

PLA NS PETROLEUM OPER. CO.

Operator: PPOC	Well Name: E C HILL B FED #12
Project ID:	Location: 985' FSL 550' FEL

Design Parameters:

Mud Weight (7.60 ppg) : 0.395 psi/ft
 Shut in casing pressure : 3751 psi
 Internal gradient (burst) : 0.008 psi/ft
 Annular gradient (burst) : 0.395 psi/ft
 Tensile load is determined using buoyed weight
 Service rating is "Sweet"

Design Factors:

Collapse : 1.125
 Burst : 1.10
 8 Round : 1.75 (J)
 Buttress : 1.60 (J)
 Other : 1.50 (J)
 Body Yield : 1.50 (B)

Length (feet)	Size (in.)	Weight (lb/ft)	Grade	Joint	Depth (feet)	Drift (in.)	Cost		
1	9,700	2.875	6.50	J-55	EUE 8rd	9,700	2.347		
	Load (psi)	Collapse Strgth (psi)	S.F.	Burst Load (psi)	Min Int Strgth (psi)	Yield S.F.	Tension Load (kips)	Strgth (kips)	S.F.
1	3830	7680	2.005	3751	7260	1.94	55.72	99.7	1.79 J

Prepared by : DJB, Midland, Texas

Date : 09-19-1994

Remarks :

LEA COUNTY, NEW MEXICO

Minimum segment length for the 9,700 foot well is 100 feet.

SICP is based on the ideal gas law, a gas gravity of 0.15, and a mean gas temperature of 89°F (Surface 74°F, BHT 171°F & temp. gradient 1.000°/100 ft.)

The minimum specified drift diameter is 7.875 in.

An annular mud weight of 8.000 ppg was used for burst purposes. The differential mud gradient below any lost-circulation depth is -0.387 psi/ft and the bottom hole pressure load is 0 psi.

NOTE: The design factors used in this casing string design are as shown above. As a general guideline, Lone Star Steel recommends using minimum design factors of 1.125 - Collapse (with evacuated casing), 1.0 - Burst, 1.8 - 8 Round Tension, 1.6 - Buttress Tension, and 1.5 - Body Yield. Collapse strength under axial tension was calculated based on the Westcott, Dunlop and Kenler curve. Engineering responsibility for use of this design will be that of the purchaser. Costs for this design are based on a 1987 pricing model. (Version 1.06)