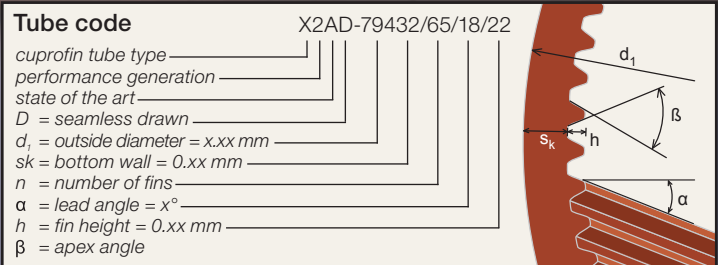
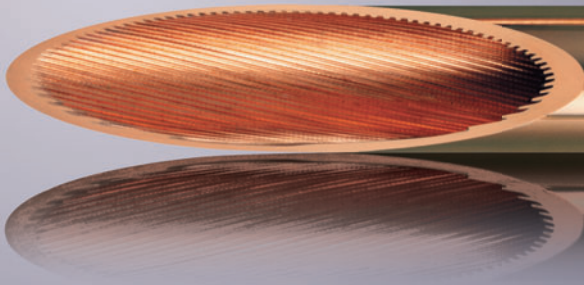


cuprofin®-EDX

Inner-grooved seamless drawn copper tubes

Wieland Thermal Solutions®
PROVIDING EFFICIENCY



Application

cuprofin-EDX tubes are highly efficient heat transfer tubes for shell-and-tube dry expansion evaporators.

cuprofin-EDX light is a new weight-optimised tube designed for less pressure drop with the same performance level. The

grooves on the inside of the tubes are designed for optimised heat transfer for a number of refrigerants, allowing the development of more compact heat exchangers. Wieland offers application engineered computer software for the design of dry expansion evaporators using cuprofin-EDX.

Form of delivery

Level-wound coils			
Material	Copper Cu - DHP	Copper C 12200	Copper SF - Cu
Standard	EN 12735-2*	ASTM SB 359	VdTÜV 420/6
Temper	annealed Y40	light annealed O50	annealed F22
Straight lengths			
Material	Copper Cu - DHP	Copper C 12200	Copper SF - Cu
Standard	EN 12735-1*	ASTM SB 359	VdTÜV 420/7
Temper	hard R 290	hard drawn H80	hard F 36

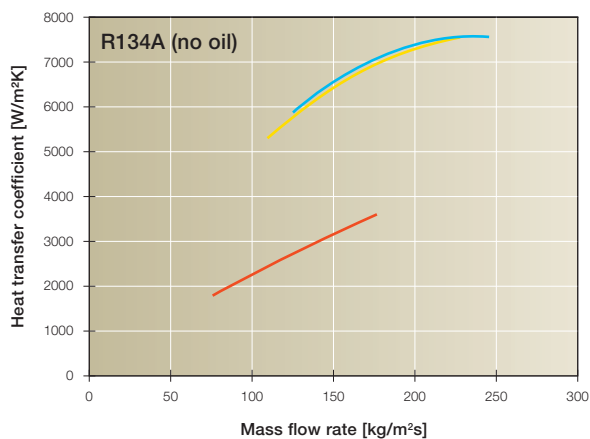
*conforms to the Pressure Equipment Directive PED 97/23/EC

d_1		d_2	s_k	h	n	α	Tube Code
mm	inch	mm	mm	mm	-	°	
7.94	$\frac{5}{16}$	6.86	0.32	0.22	65	18	X2AD-79432/65/18/22
9.52	$\frac{3}{8}$	8.22	0.40	0.25	60	18	X2AD-95240/60/18/25
9.52	$\frac{3}{8}$	8.22	0.40	0.25	60	18	X2CD-95240/60/18/25
9.52	$\frac{3}{8}$	8.32	0.40	0.20	74	19	X2LD-95240/74/19/20
9.52	$\frac{3}{8}$	8.22	0.45	0.20	74	19	X2LD-95245/74/19/20
9.52	$\frac{3}{8}$	8.12	0.45	0.25	60	18	X2AD-95245/60/18/25
9.52	$\frac{3}{8}$	8.12	0.45	0.25	60	18	X2CD-95245/60/18/25

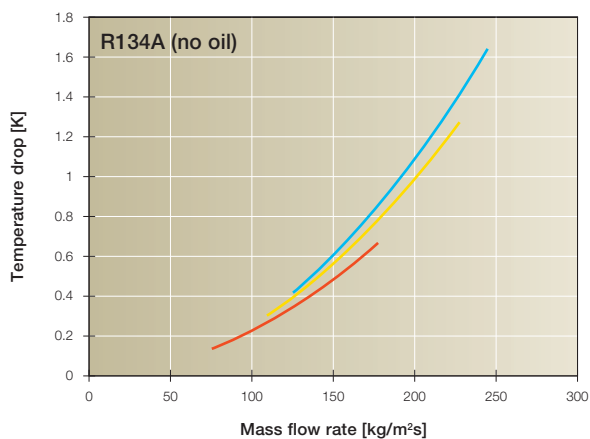
EDX light: new weight-optimised tube; other types upon request.

Evaporation

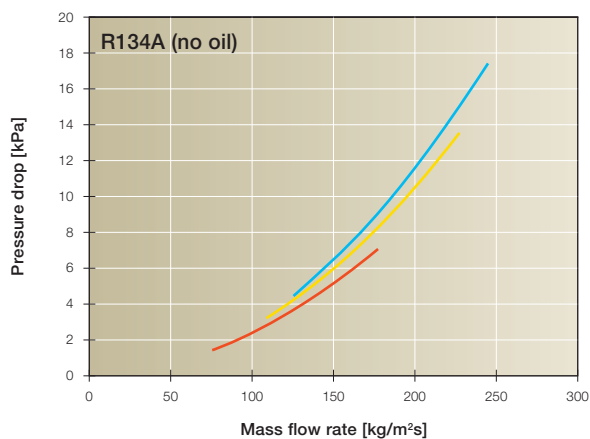
Heat transfer performance



Temperatur drop related to pressure drop



Pressure drop



Test conditions Evaporation – 9.52 mm tubes
 $t_0 = 0\text{ °C}$
 superheat –5 K, inlet quality 20 %
 tube length 2 m

— cuprofin-EDX light
 — cuprofin-EDX
 — plain tube

Tube Type	Standard	E	This leaflet EDX	C	G	L10	XSt
Tube Application	evaporation condensation	evaporation	evaporation	condensation	single phase heat transfer	evaporation condensation	evaporation condensation
Process Application	fin coils shell & tube	fin coils	shell and tube evaporators	fin coils	highly viscous liquids	seawater	fin coils shell and tube
Material	copper	copper	copper	copper	copper	cupro Nickel	stainless steel

