

LDi-P31

LDi PULSEVIEW PROGRAM INPUT DATA.

ANALYSIS AND PREVENTION OF PUMP PULSATION AND CAVITATION.



1 Liquid Parameters.			
(a) density of the liquid:	_____		grams/cc
(b) compressibility of the liquid and any absorbed gas:	_____		litres/bar
(c) effective vapour pressure at pump inlet temperature:	_____		°C
2 Pipe Parameters			
(i) Suction Side			
(a) expected theoretical steady state suction pressure:	_____		BarA
(b) length of pipe from supply to suction acceleration head loss preventer inlet:	_____		meters
(c) inside diameter of pipe from supply to preventer inlet:	_____		mm
(d) length of pipe from preventer to pump suction inlet:	_____		meters
(e) inside diameter of pipe from preventer to pump suction inlet:	_____		mm
(ii) Discharge Side			
(a) discharge pressure against which the pump must deliver:	_____		BarA
(b) length of pipe from pump discharge check valve to discharge acceleration head preventer inlet:	_____		meters
(c) inside diameter of pipe from pump discharge to preventer inlet:	_____		mm
(d) length of pipe from preventer discharge to final resistance:	_____		meters
(e) inside diameter of pipe from preventer discharge to final resistance:	_____		mm
Pump Parameters			
(i) Pumping Mechanism			
(a) connecting rod length:	_____		meters
(b) crankshaft radius - i.e. half the piston stroke:	_____		meters
(c) piston diameter:	_____		meters
(d) effective dead volume of pump chamber:	_____		litres
(e) number of strokes of one displacer per minute:	_____		
(ii) Suction Check Valves			
(a) valve seat diameter:	_____	ID OD	mm
(b) valve stroke:	_____		mm
(c) valve mass, plus half the weight of one valve spring:	_____		Kg
(d) starting resistance to compression of spring:	_____		Kg
(e) spring rate:	_____		Kg/mm
(iii) Discharge Check Valves			
(a) valve seat diameter:	_____	ID OD	mm
(b) valve stroke:	_____		mm
(c) valve mass, plus half the weight of one valve spring:	_____		Kg
(d) starting resistance to compression of spring:	_____		Kg
(e) spring rate:	_____		Kg/mm
ADDITIONAL INFORMATION: REQUIREMENTS FOR THE MATERIALS OF CONSTRUCTION:			
A. Metal:	B. Membrane/Seal Material		CUSTOMER:
C. Liquid(s) Description:			CUSTOMER REF.:
D. Operating/Design Temperature:			ENGINEER NAME:
E. Specified Design Pressure: _____ PSI °F. M.D.M.T.: _____ °F.			POSITION:
G. Connection Type, Size & Rating : Suction:			QUANTITY:
Discharge:			Q No.:
H. Any other Information that you believe may be relevant:			ISSUED BY:
			CHECKED BY:
			ISSUE DATE: [DD/M/YYYY]



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Analysis, Diagnostics, Prediction by Software

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