technical data page 1

Liste 17_1 80Grad

quotation item: **KRV 202606097-00 - 1.02**

designation:

date: **29.05.2026 / lhh**

fan type	BU serial no.	comm. no.
MXE031-011230-00 A	**1**	**Texro**

your order no.	type of control	codeword
	speed	**ATEX Fan**

fan type MXE031-011230-00 A

		OP 1*		units acc. to customer's specification	
type of connection		ducted			
operating condition		inlet operation			
handled gas		clean air			
designated volume flow		116.67	m³/min	7000	m³/h
designated static pressure increase		300	daPa	3000	Pa
humidity		0	g/kg	0	g/kg
gas constant	R	287	J/(kg K)	287	J/(kg K)
coefficient of adiabatic compressibility Kappa	K	1.4	-	1.4	-
inlet temperature	t1	20	°C	20	°C
discharge temperature	t2	23	°C	23	°C
altitude	h	0	m	0	m
abs. atmos. pressure	P0	101.325	kPa	101.325	kPa
athmos. density	ρ0	1.205	kg/m³	1.205	kg/m³
density at inlet	ρ1	1.169	kg/m³	1.169	kg/m³
volume flow	V1	116.67	m³/min	7000	m³/h
total pressure increase	Δpt	299	daPa	2986	Pa
dynamic pressure	pd2	35	daPa	350	Pa
dynamic pressure	pd1	36	daPa	364	Pa
static pressure increase	Δpst	300	daPa	3000	Pa
shaft power	PW	7.4	kW	7.4	kW
impeller speed	nl	2927	rpm	2927	rpm
rec. motor power	PM	11	kW	11	kW
motor synchronous speed	nM	2960	rpm	2960	rpm
m/s	m/s	74.64	m/s	74.64	m/s

A-weighted total sound power level			
inlet	LwAi1	97	dB(A)
discharge	LwAi2	98	dB(A)
correct.value A-weight.dB(A)	dLkA	7	dB(A)
A-weighted meas.surf.sound pressure level at 1m distance with			
both sides ducted	LpAm	67	dB(A)
free inlet	LpA5	88	dB(A)
free discharge	LpA6	89	dB(A)
superficial dimension	Ls-k	15	dB
characteristic curve type	Δp/Pw	6/6	-
efficiency at total pressure increase	ηtot	78.2	%
efficiency at static pressure increase	ηstat	78.6	%

* BP 1 : BP1

DN1 SFV1.0 EV1.0 RE1.0 AKZ1.0 AKZ2.0 AKZ1.1 GNr1 3.0.7.29

Tolerances as per accuracy class according to ISO 13348:2025-06.
Allocation of accuracy classes according to ISO 13348:2025-06.
Terminology and classification according to DIN EN ISO 13349-2012-07.

pressure units : 1 daPa = 10 Pa = 10 N/m² = 0,1 mbar = 1,0197 mmWS

class of accuracy		AN2	AN3	AN4
Δpt und V1	[%]	+/- 2,5	+/- 5	+/- 10
PW	[%]	+ 3	+ 8	+ 16
Lw und Lp	[dB]	+ 3	+ 4	+ 6

