



Reservoir Engineering Services

The permeability calculated from the initial and final buildup agrees as a tight formation of 0.01 - 0.02 md.

The well damaged with a positive skin is consistent. The initial extrapolated pressure in the initial buildup is slightly higher than the final buildup by 30 psi. This is probably caused by supercharged pressure by the hydrostatic to the near wellbore region, and the supercharged pressure dissipated during final flow period.

To obtain a well define radial flow, a rule-of-thumb of a shutin that is twice the time of flow period is recommended.

Sources of Input Data Used in Interpretation

Bold Blue color coded data represent the computed parameters used in [the model illustration].

Bold Green color coded data are parameters provided by [Client].

Bold Red color coded data are parameters estimated by [the analyst].

Reservoir Description

Fluid type : Gas

Well orientation : Vertical

Layer Parameters Data

Formation thickness	60.00 ft
Average formation porosity	0.06
Water saturation	0.25
Gas saturation	0.75
Formation compressibility	6.0105e-6 psi-1
Total system compressibility	1.8410e-4 psi-1
Layer pressure	3410.4490 psia
Temperature	136.0000 deg F

Well Parameters Data

Well radius	0.33 ft
Distance from observation to active well	0.0000 ft
Wellbore storage coefficient	4.8776e-3 bbl/psi

Fluid Parameters Data

Gas gravity	0.6500 sp grav
Water-Gas ratio	1.0000e-3 STB/MMscf
Water salinity	8.0000e4 ppm
Check Pressure	3350.0000 psia
Check Temperature	136.0000 deg F
Gas density	11.6348 lb/ft3
Initial gas viscosity	0.0210736 cp
Gas formation volume factor	4.2661e-3 ft3/scf
Water density	65.0239 lb/ft3
Water viscosity	0.54824 cp
Water formation volume factor	1.01357 RB/STB
Initial Z-factor	0.8487
Initial Gas compressibility	2.3664e-4 psi-1
Water compressibility	2.4522e-6 psi-1
Layer 1 Correlations	
Ug Correlation : Carr et al	