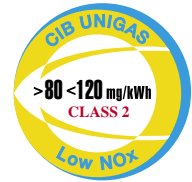


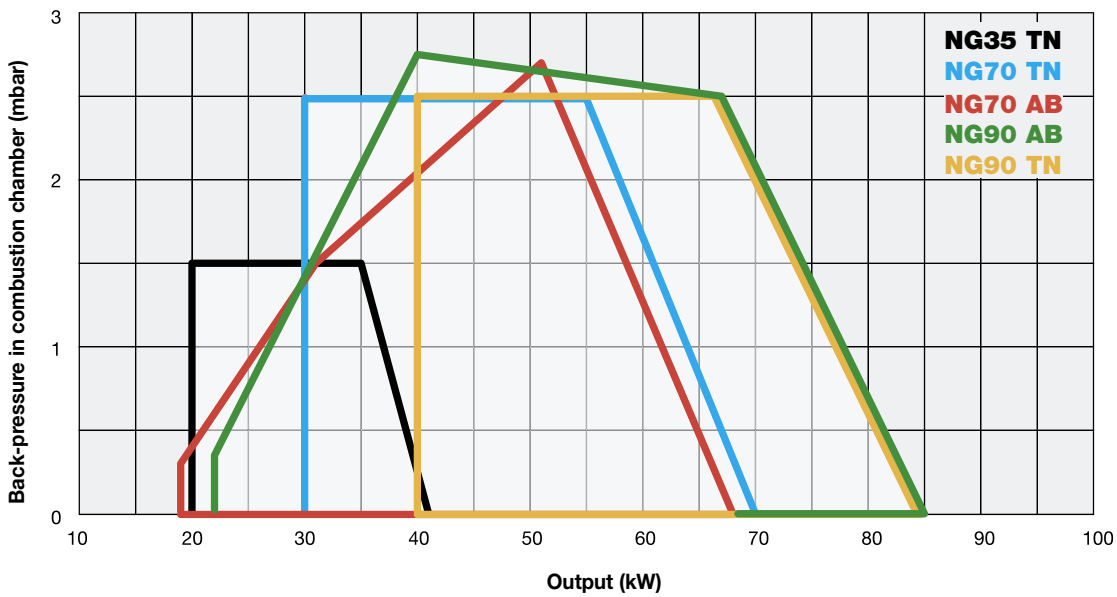
idea SERIES **NG35 NG70 NG90**

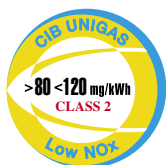


GAS

These burners with tangential ventilation are, in terms of dimensions and output, the smallest burners of the new line IDEA gas **Low NO_x Class 2 (< 120 mg/KWh)** available in five different aluminium housings.

NG35 burner can be arranged to use external combustion air on request. In this case the burner will be supplied with a watertight and airtight air intake, linked outside by means of a duct ten meters long.





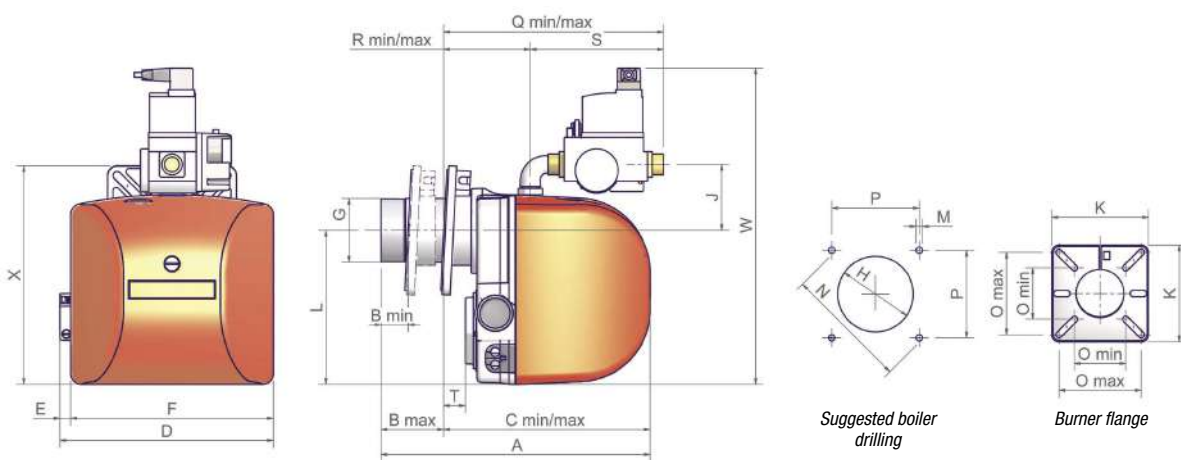
GAS

NG35 NG70 NG90 *idea* SERIES

TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
NG35	M-.TN.x.xx.A.0.xx	20	41	230 V 1N ac	0,075	½"
NG70	M-.TN.x.xx.A.0.xx	30	70	230 V 1N ac	0,1	½"
NG70	M-.AB.x.xx.A.0.xx	19	68	230 V 1N ac	0,1	½"
NG90	M-.TN.x.xx.A.0.xx	40	85	230 V 1N ac	0,1	½" - ¾"
NG90	M-.AB.x.xx.A.0.xx	22	85	230 V 1N ac	0,1	½" - ¾"

For the configuration of the gas train, see page 101.

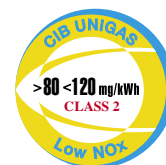


Type	Packaging dimensions (mm)			
	l	p	h	kg
NG35	290	260	490	10
NG70	400	300	520	14
NG90	400	300	520	14

Approximate values

Type	Model	Overall dimensions (mm)																										
		A		B		C		D	E	F	G	H	J	K	L	M	N	O		P	Q		R		S	T	W	X
		min.	max.	min.	max.													min.	max.		min.	max.	min.	max.	min.			
NG35	M-.TN.S.xx.A.0.15	338	34	78	260	305	269	14	255	80	95	86	162	194	M8	158	86	138	112	277	322	109	154	180	27	400	275	
NG35	M-.TN.L.xx.A.0.15	416	34	156	260	383	269	14	255	80	95	86	162	194	M8	158	86	138	112	277	400	109	232	180	27	400	275	
NG70	M-.xx.S.xx.A.0.15	365	34	78	287	332	305	14	291	80	95	99	162	218	M8	158	86	138	112	285	330	118	163	180	14	438	299	
NG70	M-.xx.L.xx.A.0.15	443	34	156	287	410	305	14	291	80	95	99	162	218	M8	158	86	138	112	285	408	118	241	180	14	438	299	
NG90	M-.xx.S.xx.A.0.15	365	34	70	295	331	305	14	291	80	95	99	162	218	M8	158	86	138	112	293	329	125	203	180	2	438	299	
NG90	M-.xx.L.xx.A.0.15	443	34	148	295	409	305	14	291	80	95	99	162	218	M8	158	86	138	112	293	407	125	239	180	2	438	299	