FAN CHARACTERISTIC CURVE

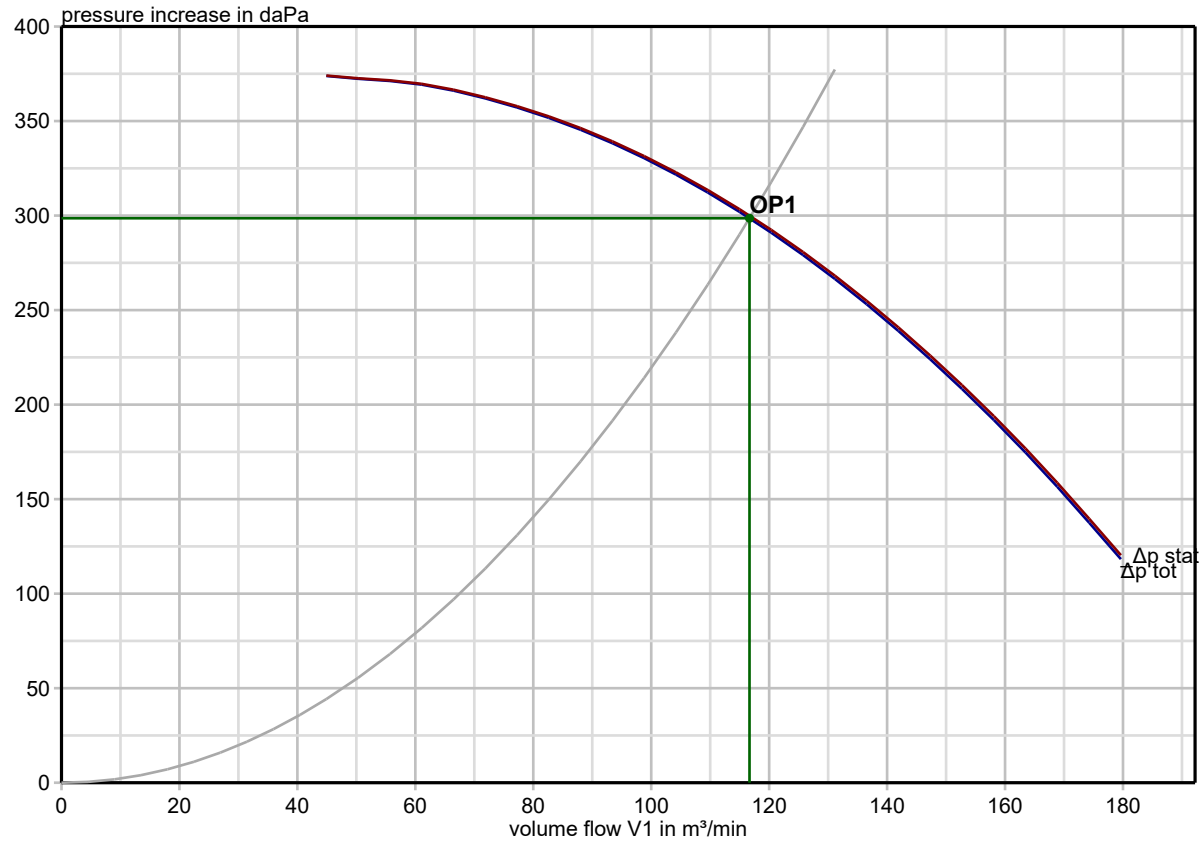
Liste 17_1 80Grad

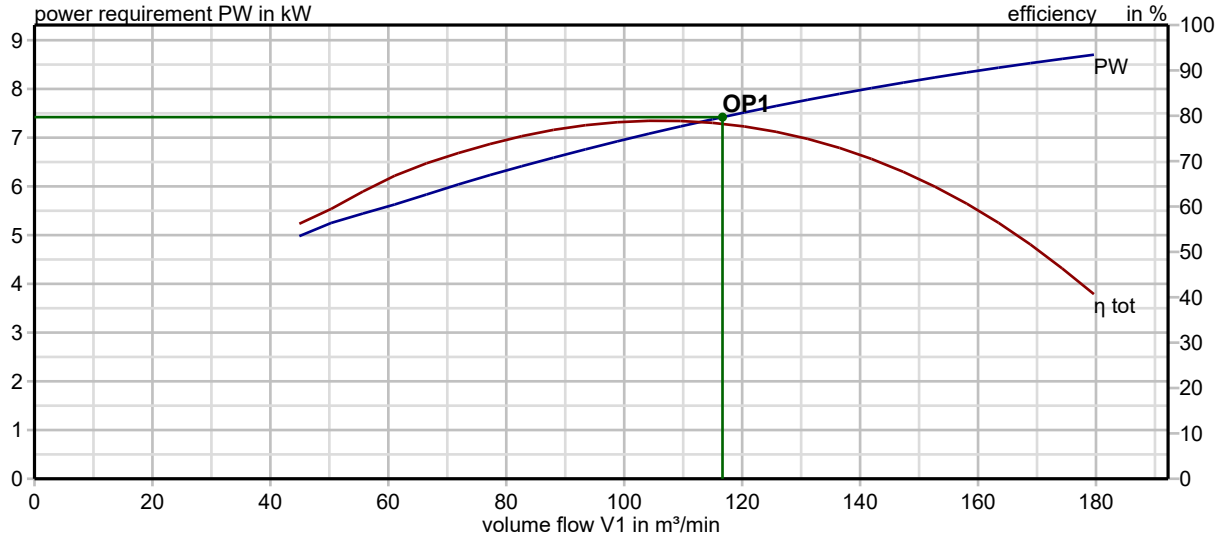
quotation item: **KRV 202606097-00 - 1.02**

designation:

date: **29.05.2026 / lhh**

fan type	BU serial no.	comm. no.
MXE031-011230-00 A	**1**	**Texro**
your order no.	**type of control**	**codeword**
	speed	**ATEX Fan**





		NP	OP 1	OP 2	OP 3	OP 4	OP 5	OP 6	OP 7	OP 8	OP 9	OP 10
volume flow V1	**m³/min**		116.7									
total pressure increase Δpt	**daPa**		299									
density at inlet ρ1	**kg/m³**		1.169									
impeller speed nl	**rpm**		2927									
inletguidevane/damp.												

