

AIR COMPRESSOR SCHEDULE

Designation	Type	QTY	Brand (Originality)	Location	Normal Air Cap. (m3/min)	Free Air Cap. (m3/min)	Working Pressure (bar)	Site Condition			Cooling Water		Electrical Data		
								Elevation (m)	Inlet Temp. (C)	W.B. Temp (C)	Temp. In/Out (C)	Quantity (m3/hr)	V_φ-Hz Power (KW)		
Cent.A.Comp._01&02	Centrifugal Air Comp.	2	SeAH (South Korea) Atlas Copco (European Originality)	Compressor Room Ext. Area	58	85	8.5	1934 Above See Level	-10~35	-10~35	27/37 ***	50~80 ***	6600-3-50 520 KW ***	380-3-50 30 KW ***	220-1-50 5KW ***

*** Should be finalized by vendor.

Air Filters Schedule

Designation	Type	QTY	Location	Air Cap. (m3/min)	Pipe Conn. (inch)	Working Pressure (bar)	Design Pressure (bar)	Particle Removal (micron)	Remarks
PF-01	Pre Filter	2	Compressor Room Before Dryer	85	5	10	16	<0.1	---
AF-01	After Filter	2	Compressor Room After Dryer	85	5	10	16	<0.1	---

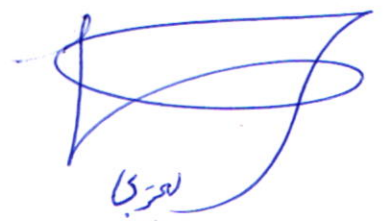
Air Receivers Schedule

Designation	Type	QTY	Location	Capacity (Lit)	Diameter (cm)	Height (cm)	Thickness (mm)	Working Pressure (bar)	Design Pressure (bar)	Remarks
C.A.T-04&05	Vertical	2	Compressor Room Ext. Area	10000	165	450	12	10	16	---

Desiccant Air Dryer Schedule

Designation	Type	QTY	Location	Air Cap. (m3/min)	Weight (Kg)	Working Pressure (bar)	Electrical Data		Dimension L*W*H mm	Pipe Conn. Size	Remarks
							Power (KW)	V_φ-Hz			
Air Dryer_01&05	Absorption	2	Compressor Room Ext. Area	90	4000	10	72	380-3-50	2500*2500*3400	6	Heatless





Item No.	DESCRIPTION	REQUIREMENTS
1.0	MATERIAL OF CONSTRUCTION, INSPECTIONS	
1.1	Casing	API 617/ Cast Iron/ Carbon steel
1.2	Impeller	API 617 OR 17-4PH Stainless steel
1.3	Diffuser/ Guide vanes	API 617/ss/AISI304
1.4	Shaft/ shaft sleeves	API 617, Steel / AISI 4340 OR 4140
1.5	Bull gear shaft	API 617, Steel / AISI 4340 OR 4140
1.6	Bull gear	AGMA
1.7	Pinion gear	AGMA
1.8	Lube oil reservoir	Carbon steel
1.9	Lube oil filter	Dual oil filter-PARKER
1.10	Lube oil cooler tubes (Shell / Tube)	Supplier to advise
1.11	Oil Pump Design Standard	API 676
1.12	Main Pump Driver	Shaft Driven Pump
1.13	Auxiliary Oil Pump Driver	Electric Motor Driven
1.14	Inter/After cooler	Shell: cast iron API617 Tube and fin: Copper /Aluminum
1.15	Piping	In accordance with API614
1.17	Bearings	Tilt Pad Type / according to API 671 & 617
1.18	Coupling and Guards	Accordance with API 671
1.19	Seals and sealing systems	Accordance with API 617&672
1.20	Inspections: General, material, radiography, Ultrasonic inspections	API617
1.21	Cooling Water System	Water Consumption of air cooler and oil cooler should be mentioned separately.
2.0	TESTING	
2.1	Hydrostatic test	API 617/ 672
2.2	Impeller overspeed test	API 617/ 672



کارخانه : 

2.3	Mechanical running and performance test	API 617/672/ASME PTC10
2.4	Full load/ pressure/ speed test	API 617/672
2.5	Vibration Test and Analysis	API 617
2.6	Buyer dispatch the inspectors to the supplier's main shop to test the compressor.	
3.0	ELECTRICAL	
3.1	Motor	TECO original
3.2	Power	520 kW
3.3	Voltage / Phase / Frequency	6.6kV/3/50
3.4	Enclosure	IP55
3.5	Insulation class	F
3.6	Vibration test	API 617/672 Note: The vibration analysis of the first time running the compressor should be done for a reference point.
3.7	Winding insulation resistance	API 617/672 Note: The winding insulation resistance analysis of the first time running the compressor should be done for a reference point.
3.8	Starting Method	Direction line
3.9	Contactora	Schneider
3.10	Touch Screen	Supplier to advise/ Siemens
3.11	Auxiliary pump	Supplier to advise
3.12	Alarm	Should cover API 617/672
3.13	PLC	Siemens S7-1200
4.0	SPARE PARTS	
4.1	Pre-commissioning, Commissioning & Start-Up Spare Parts	Supplier to advise
4.2	Two years normal operation spare parts	Supplier to advise Unit Price of each item shall be mentioned.



4.3	Special Tools	Supplier to advise
5.0	AIR DRYER, RECEIVERS & FILTERS	
5.1	Technical SPEC	Offer shall be provided according to the attached SPEC.



(Handwritten signatures in blue ink)

DESICANT AIR DRIER SCHEDULE		
TYPE	HEATLESS DESICANT	-----
DEW POINT	-40°C	-----
AMB. TEMP.	-10°C/+40°C	-----
NOMINAL CAP.	90M3/MIN.	-----
WORKING PRESS.	8 BAR	-----
TEST PRESS.	13 BAR	-----
DESICANT TYPE	MOLECULAR SEIVE OR ACT. ALUMINA	1650~1750KG
CONTROL METHODE	PLC	-----

AIR RECEIVER SCHEDULE		
TYPE	VERTICAL	-----
VOLUME	10,000 LIT.	-----
SHELL THIC.	MIN.10mm	SA516/GR70
HEAD THIC.	12mm	SA516/GR70
LEGS	AS REQUIRED	ST37
WORKING PRESS.	10 BAR	-----
TEST PRESS.	16BAR	-----
MANHOLE SIZE	18" OR 20"	-----
INT. COATING	60μ Z.RICH EPOXY+40μHIGH BUILD EPOXY POLYAMID	-----
EXT. COATING	60μ Z.RICH EPOXY+40μHIGH BUILD EPOXY POLYAMID+40μ POLYURETHANE	-----

AIR FILTERS SCHEDULE		
NOMINAL CAP.	90M3/MIN.	-----
WORKING PRESS.	10 BAR	-----
TEST PRESS.	16BAR	-----
DPI	INCLUDED	-----
AUTO. DRAIN	INCLUDED	-----



Handwritten signatures and initials in blue ink, including a large signature and the name 'موسوی' (Mousavi).