

## HYGIENIC MULTITUBE HEAT EXCHANGERS WITH REMOVABLE TUBES

### HRS MR SERIES



The HRS MR Series is a complete stainless steel shell and tube heat exchanger designed for hygienic applications. The product flows through both the inner tube and the surrounding shell for regeneration duties. The removable tubes allow hygienic processing on the shell side.

The MR Series is an ideal heat exchanger for direct product-to-product heat recovery. Using HRS corrugation technology, heat transfer and efficiency are increased over standard smooth and dimple tube heat exchangers. In addition, effects of fouling are minimised.



## TECHNICAL DATA

### APPLICATIONS

Low-Medium Viscosity Fluids  
Food Industry Applications

### SURFACE FINISH

External: Polished  
Internal: <math>0.8\mu</math>  
*Other surface finishes available*

### STANDARD MATERIALS OF CONSTRUCTION

Service Side: AISI 316L Stainless Steel  
Product Side: AISI 316L Stainless Steel  
*Other material options available*

### STANDARD DESIGN CONDITIONS

Service Side: 10 bar/185°C  
Product Side: 10 bar/185°C

### STANDARD CONNECTIONS

Service Side: Clamp  
Product Side: Clamp  
*All clamp types available*

### FEATURES

- Corrugated tubes for increased heat transfer
- Multiple units can be interconnected and have the option of frame mounting, insulation and cladding in stainless steel

### RANGE

MODELS	LENGTHS (m)	SURFACE AREA (m <sup>2</sup> )	SERVICE SIDE CONNECTION	PRODUCT SIDE CONNECTION	MAX FLOW SERVICE (m <sup>3</sup> /hr)	MAX FLOW PRODUCT (m <sup>3</sup> /hr)	SERVICE SIDE VOLUME (l)	PRODUCT SIDE VOLUME (l)
MR 7 76/18	3 - 6	2.3	2"	2.5"	16	13	14.4	8.3
MR 12 104/18	3 - 6	4	3"	4"	39	25	28.5	14.3
MR 19 129/18	3 - 6	6.3	3"	5"	39	39	44	22.6
MR 31 154/18	3 - 6	10.4	4"	6"	76	62	58.2	36.8

The surface area and volumes shown are for 6m length models.

### DESIGN CODE AND COMPLIANCE

PD 5500, PED 2014/68/EU, ASME | FDA, TR CU 032, DOSH Compliant