DN1 SFV1.0 EV1.0 RE1.0 AKZ1.0 AKZ2.0 AKZ1.1 GNr1 3.0.7.29

Tolerances as per accuracy class according to ISO 13348:2025-06.
Allocation of accuracy classes according to ISO 13348:2025-06.
Terminology and classification according to DIN EN ISO 13349-2012-07.

pressure units : 1 daPa = 10 Pa = 10 N/m² = 0,1 mbar = 1,0197 mmWS

class of accuracy		AN2	AN3	AN4
Δpt und V1	[%]	+/- 2,5	+/- 5	+/- 10
PW	[%]	+ 3	+ 8	+ 16
Lw und Lp	[dB]	+ 3	+ 4	+ 6

SOUND DATA

Liste 17_1 80Grad

quotation item	KRV 202606097-00 - 1.02
designation	
date	29.05.2026 / lhh

fan type	BU serial no.	comm. no.
MXE031-011230-00 A	1	Texro
your order no.	**type of control**	**codeword**
	speed	ATEX Fan

technical data of fan at ρ-1 =1.169 kg/m³ (OP 1 BP1) :

total pressure increase	Δpt	299	daPa	volume flow	V1	116.67	m³/min
impeller speed	nl	2927	rpm	shaft power	PW	7.4	kW
no. of blades	z	9	-	main residual frequency	f	439	Hz
drive motor	PM	11	kW	motor speed	nM	2960	rpm

sound data:

superficial dimension	Ls-k	14.9	dB	corr. value A-weighting	dlkA	7.3	dB(A)
A-weighted total sound power level at inlet:	LwAi1	96.9	dB(A)	at discharge	LwAi2	98.1	dB(A)
A-weighted free inlet resp. free discharge sound pressure level at 1m distance from hemisphere radius at inlet:	LpA5	87.6	dB(A)	at discharge	LpA6	88.9	dB(A)
A-weighted external sound power level					LwAa	82.1	dB(A)
A-weighted meas. surf. sound pressure level					LpA	67.2	dB(A)
A-weight. meas.surface sound pressure level of drive				LpAMo		65.0	dB(A)
A-weight. meas. surface sound press.level fan and drive				LpAMo+LpA			dB(A)

sound correction value

speed correction	dLn	0	dB	deviation of nominal point	dLbp	0	dB
density correction	dLt	0	dB	other corrections	dLs	0	dB

octave spectrum

frequency	fm in Hz	63	125	250	500	1000	2000	4000	8000	Dim
main residual frequ.	dLD-okt	0.0	0.0	0.0	2.1	0.5	0.1	0.0	0.0	dB
relative octave spectrum	dLw-okt	-4.7	-5.4	-7.1	-9.7	-13.2	-17.6	-23.0	-29.2	dB
A-weighting	dLA	-26.2	-16.1	-8.6	-3.2	0.0	1.2	1.0	-1.1	dB
total sound power	Lwi2-okt	100.4	99.7	98.0	97.5	92.3	87.5	82.2	75.9	dB
	Lwi1-okt	99.2	98.4	96.7	96.2	91.1	86.3	80.9	74.7	dB
	LwAi2-okt	74.2	83.6	89.4	94.3	92.3	88.7	83.2	74.8	dB(A)
	LwAi1-okt	73.0	82.3	88.1	93.0	91.1	87.5	81.9	73.6	dB(A)
A-weighted external sound power level	LwAa-okt	58.2	67.5	73.3	78.2	76.3	72.7	67.1	58.8	dB(A)
A-weighted meas. surf. sound pressure level	LpA-okt	43.3	52.6	58.4	63.3	61.4	57.8	52.2	43.9	dB(A)

Remark : The rounding of the values to whole figures results necessarily in differences of further calculations.
When calculating the measuring surface sound pressure level a reduction of 3 dB for self shielding of the fan housing is to be taken into account.
LpA = LwAa - Ls - 3 dB(A) / The sound data refer to the fan without considering sound insulation and motor.