Approximate values



MECHANICAL OPERATION

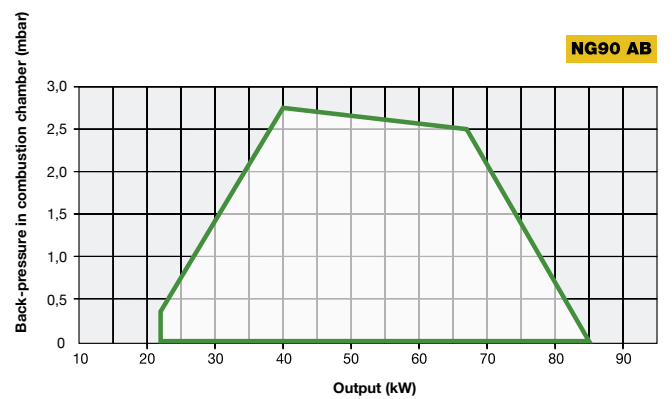
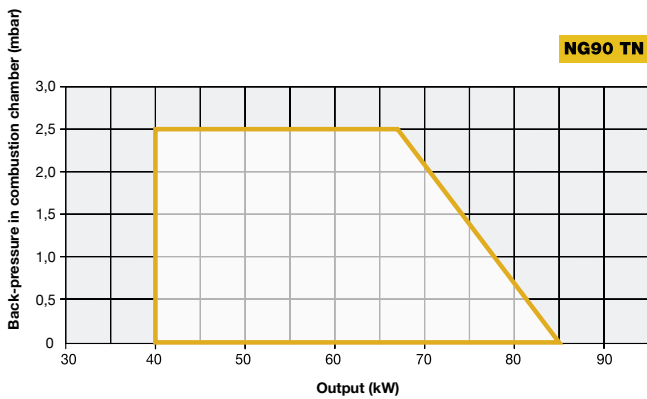
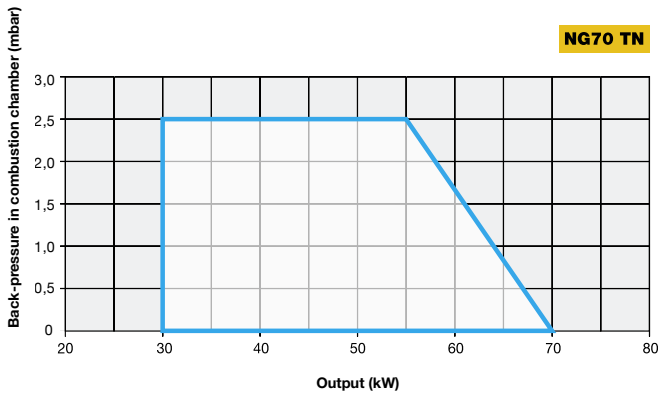
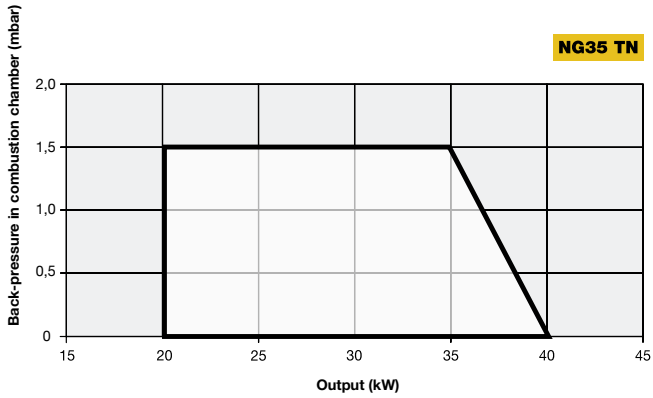
Model	Gas train	Operation	NG35		NG70		NG90	
			Code	Price €	Code	Price €	Code	Price €
M-.TN.S.xx.A.0.15	1/2"	TN	024011041		025010941		025010541	
M-.TN.S.xx.A.0.20	3/4"	TN	-		-		025010741	
M-.TN.S.xx.Z.0.15 ◆	1/2"	TN	024011241		-		-	
M-.AB.S.xx.A.0.15	1/2"	AB	-		025010942		025010542	
M-.AB.S.xx.A.0.20	3/4"	AB	-		-		025010742	

S = Standard combustion head (BS)

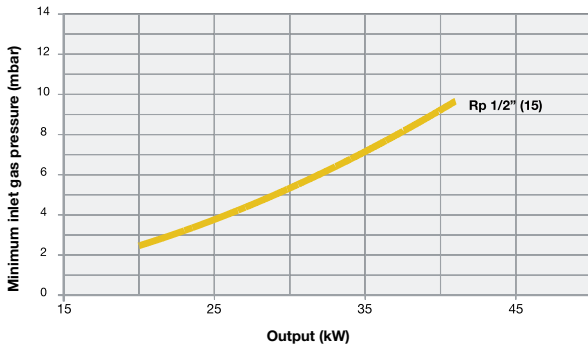
L = For long combustion head version (BL) increase the price (see price list)

◆ Burner equipped with external air inlet.

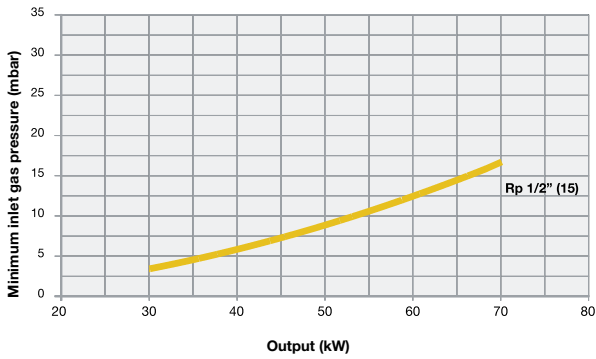
In compliance with GAR DIRECTIVE 2016/426/EU



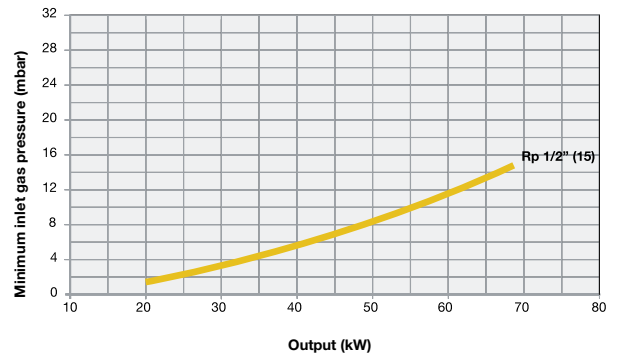
NG35 TN



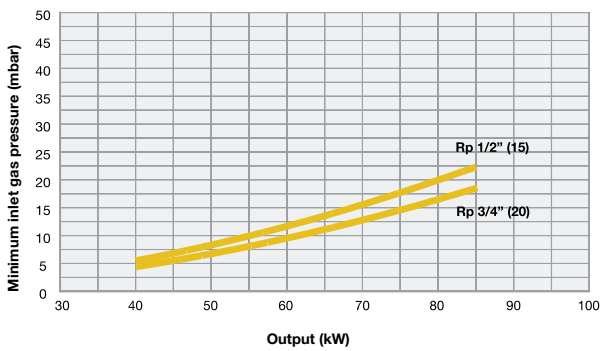
NG70 TN



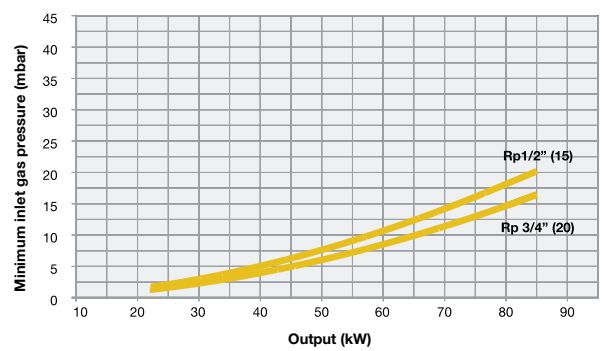
NG70 AB



NG90 TN



NG90 AB

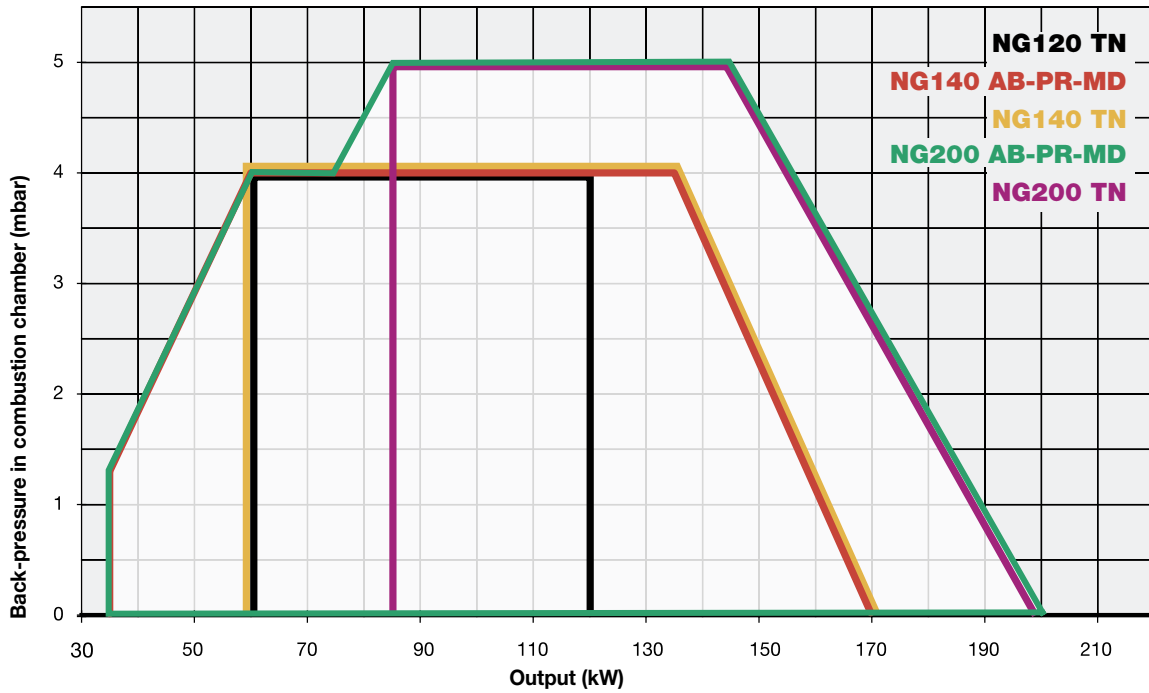


Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.



