

## Scaled Analogue Experiments of 3D Inversion Structures

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The geometry and kinematic evolution of hangingwall deformation is closely related to the geometry of the underlying detachment. This paper presents the results of analogue experimental models of inversion structures generated by extensional-then-contractual stresses. The master detachment fault with a 3D geometry of simple listric or convex upward listric profile, has once extended, then contracted to see the deformation of the fault hangingwall. Dry sand was employed as the hangingwall material to simulate the brittle behaviour of the upper crust. The experimental results can be useful templates to interpret deep structures and complex structural deformation where the seismic resolution is poor.