

Actiflo® Pack ACP2




The Ultimate Microsand enhanced clarifier

The Actiflo® Pack is a very compact and fully standardized clarifier package plant. It can be used for various applications such as drinking water, waste water treatment, re-use or process water.

This product range is based on the Actiflo process developed by Veolia that uses microsand and polymer in the flocculation tank to increase settling velocity. Veolia has more than 20 years of design, commissioning and operational experience. Over 1,800 Actiflo units have been installed worldwide by Veolia, including more than 900 package plants.

This package plant is integrating the continuous innovation carried out by Veolia in order to always stay on the cutting edge to meet customer needs and performance excellence.



Flow rates
from 21 to
1,781 m³/h



Pharma



Cosmetics



Food



Beverage



Power



Laboratory



Electronics



Hydrogen



General Industry



Drinking Water



Municipal WW



FEATURES & BENEFITS

- High treatment efficiency: turbidity and TSS removal up to > 99%; treats all water and wastewater sources
- Extremely quick start-up time: reaches treatment efficiency within few minutes
- Process stability: the microsand buffers the effect of raw water flow or load variations, making the process very user friendly and easy to operate
- Efficient in cold water applications: suitable for use also in Nordic regions
- Fully standardized design: complete documentation readily available
- Numerous standard options and alternatives to enhance performances and monitoring

HYDREX® CHEMICALS

Hydrex™ 3000, 6000 & 9000 water treatment chemicals from Veolia Water Technologies are recommended for optimized plant operation.



APPLICATIONS

- Industrial process water: surface/ground water treatment, pre-treatment to membrane and ion exchange systems
- Municipal and industrial wastewater treatment: primary/secondary/tertiary treatment, biofilter backwash water and trickling filter effluents
- Stormwater and combined sewer overflow treatment, reverting to effluent polishing during dry weather
- Recycling/reuse of municipal and industrial effluents

ASSOCIATED SERVICES

Local aftermarket service and support teams offer preventative and corrective maintenance programs to ensure the long-term, efficient operation of installed plants.





System Operating Parameters

Model	Unit	ACP2-15	ACP2-30	ACP2-40	ACP2-45
Min Feed Flowrate ⁽¹⁾	m ³ /h	21	25	38	50
	US gpm	92	110	167	220
Max Feed Flowrate	m ³ /h	125	250	375	500
	US gpm	550	1100	1650	2200
Coagulation Volume	m ³	1.54	2.81	4.31	5.73
Flocculation Zone Volume	m ³	4.58	8.34	12.79	17.28
Mirror Surface	m ²	1.04	2.21	3.69	4.14

Model	Unit	ACP2-55	ACP2-60	ACP2-70	ACP2-75
Min Feed Flowrate ⁽¹⁾	m ³ /h	75	100	156	178
	US gpm	330	440	686	783
Max Feed Flowrate	m ³ /h	750	1000	1563	1781
	US gpm	3300	4400	6877	7836
Coagulation Volume	m ³	8.59	11.43	17.75	17.56
Flocculation Zone Volume	m ³	25.82	34.24	52.18	61.35
Mirror Surface	m ²	6.29	9.95	12.59	14.41

⁽¹⁾ Selection of models must be done according to water characteristics and treatment requirements

System Dimensions

Model	Unit	ACP2-15	ACP2-30	ACP2-40	ACP2-45
Total Installed Length ⁽²⁾	m	4.40	6.50	7.70	9.50
	in	14.40	21.30	25.30	31.20
Total Installed Width ⁽²⁾	m	3.00	3.20	3.50	3.60
	in	9.80	10.50	11.50	11.80
Total Installed Height ⁽²⁾	m	5.40	5.70	6.10	6.00
	in	17.70	18.70	20.00	19.70
Clearance Height	m	6.40	6.70	7.10	7.00
	in	21.00	22.00	23.30	23.00
Empty Weight	kg	4700	7500	9500	9700
	lb	10400	16500	20900	21300
Operating Weight	kg	26000	37500	53000	64000
	lb	57200	82500	116600	140800

Model	Unit	ACP2-55	ACP2-60	ACP2-70	ACP2-75
Total Installed Length ⁽²⁾	m	11.20	12.50	14.00	15.00
	in	36.70	41.00	45.90	49.20
Total Installed Width ⁽²⁾	m	4.20	4.90	5.40	5.50
	in	13.80	16.10	17.70	18.00
Total Installed Height ⁽²⁾	m	7.00	7.00	7.50	7.50
	in	23.00	23.00	24.60	24.60
Clearance Height	m	8.00	8.00	8.50	8.50
	in	26.20	26.20	27.90	27.90
Empty Weight	kg	12500	15500	20000	21700
	lb	27500	34100	40090	47840
Operating Weight	kg	90000	122000	180000	200000
	lb	198000	268400	396000	440000

⁽²⁾ Including recirculation line(s), ladder and embedded control panel.





Pipes Connections

Model	Unit	ACP2-15	ACP2-30	ACP2-40	ACP2-45
Feed	DN	150	250	300	300
	in	5.90	9.84	11.80	11.80
Outlet	DN	200	250	300	350
	in	7.87	9.84	11.80	13.70
Sludge	DN	40	40	50	50
	in	1.57	1.57	1.96	1.96
Coagulation Drain	DN	50	50	50	50
	in	1.96	1.96	1.96	1.96
Flocculation Drain	DN	50	50	50	50
	in	2	2	2	2
Settler Drain	DN	100	100	100	100
	in	4	4	4	4

Model	Unit	ACP2-55	ACP2-60	ACP2-70	ACP2-75
Feed	DN	400	450	600	600
	in	15.70	17.70	23.60	23.60
Outlet	DN	450	2x400	2x450	2x450
	in	17.70	2x15.7	2x17.7	2x17.7
Sludge	DN	65	65	100	100
	in	2.55	2.55	3.93	3.93
Coagulation Drain	DN	50	50	100	100
	in	1.96	1.96	3.93	3.93
Flocculation Drain	DN	50	50	100	100
	in	2	2	4	4
Settler Drain	DN	100	100	200	200
	in	4	4	8	8

Feed water Requirements

Parameter	Unit	Value
Minimum water temperature	°C	2
	°F	35
Maximum water temperature	°C	40
	°F	104
Maximum Inlet TSS ⁽³⁾	mg/l	1500
Maximum Inlet Turbidity ⁽³⁾	NTU	1000
Maximum Inlet particle size	mm	2

⁽³⁾ For some applications, max acceptable inlet TSS or Turbidity should be lower in order to warranty performances.

Typical Treated Water Quality

Parameter	Unit	Value
TSS Removal Efficiency	%	Up to 99% ⁽⁴⁾ Up to 90% ⁽⁵⁾

⁽⁴⁾ drinking and process water ⁽⁵⁾ wastewater
In both cases function on the application, raw water quality and chemical dosages

Environmental Conditions

Parameter	Unit	Value
Minimum ambient temperature	°C	5
	°F	41
Maximum ambient temperature	°C	40
	°F	95
Maximum humidity	%	104

Standard design can be modified on request.

Materials of Construction

Tank	Coated Carbon Steel
Internal Components	SS304L
Recirculation Pipework	HDPE

Other materials available on request.

Power Requirements

Version	ISO Spain	ISO China	ASME US	ASME Canada
Voltage ⁽⁶⁾	400 V	400 V	460 V	575 V
Frequency	50 Hz	50 Hz	60 Hz	60 Hz
Phases	3	3	3	3

⁽⁶⁾ Other voltages available on request.