NG120 NG140 NG200 **idea** SERIES

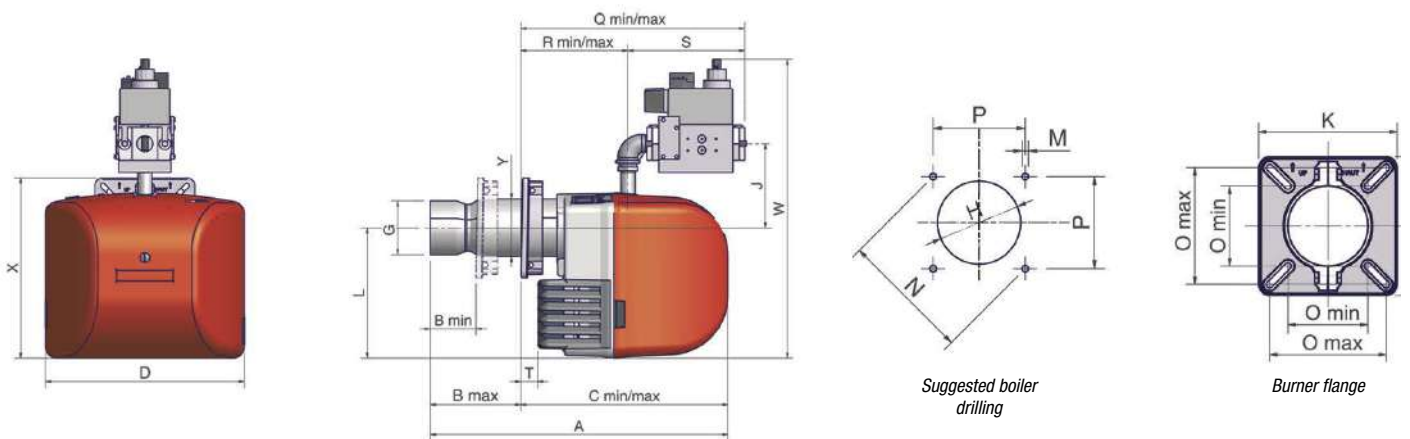
This series of burners represents, in terms of dimensions and output, the small-medium series of the new line IDEA standard **Low NO_x Class 2 (< 120 mg/kWh)** with tangential ventilation. These burners are particularly suitable to work on high efficiency boilers. The burner is designed to be aesthetic and functional, giving at the same time prominence to innovative technologies.



TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
NG120	M-.TN.x.xx.A.0.15	60	120	230 V 1N ac	0,18	½"
NG140	M-.TN.x.xx.A.0.xx	60	170	230 V 1N ac	0,18	¾" - 1"
NG140	M-.xx.x.xx.A.0.xx	35	170	230 V 1N ac	0,18	¾" - 1"
NG200	M-.TN.x.xx.A.0.xx	85	200	230 V 1N ac	0,18	¾" - 1"
NG200	M-.xx.x.xx.A.0.xx	42	200	230 V 1N ac	0,18	¾" - 1"

For the configuration of the gas train, see page 101.

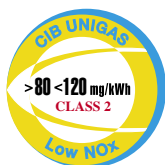


Type	Packaging dimensions (mm)			
	l	p	h	kg
NG120/140/200 S	600	370	400	25
NG120/140/200 L	750	370	400	25

Approximate values

Type	Model	Overall dimensions (mm)																								
		A	B		C		D	G	H	J	K	L	M	N	O		P	Q		R		S	T	W	X	Y
		min.	max.	min.	max.										min.	max.		min.	max.	min.	max.	min.				
NG120	M-.xx.S.xx.A.0.15	560	85	170	390	475	374	101	128	161	188	245	M8	188	109	158	133	382	467	202	287	180	32	537	340	Ø108
NG120	M-.xx.L.xx.A.0.15	660	85	270	390	575	374	101	128	161	188	245	M8	188	109	158	133	382	567	202	387	180	32	537	340	Ø108
NG140	M-.xx.S.xx.A.0.20	560	85	170	390	475	374	101	128	161	188	245	M8	188	109	158	133	382	467	202	287	180	32	537	340	Ø108
NG140	M-.xx.L.xx.A.0.20	660	85	270	390	575	374	101	128	161	188	245	M8	188	109	158	133	382	567	202	387	180	32	537	340	Ø108
NG140	M-.xx.S.xx.A.0.25	560	85	170	390	475	374	101	128	161	188	245	M8	188	109	158	133	426	511	202	287	224	32	565	340	Ø108
NG140	M-.xx.L.xx.A.0.25	660	85	270	390	575	374	101	128	161	188	245	M8	188	109	158	133	426	611	202	387	224	32	565	340	Ø108
NG200	M-.xx.S.xx.A.0.20	560	85	170	390	475	374	117	137	161	188	245	M8	188	109	158	133	382	467	202	287	180	32	537	340	Ø108
NG200	M-.xx.L.xx.A.0.20	660	85	270	390	575	374	117	137	161	188	245	M8	188	109	158	133	382	567	202	387	180	32	537	340	Ø108
NG200	M-.xx.S.xx.A.0.25	560	85	170	390	475	374	117	137	161	188	245	M8	188	109	158	133	426	511	202	287	224	32	565	340	Ø108
NG200	M-.xx.L.xx.A.0.25	660	85	270	390	575	374	117	137	161	188	245	M8	188	109	158	133	426	611	202	387	224	32	565	340	Ø108

Approximate values


MECHANICAL OPERATION

Model	Gas train	Operation	NG120		NG140		NG200	
			Code	Price €	Code	Price €	Code	Price €
M-.TN.S.xx.A.0.15	½"	TN	026010141		-		-	
M-.TN.S.xx.A.0.20	¾"	TN	-		026010341		026010941	
M-.TN.S.xx.A.0.25	1"	TN	-		026010541		026011141	
M-.AB.S.xx.A.0.20	¾"	AB	-		026010342		026010942	
M-.AB.S.xx.A.0.25	1"	AB	-		026010542		026011142	
M-.PR.S.xx.A.0.25	1"	PR (*)	-		026010543		026011143	

