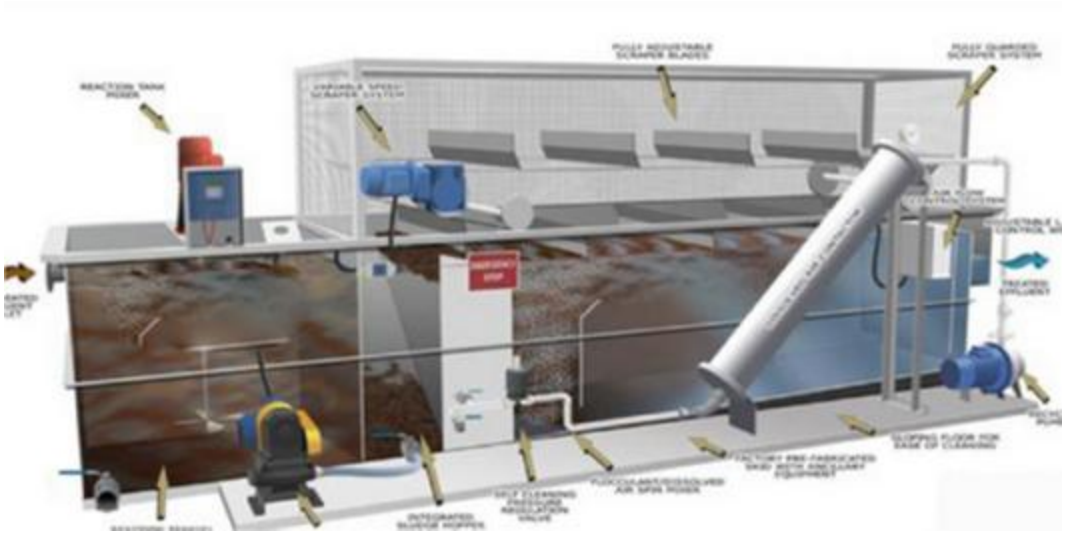
KHN Dissolved Air Flotation Unit introduction document

The principle of the DAF is to dissolve a large amount of air into the water body and form a large number of tiny bubbles after decompression, and the bubbles form adhesion with suspended matter. Suspended solids adsorb together with tiny bubbles and float to the surface with bubbles. Under the action of the slag scraper, the slag is separated from the water body, and the heavier impurities will sink at the bottom and be discharged periodically through the sewage system.



Ⅰ、The characteristics of DAF :

1. The structure of DAF is ingenious, the volume is small, the dissolved air quantity is high, the dissolved air efficiency is improved and the residence time is shortened.

2. The release device of the DAF is not easy to plug, and the gas release is perfect. The bubbles are generally below 30um.

3. The DAF adopts a new high efficiency grid reaction structure, which has good flocculation effect and power saving.

4. DAF with automatic control box, after debugging, normal operation without special management, can achieve full automation.

Ⅱ、Application of DAF

DAF can be widely used in the treatment of industrial wastewater such as paper making, printing and dyeing,

electroplating, chemical industry, food, oil refining and so on.

1. The fiber recovery rate of papermaking wastewater can reach about 95%, the COD removal rate is above 85%, and the clean water can be reused completely.

2. The chroma removal rate of dyeing wastewater is about 90%, the removal rate of COD is 60-70%, and the removal rate of BOD5 is about 50%.

3. The oil from the refinery wastewater can be reduced to below 10mg/L, and the wastewater can reach the level of clarification.

4. The COD removal rate of food, slaughterhouse and tannery wastewater is about 70%, and the chroma removal rate is over 94%.

5. When the content of chromium, zinc, copper, nickel and lead is below 50 ppm, the removal rate of electroplating wastewater can reach more than 90%.

6. The bath turbidity of the big pool can be stabilized below 10 degrees, and the bacteria in water can be removed more.

7. The turbidity of drinking water and industrial water can be delivered to less than 5 degrees, and has a good effect on reducing the color oxygen consumption.

8. The water content of the activated sludge can be reduced to

about 97% by the secondary common pond after the loanable biological treatment.

III、specification of Dissolved Air Flotation Unit

Model	Volume	Size	Reflux pump	Air compressor	Skimming	Interface list			
	m3/h	L×B×H（m）	kW	kW	kW	Inlet （a）	Outlet （a）	Sludge （a）	Empty （a）
KDAF005	～5	3.45×2.20×2.10	1.1	0.55	0.2	65	65	80	50
KDAF 010	～10	4.70×2.40×2.40	1.5	0.55	0.2	100	100	100	50
KDAF 020	～20	5.20×3.00×2.40	3.0	0.75	0.2	125	125	150	80
KDAF 030	～30	6.20×3.20×2.40	5.5	0.75	0.37	150	150	150	80
KDAF 040	～40	7.20×2.90×2.40	7.5	0.75	0.37	200	200	150	80
KDAF 050	～50	7.20×3.40×2.60	7.5	0.75	0.37	200	200	150	80
KDAF 060	～60	8.20×3.50×2.60	7.5	1.5	0.37	200	200	150	80
KDAF 070	～70	9.20×3.80×2.60	11	1.5	0.37	250	250	150	80
KDAF 080	～80	10.30×3.90×2.60	11	1.5	0.55	250	250	200	80
KDAF 100	～100	10.50×4.50×2.60	15	1.5	0.55	250	250	200	80

Ⅳ 、The project site

DAF in Jiangsu China

DAF in Hubei China

DAF in Middle East

DAF export to Pakistan

DAF in working

DAF outflow

DAF in Vietnam

DAF in working

Thanks

KHN water treatment equipment Co., Ltd.

www. khnwatertreatment.com

sales@khnwatertreatment.com