KMU LOFT Cleanwater

isg®

KLC Evaporator

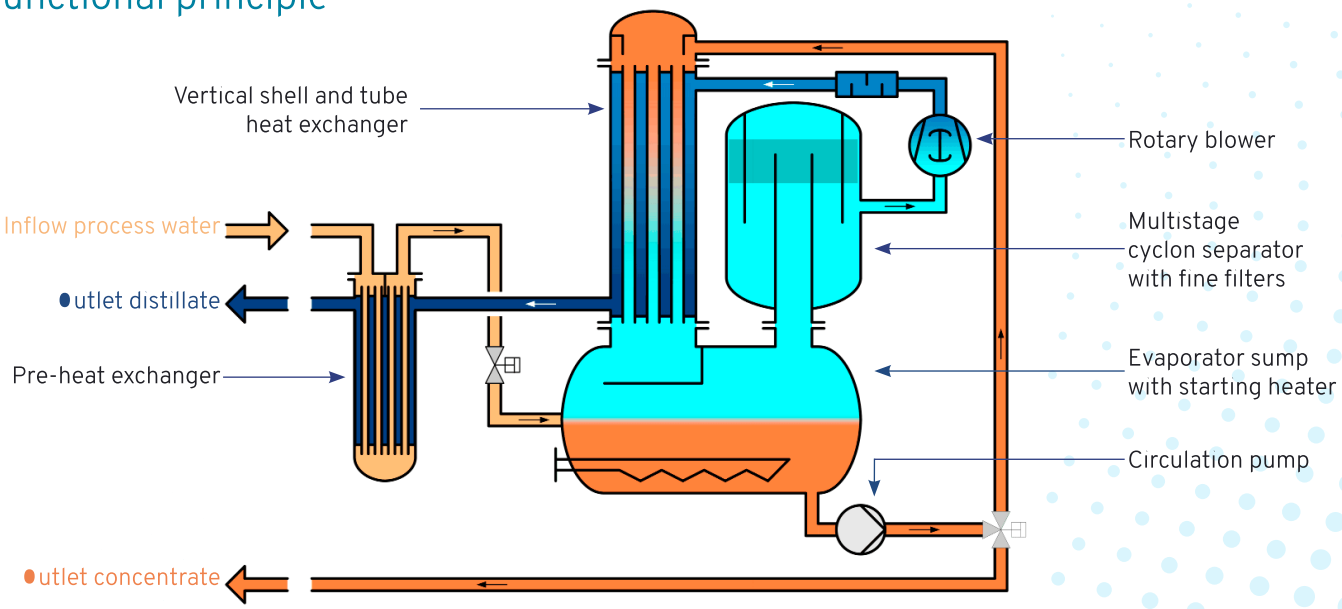
PROWADEST/1

Vacuum distillation with falling down/
forced circulation and vapor compression

The efficient treatment of process water

The PROWADEST P is a robust and reliable KLC evaporator that has been successfully installed worldwide over the last 30 years It is designed for treatment of industrial process water using the forced circulation principle Powerful and efficient components are installed in the smallest possible space, which decisively improve distillate quality and significantly reduce energy consumption Continuous optimization of the system has been performed over the years to meet the requirements of a wide range of process water types, especially for heavily foaming and salt containing process water With additional configurations, even the most difficult process waters can be treated By reusing the distillate, it is possible to achieve a closed circuit water management that conserves resources and meet the highest environmental standards With its reliable operation and performance, a Zero Liquid Discharge Production is possible

Functional principle



Special features

- Very well suited for heavily foaming and salt containing process waters
- Foam and deposition prevention due to integrated recirculation pump
- Very low energy consumption due to maximum heat recovery
- High availability of the plant through effective and automatic cleaning system
- Compact design and optimum accessibility
- Optional with “BestDest” technology for best quality of the distillate
- Latest control system, intuitive operation und easy handling of the machine visualization
- Available in different materials

KMU LOFT Cleanwater

isg

KLC Evaporator

PROWADEST/1

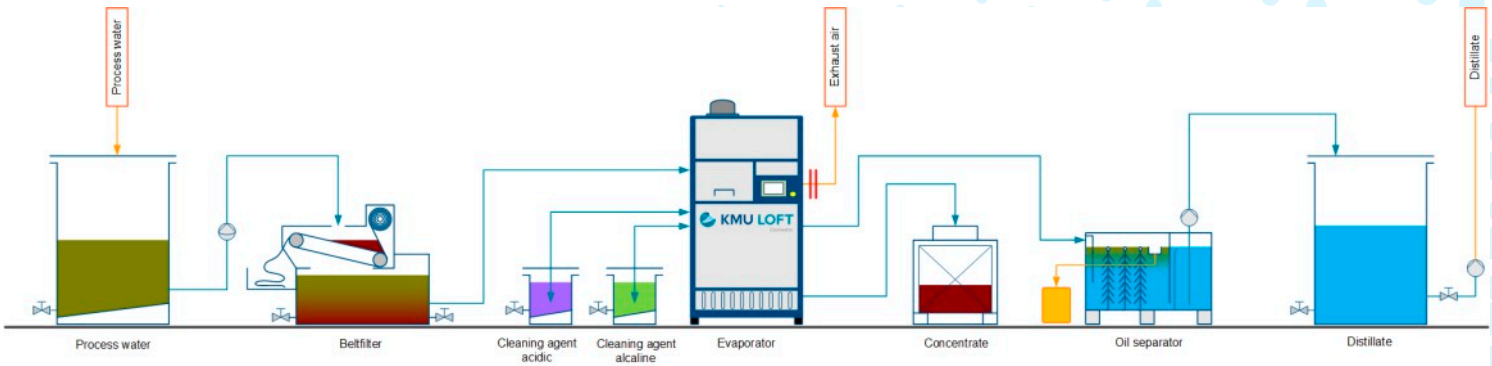
Vacuum distillation with falling down/ forced circulation and vapor compression