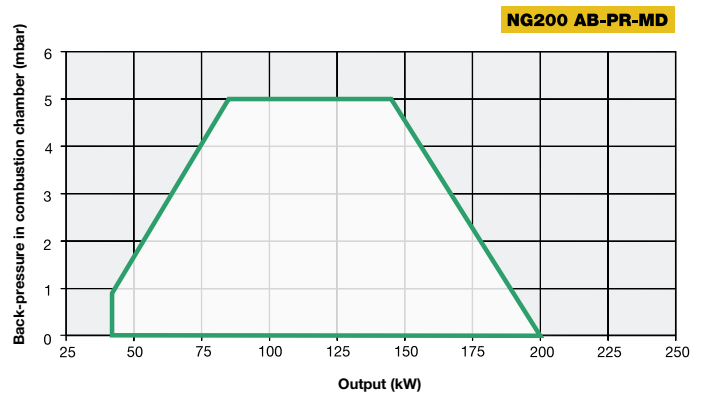
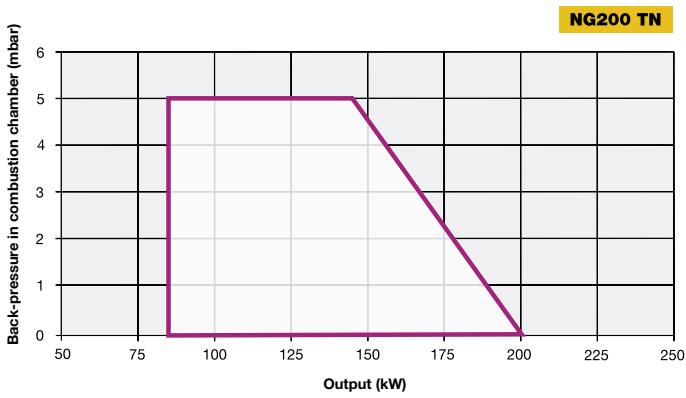
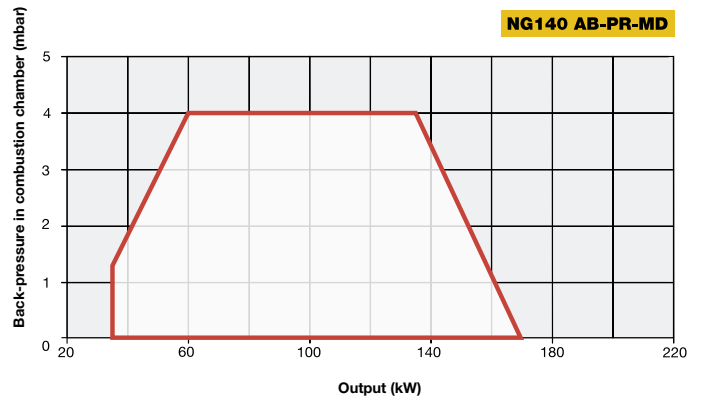
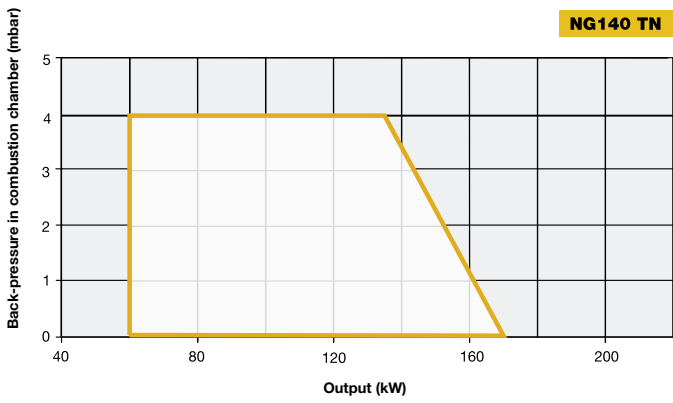
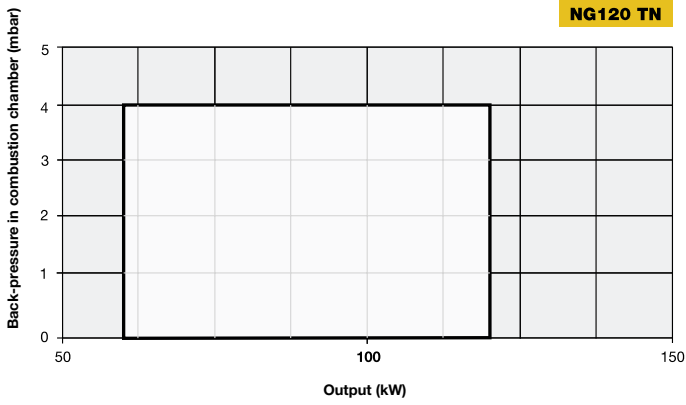
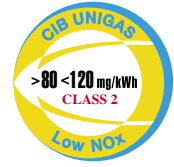
S = Standard combustion head (BS)

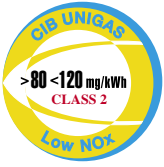
L = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add (see price list)

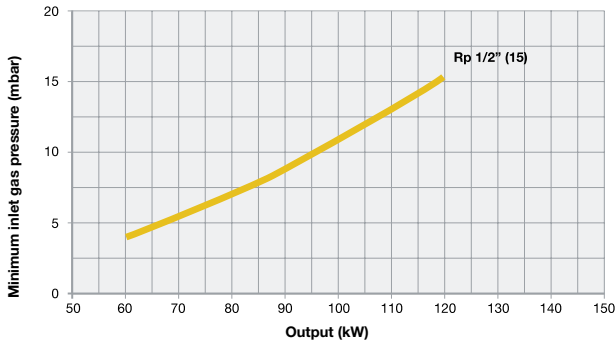
In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

