



Application

Diffuser for a fine bubble diffused aeration system suitable for intermittent and continuous operation in biological sewage treatment plants.

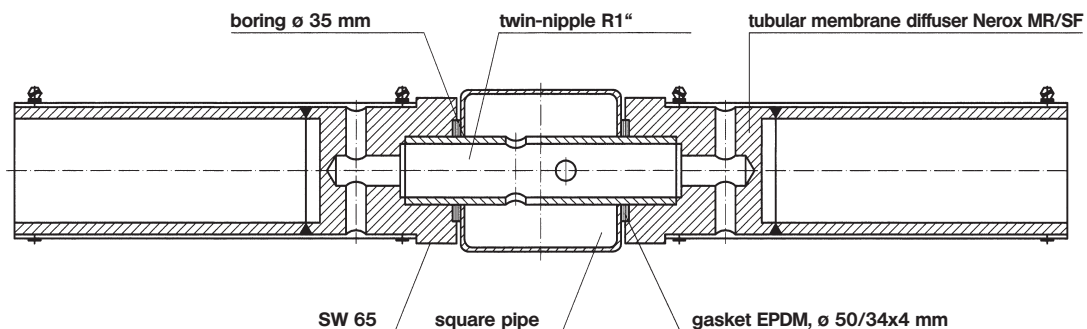
Description

Easy mountable diffuser with hexagon head and twin nipple to be mounted on square pipes in floodable, clearly buoyancy reduced design.

Long-lived fine slitted diffuser membranes made of **EPDM** with low content of plasticizer, **SILICON** or **NBR** for highest oxygen - transfer.

Standard sizes for diffuser sets

Nerox	Diffuser length (mm)	Perforated length (mm)	Perforated area (m ²)	Aeration area eff. (m ²)	Weight (kg)	Buoyancy (N)
MR 1000 SF	2 x 520	2 x 500	0,16	0,12	2,05	6,6
MR 1500 SF	2 x 770	2 x 750	0,25	0,19	2,85	6,6
MR 2000 SF	2 x 1020	2 x 1000	0,34	0,25	3,55	6,6



EPDM-, SILICON- and NBR-tubes are also available as a replacement for all types of diffusers in all dimensions.

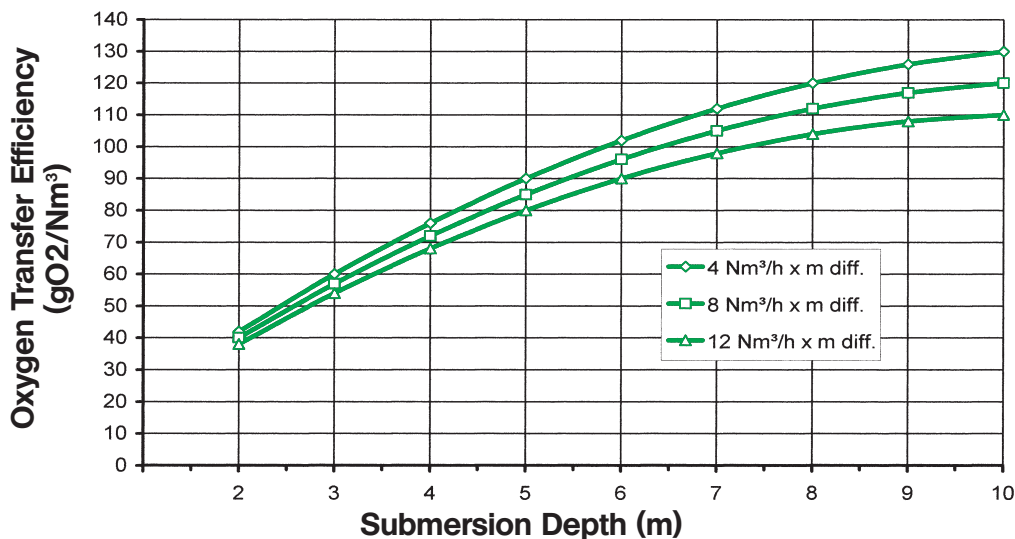
One set of DIDIER membrane tubular diffuser type Nerox MR/SF consists of:

- 2 fine perforated diffuser tubes made of EPDM with low content of plasticizer, SILICON or NBR. Total and perforation length each: 500 mm or 750 mm or 1000 mm or special dimensions. Slot length 1,1 mm.
- 2 PE-supporting pipes (Ø 63 x 5,8 mm), with hexagon head 65 mm, one site floodable, other site connection R 1" inside thread. Total length: 520 mm or 770 mm or 1020 mm or special dimensions.
- 2 gaskets Ø 50/34 x 4 mm made of EPDM centred.
- 4 hose band claps (re-usable) made of AISI 316.
- 1 twin nipple R 1", made of AISI 316 or AISI 304, 115 mm long for square pipe 60 x 60 mm, 135 mm long for square pipe 80 x 80 mm, 155 mm long for square pipe 100 x 100 mm or special dimensions.
The necessary through boring in true alignment in the square pipe is: Ø 35 1 mm.
- 1 set of assembly tool (2 spanner made of PE) each delivery.

Recommended air flow rate:

Minimum: $2 \text{ Nm}^3/\text{h} \times m_{\text{diffuser}}$ Standard: $8 \text{ Nm}^3/\text{h} \times m_{\text{diffuser}}$ Maximum: $12 \text{ Nm}^3/\text{h} \times m_{\text{diffuser}}$

The diffusers can be basically switched off, but it is recommendable not to operate the diffuser below the minimum air flow, so an entire opening of the perforation can be warranted.



The oxygen transfer efficiency depends on the arrangement, the depth of submergency, the diffuser density and the air flow rate of the diffusers. The oxygen transfer efficiency can only be warranted after design or checking by Didier Filtrertechnik.