Technical data

Type of model	Capacity[1] [l/h]	Capacity per year[2,4] [m³] (7000 h/a)	Installed power [kW]	Energy consumption[3,4] [kWh/m³] starting from	Weight empty [kg]	Dimensions L x W x H [mm]
PROWADEST P 30	30	210	8	80	600	1790 x 920 x 2180
PROWADEST P 40	40	280	8	80	620	1790 x 920 x 2180
PROWADEST P 60	60	420	10	75	650	1790 x 920 x 2180
PROWADEST P 90	90	630	15	75	700	1790 x 920 x 2180
PROWADEST P 120	120	840	20	65	920	2160 x 1280 x 2320
PROWADEST P 160	160	1120	24	65	960	2160 x 1280 x 2320
PROWADEST P 200	200	1400	25	60	1200	2160 x 1280 x 2320
PROWADEST P 240	240	1680	30	60	1450	2350 x 1550 x 2500
PROWADEST P 300	300	2100	33	55	1500	2350 x 1550 x 2500
PROWADEST P 350	350	2450	41	55	1600	2350 x 1550 x 2500
PROWADEST P 400	400	2800	41	55	1770	2350 x 1550 x 2500
PROWADEST P 500	500	3500	85	40	4000	3340 x 2100 x 2760
PROWADEST P 600	600	4200	85	40	4000	3340 x 2100 x 2760
PROWADEST P 800	800	5600	85	40	4000	3340 x 2100 x 2760
PROWADEST P 1000	1000	7000	113	35	5500	3550 x 2390 x 3300
PROWADEST P 1200	1200	8400	128	35	5500	3550 x 2390 x 3300
PROWADEST P 1500	1500	10500	128	35	5500	3550 x 2390 x 3300
PROWADEST P 2000	2000	14000	170	35	7200	4000 x 2450 x 3560
PROWADEST P 2500	2500	17500	204	35	9500	4400 x 2900 x 3890

[1] City water hardness <10° dH, inlet temperature >15°C
[2] with 7000 operation hours per year with city water (6 days/ 50 weeks)
[3] Values refer to a machine at operating temperature
[4] Data for particular process waters are determined in customer specific calculations

Example process flow diagram



KMU LOFT Cleanwater

KLC Evaporator

PROWADEST/1

Vacuum distillation with falling down/ forced circulation and vapor compression

Technical data - US-equivalents

Type of model	Capacity[1] [gpm]	Capacity per year[2,4] [gal] (7000 h/a)	Installed power [kW]	Energy consumption[3,4] [kWh/gal] starting from	Weight empty [lb]	Dimensions L x W x H [in]
PROWADEST P 30	0 13	55,476	8	0 30	1,323	70 47 x 36 22 x 85 83
PROWADEST P 40	0 18	73,968	8	0 30	1,367	70 47 x 36 22 x 85 83
PROWADEST P 60	0 26	110,952	10	0 28	1,433	70 47 x 36 22 x 85 83
PROWADEST P 90	0 40	166,428	15	0 28	1,543	70 47 x 36 22 x 85 83
PROWADEST P 120	0 53	221,904	20	0 25	2,028	85 04 x 50 39 x 91 34
PROWADEST P 160	0 70	295,873	24	0 25	2,116	85 04 x 50 39 x 91 34
PROWADEST P 200	0 88	369,841	25	0 23	2,646	85 04 x 50 39 x 91 34
PROWADEST P 240	1 06	443,809	30	0 23	3,197	92 52 x 61 02 x 98 43
PROWADEST P 300	1 32	554,761	33	0 21	3,307	92 52 x 61 02 x 98 43
PROWADEST P 350	1 54	647,221	41	0 21	3,527	92 52 x 61 02 x 98 43
PROWADEST P 400	1 76	739,682	41	0 21	3,902	92 52 x 61 02 x 98 43
PROWADEST P 500	2 20	924,602	85	0 15	8,818	131 50 x 82 68 x 108 66
PROWADEST P 600	2 64	1,109,522	85	0 15	8,818	131 50 x 82 68 x 108 66
PROWADEST P 800	3 52	1,479,363	85	0 15	8,818	131 50 x 82 68 x 108 66
PROWADEST P 1000	4 40	1,849,204	113	0 13	12,125	139 76 x 94 09 x 129 92
PROWADEST P 1200	5 28	2,219,045	128	0 13	12,125	139 76 x 94 09 x 129 92
PROWADEST P 1500	6 60	2,773,806	128	0 13	12,125	139 76 x 94 09 x 129 92
PROWADEST P 2000	8 81	3,698,408	170	0 13	15,873	157 48 x 96 46 x 140 16
PROWADEST P 2500	11 01	4,623,010	204	0 13	20,944	173 23 x 114 17 x 153 15

[1] City water hardness <10° dH, inlet temperature >59°F
[2] with 7000 operation hours per year with city water (6 days/ 50 weeks)
[3] Values refer to a machine at operating temperature
[4] Data for particular process waters are determined in customer specific calculations

Especially suitable for the following process waters

- Rinse and active baths from surface treatment
- Emulsions (coolants and lubricants)
- Washing and cleaning process waters
- Process water with release agents
- Rinse water from crack detection systems
- Penetrants

Authorized distributor in Poland:

Industrial Solutions Group Sp. z o.o.
Lipnicka 25, Szczepanów
55- 300 Środa Śląska
Tel: +48 71 396 87 08
E: biuro@is-groupl.pl
www.is-group.pl

More information about KLC PROWADEST

Tel +49 7121 9683-0
Mail info@kmu-loft com
Web www kmu-loft com