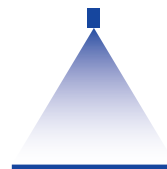


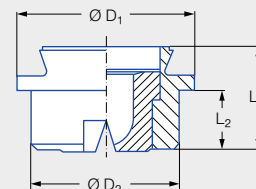
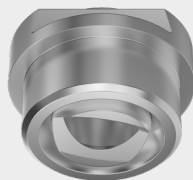
# Low pressure flat fan nozzles with dovetail guide

## Series 664/665



### Features:

- Uniform, parabolic liquid distribution
- Stable spray angle
- Spray automatically aligned approx. 15° to the longitudinal axis of the pipe via dovetail guide
- Assembly with retaining nut
- Non-clogging
- High spray energy



Series 664/665

### Applications:

- Cleaning installations
- Spray pipes
- Roll cooling
- Cooling pipes
- Cooling of rolled stock

Code	Dimensions [mm]				Weight [g]
	L <sub>1</sub>	L <sub>2</sub>	Ø D <sub>1</sub>	Ø D <sub>2</sub>	
Assembly with retaining nut 3/4 BSPP and dovetail guide	14.0	8.0	24.0	20.0	35.0

Spray angle	Ordering no.				Equivalent bore diameter A [mm]	Narrowest free cross section Ø [mm]	V̇ water [l/min]						Spray width B [mm] (at p = 5 bar)	
	Type	Mat. no.					p [bar]							
		16	17 <sup>1</sup>	30										
		Stainless steel 303	Stainless steel 316/TI	Stainless steel 316L			Brass	0.5	1.0	2.0	3.0	5.0	10.0	H = 250 [mm]
20°	664.721	●	●	●	3.00	2.50	3.15	4.45	6.30	7.71	9.96	14.09	100	180
	664.801	●	●	●	4.00	3.20	5.00	7.07	10.00	12.25	15.81	22.36	100	180
	664.881	●	●	●	5.00	4.00	8.00	11.31	16.00	19.60	25.30	35.78	100	180
	664.921	●	●	●	5.50	4.40	10.00	14.14	20.00	24.49	31.62	44.72	100	180
	664.961	●	●	●	6.00	5.10	12.50	17.68	25.00	30.62	39.53	55.90	100	180
30°	664.722	●	●	●	3.00	2.40	3.15	4.45	6.30	7.71	9.96	14.09	140	260
	664.762	●	●	●	3.50	2.70	4.00	5.66	8.00	9.80	12.65	17.89	140	260
	664.802	●	●	●	4.00	3.10	5.00	7.07	10.00	12.25	15.81	22.36	140	260
	664.882	●	●	●	5.00	4.00	8.00	11.31	16.00	19.60	25.30	35.78	140	270
	664.922	●	●	●	5.50	4.40	10.00	14.14	20.00	24.49	31.62	44.72	140	270
	664.962	●	●	●	6.00	5.00	12.50	17.68	25.00	30.62	39.53	55.90	140	270
	665.042	●		●	8.00	6.40	20.00	28.29	40.00	48.99	63.25	89.45	140	270
	665.122			●	10.00	8.20	31.50	44.55	63.00	77.16	99.61	140.87	140	270