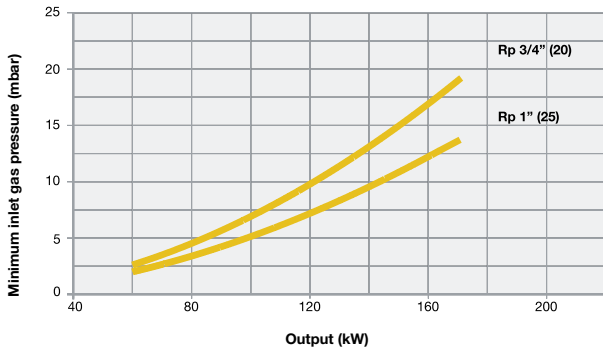




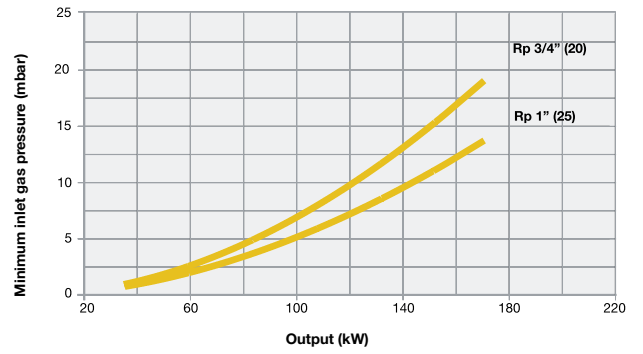
NG120 TN



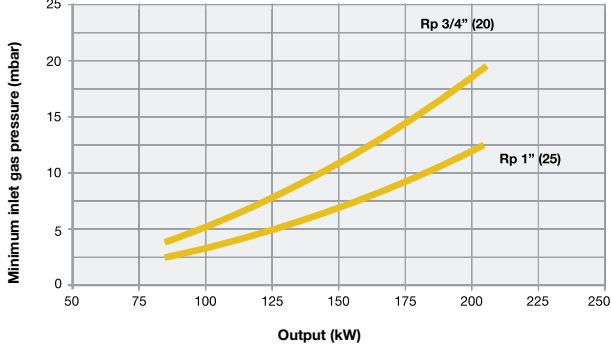
NG140 TN



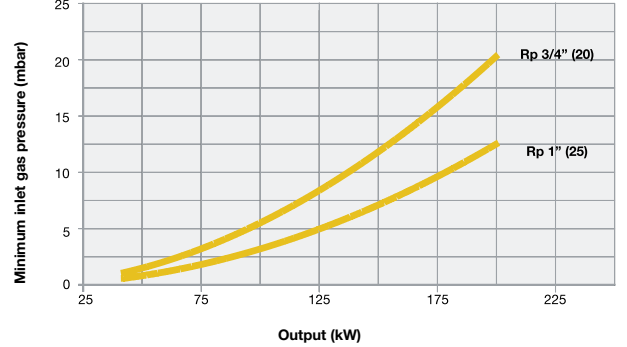
NG140 AB-PR-MD



NG200 TN

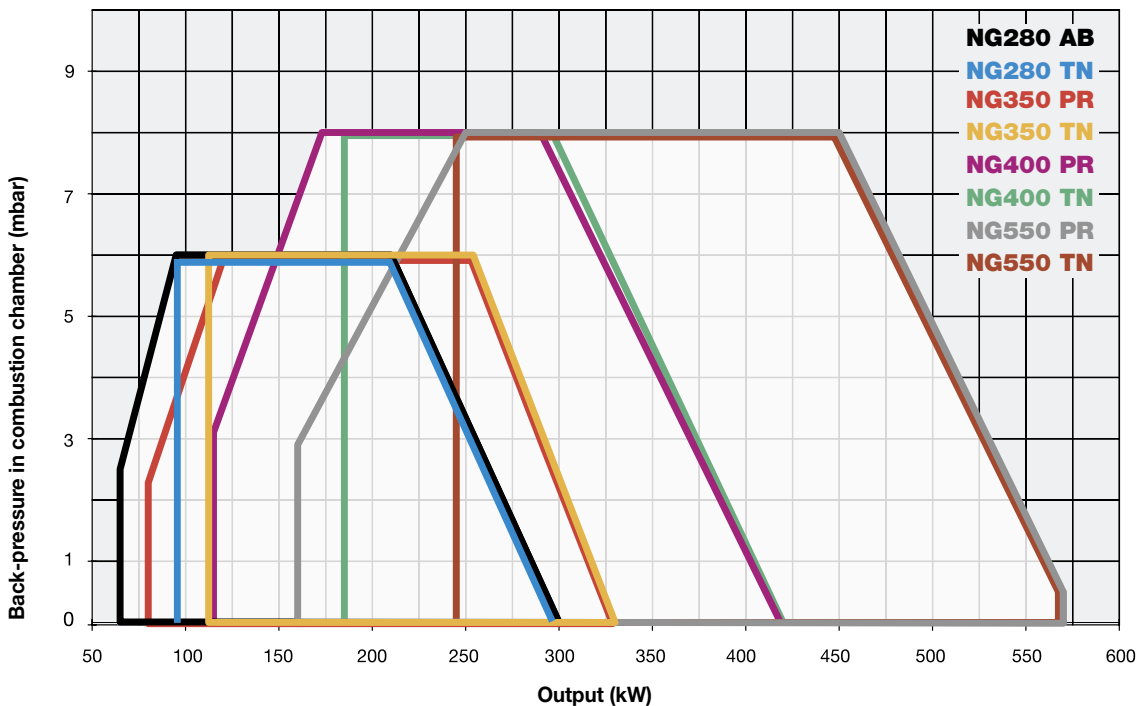


NG200 AB-PR-MD



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

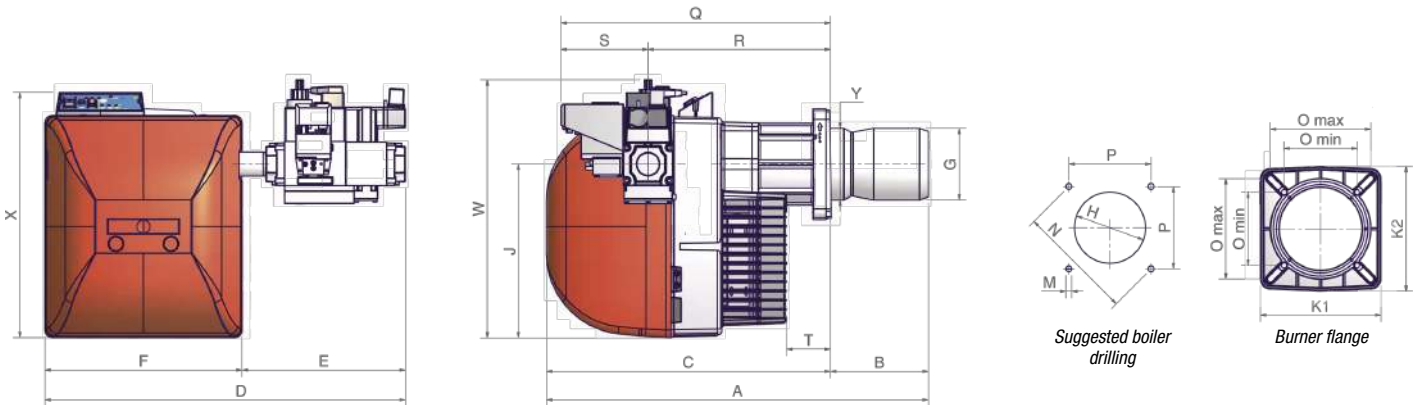
With the new line IDEA Low NO_x Class 2 (< 120 mg/kWh), CIB UNIGAS presents on the market a new conception of modern and functional burners for small and medium appliances with a tangential ventilation. These burners, which are the most powerful of the range IDEA, are particularly suitable to work on the boilers with high back pressure.



TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
NG280	M-.TN.x.xx.A.0.xx	95	300	230 V 1N ac	0,25	1" - 1"¼ - 1"½
NG280	M-.xx.x.xx.A.0.xx	65	300	230 V 1N ac	0,25	1" - 1"¼ - 1"½
NG350	M-.TN.M.xx.A.0.xx	115	330	230 V 1N ac	0,37	1" - 1"¼ - 1"½
NG350	M-.xx.M.xx.A.0.xx	80	330	230 V 1N ac	0,37	1" - 1"¼ - 1"½
NG400	M-.TN.M.xx.A.0.xx	185	420	230 V 1N ac	0,37	1" - 1"¼ - 1"½ - 2"
NG400	M-.xx.M.xx.A.0.xx	115	420	230 V 1N ac	0,37	1" - 1"¼ - 1"½ - 2"
NG550	M-.TN.x.xx.A.0.xx	245	570	230 V 1N ac	0,62	1"¼ - 1"½ - 2"
NG550	M-.xx.x.xx.A.0.xx	160	570	230 V 1N ac	0,62	1"¼ - 1"½ - 2"

For the configuration of the gas train, see page 101.



Type	Packaging dimensions (mm)			
	l	p	h	kg
NG280/350/400	1120	440	580	42
NG550	1200	460	630	55

Approximate values

Type	Model	Overall dimensions (mm)																								
		A		B		C	D	E	F	G	H	J	K		M	N	O		P	Q	R	S	T	W	X	Y
		stand.	long	stand.	long								1	2			min.	max.								
NG280	M-.TN.x.xx.A.0.25/32	733	878	163	308	570	596	200	396	117	137	348	215	223	M10	219	131	179	155	541	366	175	128	508	491	108
NG280	M-.xx.x.xx.A.0.40	733	878	163	308	570	726	330	396	117	137	348	215	223	M10	219	131	179	155	541	366	175	128	517	491	108
NG350	M-.xx.M.xx.A.0.25/32	748	878	178	308	570	596	200	396	125	164	348	215	223	M10	219	131	179	155	541	366	175	89	508	491	144
NG350	M-.xx.M.xx.A.0.40	748	878	178	308	570	726	330	396	125	164	348	215	223	M10	219	131	179	155	541	366	175	89	517	491	144
NG400	M-.xx.M.xx.A.0.25/32	768	898	198	328	570	596	200	396	144	164	348	215	223	M10	219	131	179	155	541	366	175	89	508	491	144
NG400	M-.xx.M.xx.A.0.40	768	898	198	328	570	726	330	396	144	164	348	215	223	M10	219	131	179	155	541	366	175	89	517	491	144
NG400	M-.xx.M.xx.A.0.50	768	898	198	328	570	726	330	396	144	164	348	215	223	M10	219	131	179	155	541	366	175	89	567	491	144
NG550	M-.xx.x.xx.A.0.32	843	943	253	353	590	671	245	426	158	178	384	241	241	M10	247	157	192	174	552	377	175	69	543	533	155
NG550	M-.xx.x.xx.A.0.40	843	943	253	353	590	744	318	426	158	178	384	241	241	M10	247	157	192	174	552	377	175	69	553	533	155
NG550	M-.xx.x.xx.A.0.50	843	943	253	353	590	744	318	426	158	178	384	241	241	M10	247	157	192	174	552	377	175	69	603	533	155

Approximate values

MECHANICAL OPERATION

Model	Gas train	Operation	NG280		NG350	
			Code	Price €	Code	Price €
M-.TN.S.xx.A.0.25	1"	TN	027011741	-	-	-
M-.TN.S.xx.A.0.32	1"¼	TN	027011941	-	-	-
M-.TN.S.xx.A.0.40	1"½	TN	027012141	-	-	-
M-.AB.S.xx.A.0.25	1"	AB	027011742	-	-	-
M-.AB.S.xx.A.0.32	1"¼	AB	027011942	-	-	-
M-.AB.S.xx.A.0.40	1"½	AB	027012142	-	-	-
M-.PR.S.xx.A.0.25	1"	PR (*)	027011743	-	-	-
M-.PR.S.xx.A.0.32	1"¼	PR (*)	027011943	-	-	-
M-.PR.S.xx.A.0.40	1"½	PR (*)	027012143	-	-	-
M-.TN.M.xx.A.0.25	1"	TN	-	-	027010141	-
M-.TN.M.xx.A.0.32	1"¼	TN	-	-	027010241	-
M-.TN.M.xx.A.0.40	1"½	TN	-	-	027010341	-
M-.PR.M.xx.A.0.25	1"	PR (*)	-	-	027010143	-
M-.PR.M.xx.A.0.32	1"¼	PR (*)	-	-	027010243	-
M-.PR.M.xx.A.0.40	1"½	PR (*)	-	-	027010343	-

