

SCREW TECH  
ENGINEERING PVT. LTD.

Plot No. EL-31/4, M.I.D.C  
Bhosari, Pune - 411 026  
Tel. Off : (022) 27130877, 27130919

Mfrs. of Screw Conveyors, Rotary feeders and Engg. Goods

Ref. : SEPL/DESIGN/2018-19/FLEX CLEAN

Date :01.06.2018

A) DESIGN PARAMETERS	
1 Type of Screw Conveyor	: Inclined Conveyor
2 Length Of Conveyor in Meters	: 2.36
3 Angle Of Inclination in Degrees	: 10
4 Actual Height Of Lift in Meters	: 10
5 Material to be handled	: Calcium Carbonate
6 Bulk Density of material (Kg/cu.m)	: 400.00
7 Bulk Density of material for Power Cal. (Kg/cu.m)	: 600.00
8 Normal Capacity in Kg per Hour	: 3300.00
9 Design Capacity in Kg per Hour	: 10
10 Percent Trough Loading %	: 50.00
11 Speed Of Screw Shaft(RPM) at Normal Capacity	: 10
12 Speed Of Screw Shaft(RPM) at Design Capacity	: 10
13 Torque at Screw shaft in Kg.m.	: 10
14 Temp of conveyed material Degree Celcius	: 45.00
15 Moisture Content(% by Wt.)	: 10
16 No. of Inlets	: 1.00
17 No. of Outlets	: 1.00
18 Weight of Screw in Kg.	: 10
19 Length of Shaft between bearings in m.	: 2.36

B) DESIGN FACTORS	
1 Material Factor	:
2 Flight Factor	: 0.00
3 Screw Diameter Factor	: 55.00
4 Paddle Factor	: 1.00
5 Overload Factor (For Power Cal.)	
6 Overall Efficiency (For Drive Cal.)	
7 Crpm in Kg/Hr per rpm	
8 Frictional Power in HP (HPf)	
9 Material conveyor Power in HP (HPm)	
10 HPf + HPm	
11 Total input Power in HP (cal.)	

C) EQUIPMENT DETAILS	
1 Type of Screw Conveyor	: Inclined Conveyor
2 Screw Diameter in mm.	: 300.00
3 Center Pipe Dia. in mm.	: 76.10
4 Center Pipe Thickness in mm.	: 5.16
5 Type Of Flight	: Standard
6 Flight Pitch in mm.	: 300.00
7 Shaft Dia. at coupling in mm.	
8 Deflection of Screw/Pipe in mm.	
9 Thermal Expansion(Linear) in mm.	
10 Type Of Drive	
11 Type Of Gear Box	
12 Gear Box Input Speed (RPM)	
13 Gear Box Ratio	
14 Gear Box Size of Unit(Model)	
15 Gear Box Make	
16 Motor Rating in HP	
17 Motor Speed (RPM)	
18 Motor Frame Size	
19 Motor Make	



D) TORQUE DETAILS

- 1 Required Torque at Screw in Kg.m.
- 2 Actual transmitted Torque at Screw Shaft in Kg.m.

 Export

}