DN1 SFV1.0 EV1.0 RE1.0 AKZ1.0 AKZ2.0 AKZ1.1 GNr1 3.0.7.29

Tolerances as per accuracy class according to ISO 13348:2025-06.
Allocation of accuracy classes according to ISO 13348:2025-06.
Terminology and classification according to DIN EN ISO 13349-2012-07.

pressure units : 1 daPa = 10 Pa = 10 N/m² = 0,1 mbar = 1,0197 mmWS

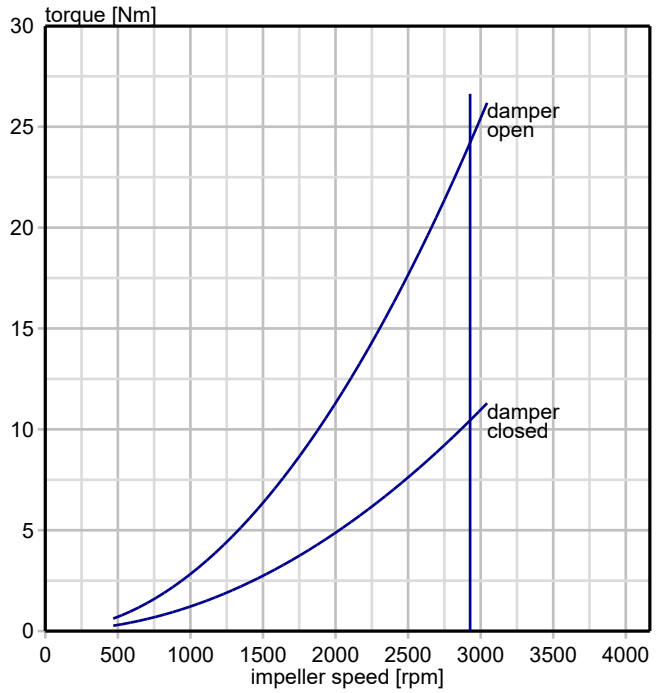
class of accuracy		AN2	AN3	AN4
Δpt und V1	[%]	+/- 2,5	+/- 5	+/- 10
PW	[%]	+ 3	+ 8	+ 16
Lw und Lp	[dB]	+ 3	+ 4	+ 6

TORQUE DIAGRAM

Liste 17_1 80Grad

quotation item	KRV 202606097-00 - 1.02
designation	
date	29.05.2026 / lhh

fan type **MXE031-011230-00 A**	BU serial no. **1**	comm. no. **Texro**
your order no.	type of control speed	codeword **ATEX Fan**



design point : OP1 ———

V1	=	117	m³/min
Δpt	=	299	daPa
PW	=	7.4	kW
nl	=	2927	rpm
ρ1	=	1.169	kg/m³
J (imp.)	=	0.840	kgm²

DN1 SFV1.0 EV1.0 RE1.0 AKZ1.0 AKZ2.0 AKZ1.1 GNr1 3.0.7.29

Tolerances as per accuracy class according to ISO 13348:2025-06.
Allocation of accuracy classes according to ISO 13348:2025-06.
Terminology and classification according to DIN EN ISO 13349-2012-07.

pressure units : 1 daPa = 10 Pa = 10 N/m² = 0,1 mbar = 1,0197 mmWS

class of accuracy		AN2	AN3	AN4
Δpt und V1	[%]	+/- 2,5	+/- 5	+/- 10
PW	[%]	+ 3	+ 8	+ 16
Lw und Lp	[dB]	+ 3	+ 4	+ 6

MOTOR DATA / START-UP

Liste 17_1 80Grad

quotation item	KRV 202606097-00 - 1.02
designation	
date	29.05.2026 / lhh

fan type **MXE031-011230-00 A**	BU serial no. **1**	comm. no. **Texro**
your order no.	type of control speed	codeword **ATEX Fan**

The following data apply to the fan nominal point.

Start-up data

rated output motor torque	35.5	Nm
torque Y	28.76	Nm
torque Δ	106.5	Nm
load torque in NP	24.44	Nm
load torque damper closed	12.22	Nm
moment of inertia relative to nM	0.86	kgm²
start-up time in NP Y	14.0	s
start-up time closed damper Y	11.1	s
start-up time in NP Δ	2.7	s
start-up time closed damper Δ	2.6	s
theoretical starting time	4.4	s
mass inertia ratio Iv/Im	17.8	-

Δ-start-up possible (DOL start-up)

YΔ-start-up possible (star-delta start-up)

Tolerances as per accuracy class according to ISO 13348:2025-06.
Allocation of accuracy classes according to ISO 13348:2025-06.
Terminology and classification according to DIN EN ISO 13349-2012-07.

pressure units : 1 daPa = 10 Pa = 10 N/m² = 0,1 mbar = 1,0197 mmWS

class of accuracy		AN2	AN3	AN4
Δpt und V1	[%]	+/- 2,5	+/- 5	+/- 10
PW	[%]	+ 3	+ 8	+ 16
Lw und Lp	[dB]	+ 3	+ 4	+ 6