Model	Gas train	Operation	NG400		NG550	
			Code	Price €	Code	Price €
M-.TN.M.xx.A.0.25	1"	TN	027010441	-	-	-
M-.TN.M.xx.A.0.32	1"¼	TN	027010541	-	-	-
M-.TN.M.xx.A.0.40	1"½	TN	027010641	-	-	-
M-.TN.M.xx.A.0.50	2"	TN	027010741	-	-	-
M-.PR.M.xx.A.0.25	1"	PR (*)	027010443	-	-	-
M-.PR.M.xx.A.0.32	1"¼	PR (*)	027010543	-	-	-
M-.PR.M.xx.A.0.40	1"½	PR (*)	027010643	-	-	-
M-.PR.M.xx.A.0.50	2"	PR (*)	027010743	-	-	-
M-.TN.S.xx.A.0.32	1"¼	TN	-	-	028010141	-
M-.TN.S.xx.A.0.40	1"½	TN	-	-	028010341	-
M-.TN.S.xx.A.0.50	2"	TN	-	-	028010541	-
M-.PR.S.xx.A.0.32	1"¼	PR (*)	-	-	028010143	-
M-.PR.S.xx.A.0.40	1"½	PR (*)	-	-	028010343	-
M-.PR.S.xx.A.0.50	2"	PR (*)	-	-	028010543	-

S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

M = Short and long reversible combustion head

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU



NG280 NG350 NG400 NG550 **idea** SERIES

ELECTRONIC OPERATION

Model	Gas train	Operation	NG280		NG350	
			Code	Price €	Code	Price €
M-.PR.S.xx.A.1.25.EA	1"	PR (*)	02701175A		-	
M-.PR.S.xx.A.1.32.EA	1"¼	PR (*)	02701195A		-	
M-.PR.S.xx.A.1.40.EA	1"½	PR (*)	02701215A		-	
M-.PR.M.xx.A.1.25.EA	1"	PR (*)	-		02701015A	
M-.PR.M.xx.A.1.32.EA	1"¼	PR (*)	-		02701025A	
M-.PR.M.xx.A.1.40.EA	1"½	PR (*)	-		02701035A	

Model	Gas train	Operation	NG400		NG550	
			Code	Price €	Code	Price €
M-.PR.M.xx.A.1.25.EA	1"	PR (*)	02701045A		-	
M-.PR.M.xx.A.1.32.EA	1"¼	PR (*)	02701055A		-	
M-.PR.M.xx.A.1.40.EA	1"½	PR (*)	02701065A		-	
M-.PR.M.xx.A.1.50.EA	2"	PR (*)	02701075A		-	
M-.PR.S.xx.A.1.32.EA	1"¼	PR (*)	-		02801015A	
M-.PR.S.xx.A.1.40.EA	1"½	PR (*)	-		02801035A	
M-.PR.S.xx.A.1.50.EA	2"	PR (*)	-		02801055A	

S = Standard combustion head (BS)

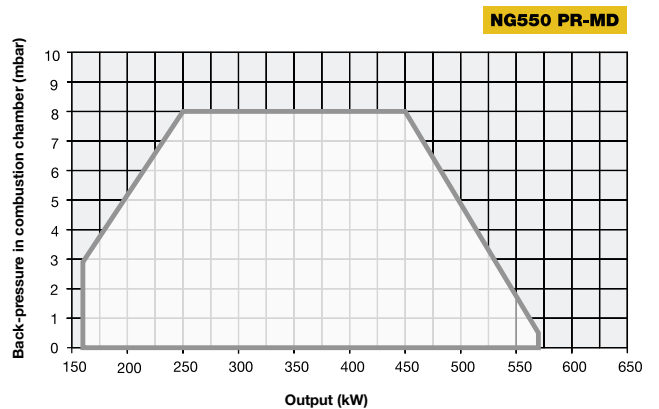
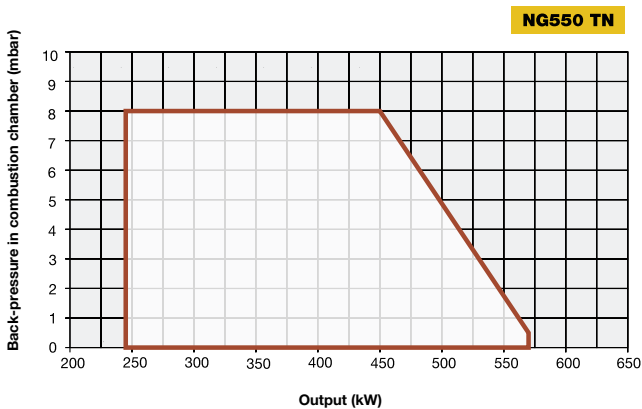
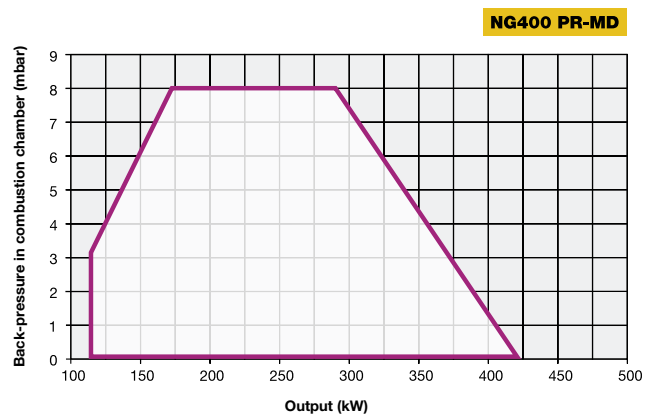
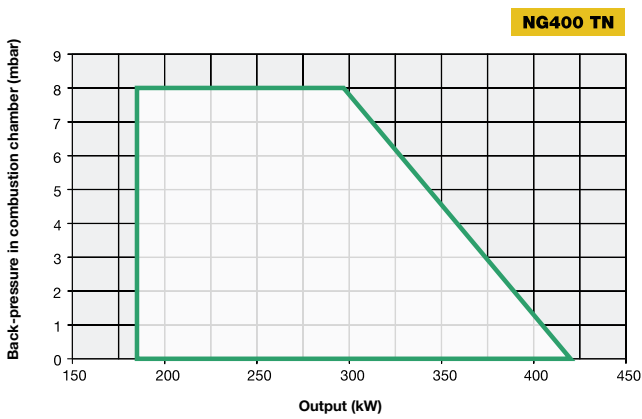
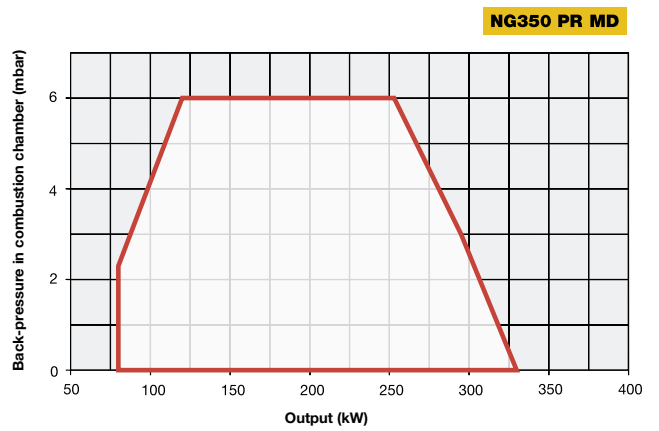
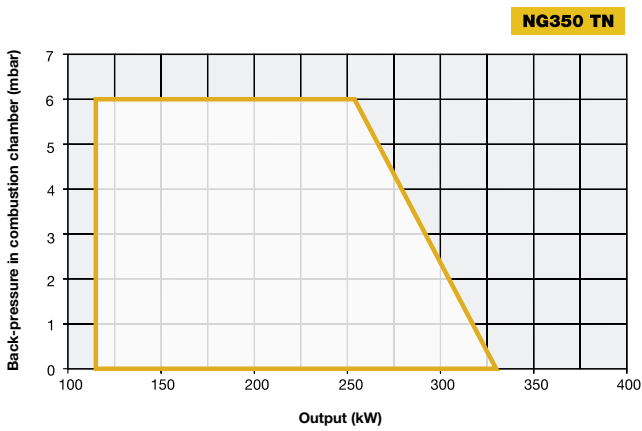
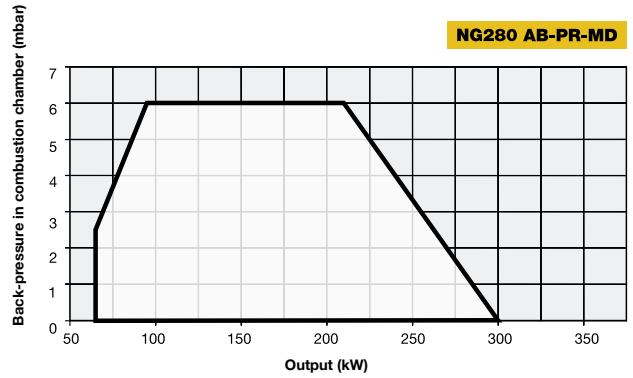
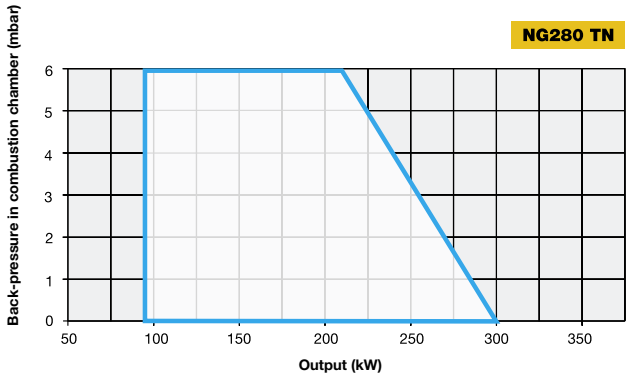
L = For long combustion head version (BL) increase the price (see price list)