Spray angle	Ordering no.				Equivalent bore diameter A [mm]	Narrowest free cross section Ø [mm]	V̇ water [l/min]						Spray width B [mm] (at p = 5 bar)	
	Type	Mat. no.					p [bar]						H = 250 [mm]	H = 500 [mm]
		16	17 <sup>1</sup>	30			0.5	1.0	2.0	3.0	5.0	10.0		
		Stainless steel 303	Stainless steel 316Ti/ Stainless steel 316L	Brass										
45°	664.723	●	●	●	3.00	2.40	3.15	4.45	6.30	7.71	<b>9.96</b>	14.09	220	420
	664.763	●	●	●	3.50	2.60	4.00	5.66	8.00	9.80	<b>12.65</b>	17.89	220	420
	664.803	●	●	●	4.00	3.00	5.00	7.07	10.00	12.25	<b>15.81</b>	22.36	220	420
	664.843	●	●	●	4.50	3.40	6.25	8.84	12.50	15.31	<b>19.76</b>	27.94	220	420
	664.883	●	●	●	5.00	3.80	8.00	11.31	16.00	19.60	<b>25.30</b>	35.78	220	420
	664.923	●	●	●	5.50	4.20	10.00	14.14	20.00	24.49	<b>31.62</b>	44.72	220	430
	664.963	●	●	●	6.00	4.40	12.50	17.68	25.00	30.62	<b>39.53</b>	55.90	220	430
	665.043			●	8.00	5.90	20.00	28.29	40.00	48.99	<b>63.25</b>	89.45	220	430
60°	664.724	●	●	●	3.00	2.10	3.15	4.45	6.30	7.71	<b>9.96</b>	14.09	280	560
	664.764	●	●	●	3.50	2.30	4.00	5.66	8.00	9.80	<b>12.65</b>	17.89	280	570
	664.804	●	●	●	4.00	2.60	5.00	7.07	10.00	12.25	<b>15.81</b>	22.36	290	580
	664.844	●	●	●	4.50	3.00	6.25	8.84	12.50	15.31	<b>19.76</b>	27.94	290	580
	664.884	●	●	●	5.00	3.40	8.00	11.31	16.00	19.60	<b>25.30</b>	35.78	290	580
	664.924	●	●	●	5.50	4.10	10.00	14.14	20.00	24.49	<b>31.62</b>	44.72	290	580
	664.964	●	●	●	6.00	4.20	12.50	17.68	25.00	30.62	<b>39.53</b>	55.90	290	580
	665.044	●	●	●	8.00	5.50	20.00	28.29	40.00	48.99	<b>63.25</b>	89.45	290	580
		665.084		●	●	9.00	6.20	25.00	35.36	50.00	61.24	<b>79.06</b>	111.81	290
	665.124			●	10.00	7.40	31.50	44.55	63.00	77.16	<b>99.61</b>	140.87	290	580
90°	664.726	●	●	●	3.00	1.70	3.15	4.45	6.30	7.71	<b>9.96</b>	14.09	520	980
	664.766	●	●	●	3.50	1.90	4.00	5.66	8.00	9.80	<b>12.65</b>	17.89	530	1,000
	664.806	●	●	●	4.00	2.40	5.00	7.07	10.00	12.25	<b>15.81</b>	22.36	530	1,030
	664.846	●	●	●	4.50	2.40	6.25	8.84	12.50	15.31	<b>19.76</b>	27.94	540	1,050
	664.886	●	●	●	5.00	3.10	8.00	11.31	16.00	19.60	<b>25.30</b>	35.78	540	1,060
	664.926	●	●	●	5.50	3.60	10.00	14.14	20.00	24.49	<b>31.62</b>	44.72	540	1,070
	664.966	●	●	●	6.00	3.90	12.50	17.68	25.00	30.62	<b>39.53</b>	55.90	540	1,070
		665.046			●	8.00	4.90	20.00	28.29	40.00	48.99	<b>63.25</b>	89.45	540
	665.126			●	10.00	6.40	31.50	44.55	63.00	77.16	<b>99.61</b>	140.87	540	1,070
120°	664.727	●	●	●	3.00	1.60	3.15	4.45	6.30	7.71	<b>9.96</b>	14.09	890	1,680
	664.767	●	●	●	3.50	1.70	4.00	5.66	8.00	9.80	<b>12.65</b>	17.89	900	1,700
	664.807	●	●	●	4.00	2.00	5.00	7.07	10.00	12.25	<b>15.81</b>	22.36	900	1,710
	664.887	●	●	●	5.00	2.60	8.00	11.31	16.00	19.60	<b>25.30</b>	35.78	910	1,710
	664.927	●	●	●	5.50	2.90	10.00	14.14	20.00	24.49	<b>31.62</b>	44.72	910	1,710
	664.967			●	6.00	3.20	12.50	17.68	25.00	30.62	<b>39.53</b>	55.90	910	1,710
	665.047			●	8.00	4.40	20.00	28.29	40.00	48.99	<b>63.25</b>	89.45	910	1,710

<sup>1</sup> We reserve the right to supply material 316Ti or 316L under material no. 17.

Conversion formula for this series:  $\dot{V}_2 = \dot{V}_1 \cdot \sqrt{\frac{P_2}{P_1}}$

Ordering Type + Material no. = Ordering no.  
example: 664.723 + 16 = 664.723.16



Assembly accessories can be found in Chapter 9 "Accessories".