

Thermal data for 1 unit(s) in parallel and 1 unit(s) in series

	hot side	cold side	
Media:	biodiesel (hot)	biodiesel (cold)	
Media group acc. PED 2014/68/EU:	Group 1 - dangerous	Group 1 - dangerous	
Heat exchanged:	1197,87		kW
Mass flow:	22064	22515	kg/h
Volume flow:	28,00	28,00	m³/h
Temperature inlet:	125,00	35,00	°C
Temperature outlet:	45,00	114,85	°C
Pressure drop:	510	550	mbar
Working pressure inlet:	8,00	8,00	barg
Filling volume:	185,85	185,85	l
Product properties			
Density:	788,0000	804,1182	kg/m³
Heat capacity:	2443,09	2398,55	J/kgK
Thermal conductivity:	0,15000	0,15000	W/mK
Dyn. viscosity inlet:	0,854	3,301	cP
Dyn. viscosity outlet:	2,735	0,963	cP

Unit Data

Plate Type:			
Heat transfer area (total / per unit):	140,76	140,76	m²
Number of plates (total / per unit):	209	209	
Plate thickness:	0,60		mm
LMTD:	10,07		K
Surface margin:	6,41		%
Plate material:	1.4547/SMO254		
Gasket material / Gasket type:	Viton G	glueless	
Internal flow (passes x channels):	4 x 26	4 x 26	
No. of frames (par. / ser. / total):	1	1	1
Material pressure plates / surface:	S355J2+N	painted	chapter 4.2.3 Aluminum
CIP:			

The connection types and positions are defined in the attached dimension sheet.

Design temperature:	Min.: 0,00 / 0,00	Max.: 160,00 / 160,00	°C
Design pressure:	Min.: 0,00 / 0,00	Max.: 16,00 / 16,00	barg
Test pressure:	20,80 / 20,80	barg	Design code: PED 97/23/EC AD-2000 Checkfactor 1.3
PED category:	Category IV, Modul B+D, CE-Sign		
Conformity assessment diagram:	Medium dangerous and steam pressure at Tdesign > 0.5 barg		
Remarks:			