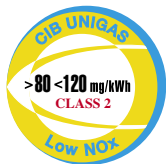
M = Short and long reversible combustion head

(*) Progressive PR control, for modulating version MD add € (see price list).

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

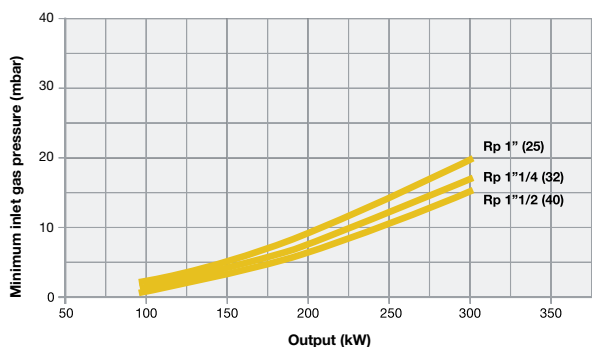




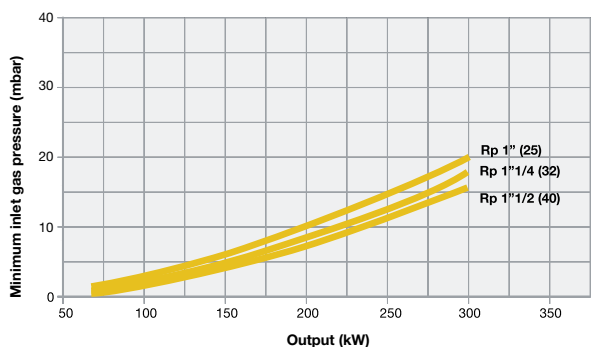
GAS

NG280 NG350 NG400 NG550 **idea** SERIES

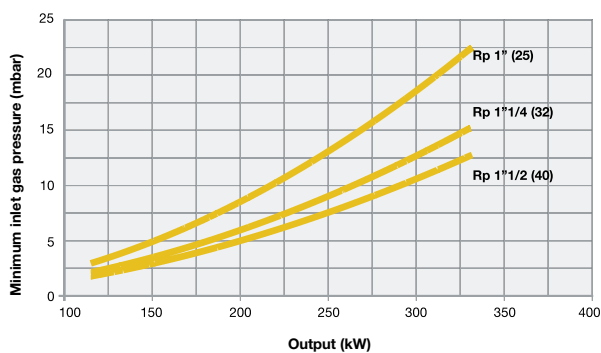
NG280 TN



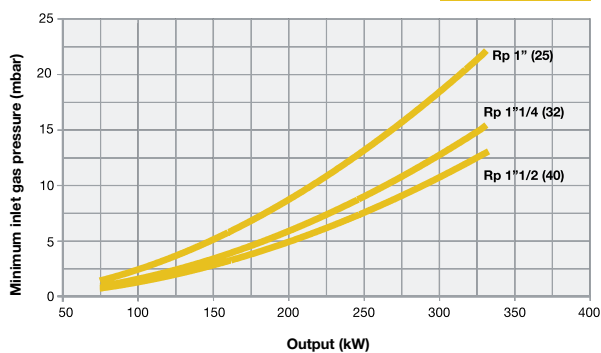
NG280 AB-PR-MD



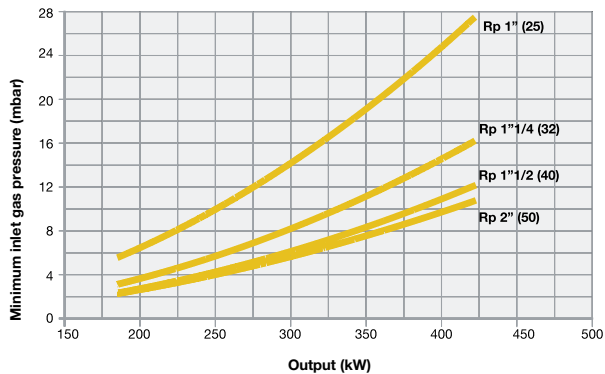
NG350 TN



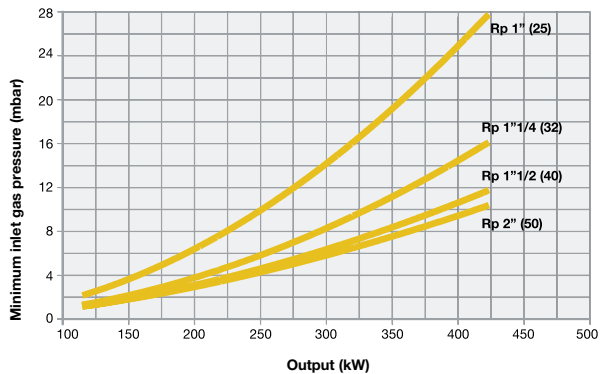
NG350 PR-MD



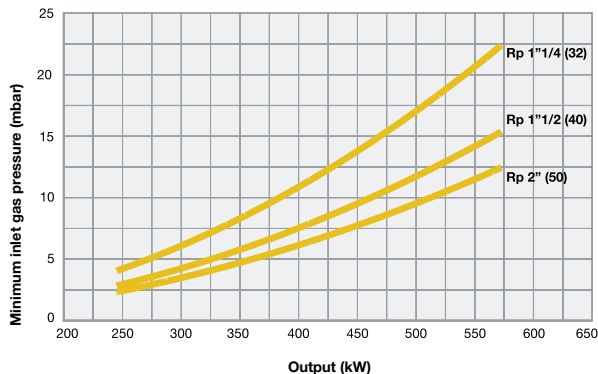
NG400 TN



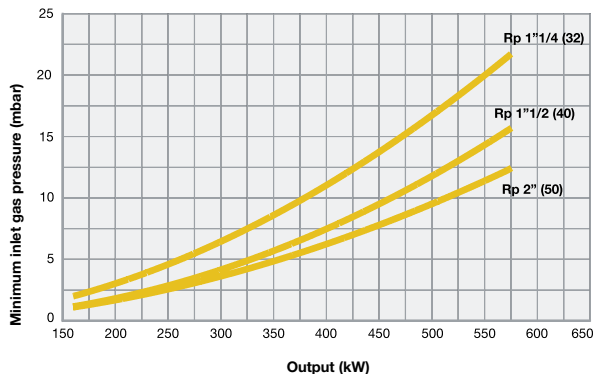
NG400 PR-MD



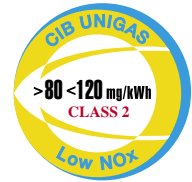
NG550 TN



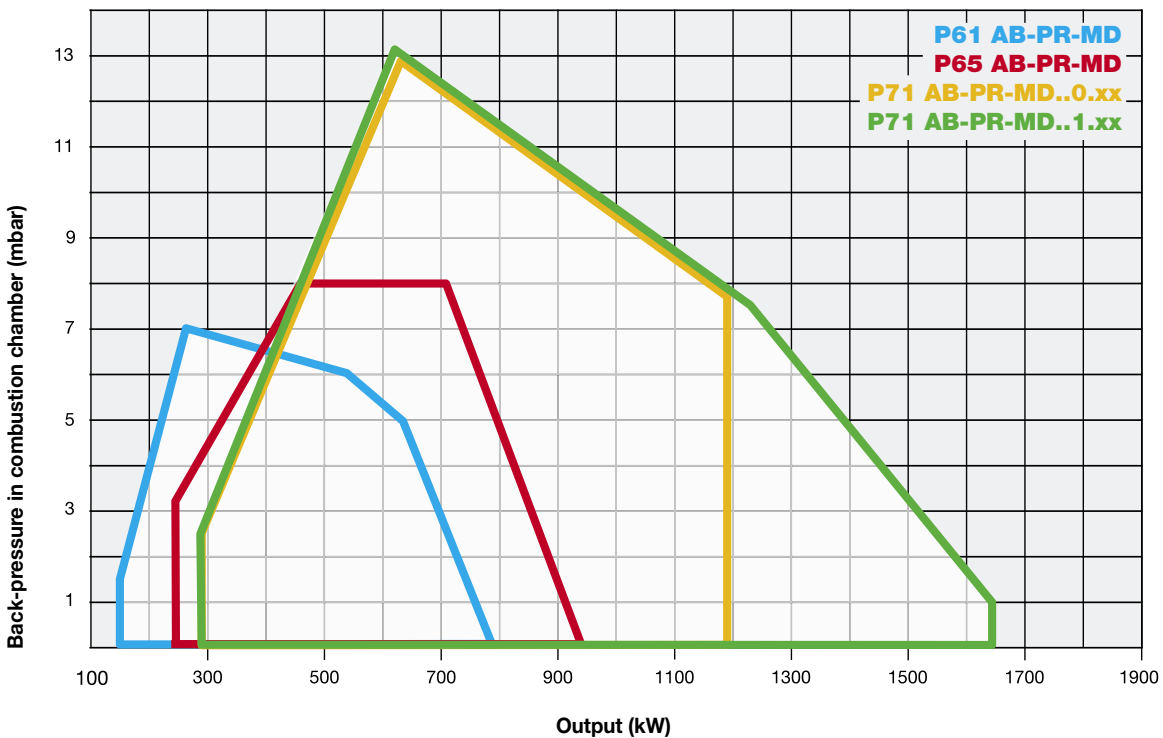
NG550 PR-MD



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.



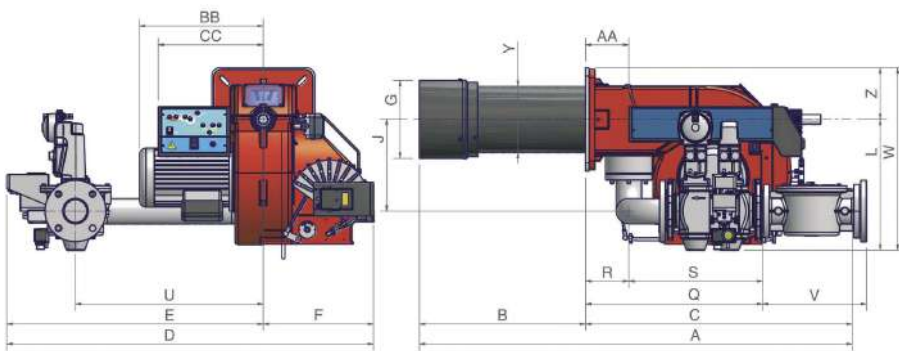
TECNOPRESS burners **Low NO_x Class 2** (< 120 mg/kWh), cover a wide range of applications from 160 to 2.050 kW and are suitable either for heating generators with high back pressure or suction in combustion chamber. The bell-shaped combustion head is able to produce high performance flame.



TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
P61	M-.xx.x.xx.A.0.xx	160	800	230/400 V 3N ac	1,1	1"¼ - 1"½ - 2" - DN65
P65	M-.xx.x.xx.A.0.xx	270	970	230/400 V 3N ac	1,5	1"½ - 2" - DN65
P71	M-.xx.x.xx.A.0.xx	300	1.200	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80
P71	M-.xx.x.xx.A.1.xx	300	1.650	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80

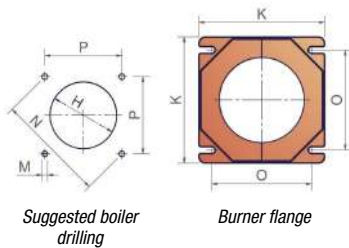
