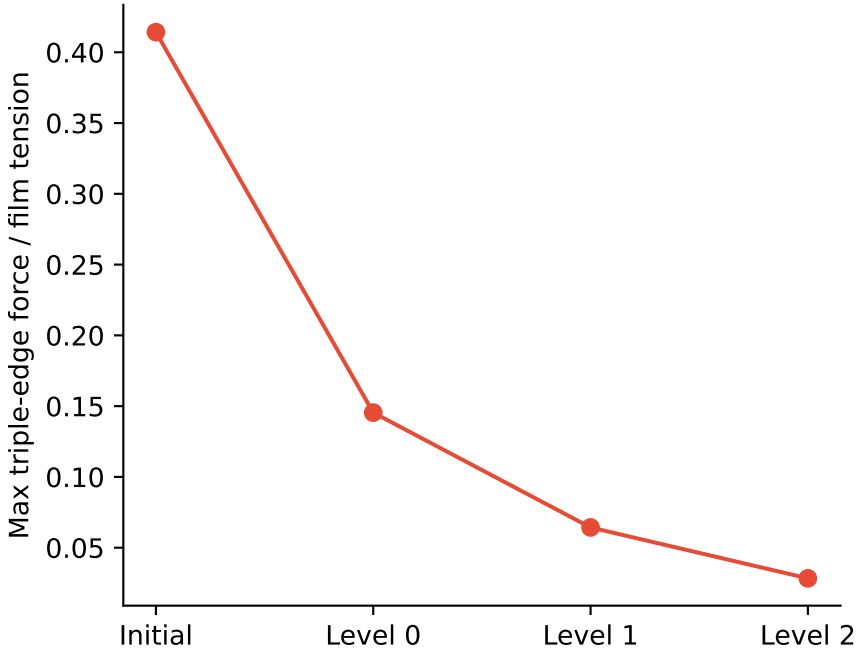
Seven cells / initial Voronoi



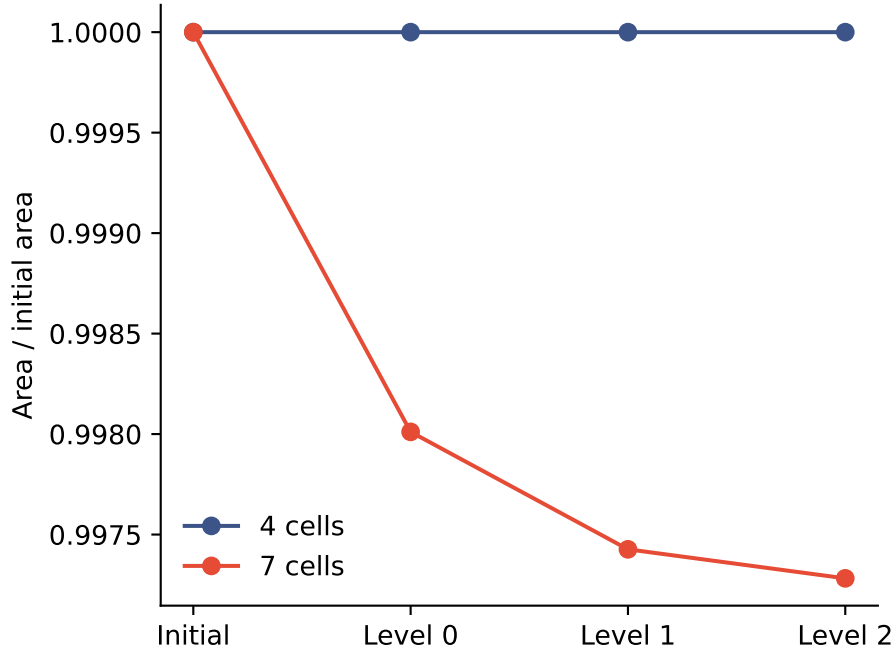
Seven cells / relaxed dry reference



Residual decreases; not yet zero



Fixed-volume area minimization



WHAT THIS STAGE ESTABLISHES

Unique films and triple-border ownership

10 topology controls + saved-data audits

Unmodified Surface Evolver reference

White background / equal 3-D aspect

LIMITS

Dry framed geometry; no liquid evolution.

No gas exchange or rupture in this stage.

Minimizer iterations are not physical time.

Seven-cell angle error remains 1.88 degrees.