


STEAM TURBINE CONDENSER PERFORMANCE

PROGRAM WINDOWS

Steam Surface Condenser Performance



Performance Of Steam Surface Condenser

INSTRUCTIONS

Units Code (1 = S.I. 2 = USA) Press Button

Job Name

DATA READ ON TEST

Shell Pressure	<input type="text" value="68.34"/>	mbara
Cooling Water Inlet Temperature	<input type="text" value="21"/>	oC
Cooling Water Outlet Temperature	<input type="text" value="34.92"/>	oC
Cooling Water Flow	<input type="text" value="112788"/>	m3/h
Cooling Water Type (0 = Brackish 1 = Sea)	<input type="text" value="0"/>	

PHYSICAL DATA

Cooling Water Tubes Passes (Max. = 2)	<input type="text" value="1"/>
Total Number Of Non Plugged Inlet Tubes	<input type="text" value="67778"/>
Tubes Length Between Tube Sheets	<input type="text" value="16.315"/> m
Diameter Of Exchange Tubes	<input type="text" value="19"/> mm
Normal Tubes Thickness	<input type="text" value="0.7"/> mm
Impact Tubes Thickness	<input type="text" value="0.7"/> mm

PHYSICAL DATA

Air Extraction Zone Tubes Thickness	<input type="text" value="0.7"/> mm
Impact Tubes Percentage	<input type="text" value="5"/> %
Air Extraction Zone Tubes Percentage	<input type="text" value="5"/> %

Tubes Material :


- [1] Admiralty Brass
- [2] Aluminium Brass
- [3] Cooper Nickel 90/10
- [4] Cooper Nickel 70/30
- [5] Stainless Steel
- [6] Titanium
- [7] Carbon Steel

Normal Tubes Material Code	<input type="text" value="6"/>
Impact Tubes Material Code	<input type="text" value="6"/>
Air Extraction Zone Material Code	<input type="text" value="6"/>

INSTRUCTIONS

DATA ENTRY WINDOW

RESULTS

 Performance Of Steam Surface Condenser - Data Results Job Name : TEST PERFO	
■ Data Input	
Shell Pressure	68,34 mbara
Condensation Temperature	38,57 oC
Cooling Water Inlet Temperature	21 oC
Cooling Water Outlet Temperature	34,92 oC
Cooling Water Flow	112788 m3/h
Cooling Water Type	Brackish Water
Cooling Water Tube Passes	1
Number Of Tubes	67778
Diameter Of Exchange Tubes	19 mm
Normal Tubes Thickness	0,7 mm
Impact Tubes Thickness	0,7 mm
Air Extraction Zone Tubes Thickness	0,7 mm
Tubes Length Between Tube Sheets	16,315 m
Normal Tubes Material	Titanium
Impact Tubes Material	Titanium
Air Extraction Zone Tubes Material	Titanium
Impact Tubes Percentage	5 %
Air Extraction Zone Tubes Percentage	5 %
■ Results Based On Tube Clean	
Shell Pressure	65,87 mbara
Condensation Temperature	37,89 oC
Heat Load	1577859 mcal/h
L.M.T.D.	8,01 oC
Heat Exchange Coefficient	2980,7 kcal/hoCm2
Surface OF Exchange	66005 m2
Total Cooling Water Pressure Drop	4,55 mcw
Cooling Water Tubes Inlet Velocity	1,9 m/s
■ Final Test Conclusion	
Test Result Cleanliness Factor	0,9
Inactive Surface Percentage	10 %