Bergman-Sutton (2007) saturated oil viscosity o @model

Saturated oil viscosity	**o**	cp	**p p b**	$\mu_{ob}(R_s) = A \cdot (\mu_{od})^B, \quad A = \left[1 + (R_s/c_1)^{c_2}\right]^{-1}, \quad B = c_3 + (1 - c_3) \cdot \left[1 + (R_s/c_4)^{c_5}\right]^{-1}$ $c_1 = 344.198, \; c_2 = 0.855344, \; c_3 = 0.382323, \; c_4 = 567.953, \; c_5 = 0.819326$

where

μ_{od}	cp	Dead oil viscosity
R_s	scf/stb	Solution Gas Oil Ratio

See Also

Petroleum Industry / Upstream / Petroleum Engineering / Subsurface E&P Disciplines / Reservoir Engineering (RE) / PVT correlations / Oil correlations

[Bergman-Sutton (2006-2009) oil viscosity correlations]

References

Bergman, David F., and Robert P. Sutton. "An Update to Viscosity Correlations for Gas-Saturated Crude Oils." Paper presented at the SPE Annual Technical Conference and Exhibition, Anaheim, California, U.S.A., November 2007. doi: https://doi.org/10.2118/110195-MS