For the configuration of the gas train, see page 101.



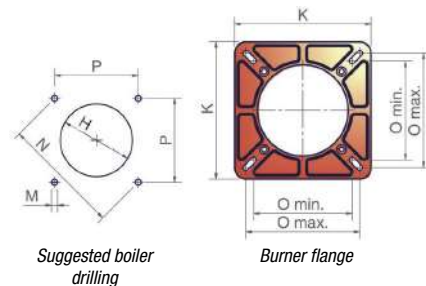
Type	Packaging dimensions (mm)			
	l	p	h	kg
P61*	1200	670	540	60
P65*	1280	850	760	100
P71*	1280	850	760	120

* Approximate values (regarding model with gas train DN65)

P61

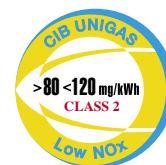


P65 - P71



Type	Model	Overall dimensions (mm)																												
		AS	AL	AA	B(S*)	B(L*)	BB	C	CC	D	E	F	G	H	J	K	L	M	N	O	P	Q	R	S	U	V	W	Y	Z	
		min. max.																												
P61	M-.xx.x.xx.A.0.32	1079	1169	99	343	433	314	736	298	812	500	312	184	204	210	240	344	M10	269	190	190	190	341	112	229	444	-	464	162	120
P61	M-.xx.x.xx.A.0.40	1079	1169	99	343	433	314	736	298	812	500	312	184	204	210	240	344	M10	269	190	190	190	439	112	327	444	-	464	162	120
P61	M-.xx.x.xx.A.0.50	1079	1169	99	343	433	314	736	298	812	500	312	184	204	210	240	344	M10	269	190	190	190	447	112	335	444	-	464	162	120
P61	M-.xx.x.xx.A.0.65	1079	1169	99	343	433	314	736	298	997	685	312	184	204	250	240	420	M10	269	190	190	190	515	112	403	540	313	540	162	120
P65	M-.xx.x.xx.A.0.40	1129	1219	130	326	416	373	803	316	900	568	332	184	218	208	300	376	M10	330	216	250	233	457	130	327	519	-	531	198	155
P65	M-.xx.x.xx.A.0.50	1129	1219	130	326	416	373	803	316	900	568	332	184	218	208	300	376	M10	330	216	250	233	465	130	335	519	-	531	198	155
P65	M-.xx.x.xx.A.0.65	1129	1219	130	326	416	373	803	316	998	666	332	184	218	275	300	393	M10	330	216	250	233	533	130	403	565	313	548	198	155
P71	M-.xx.x.xx.A.1.40	1188	1298	130	385	495	373	803	316	1026	694	332	234	264	208	300	376	M10	330	216	250	233	457	130	327	519	-	531	198	155
P71	M-.xx.x.xx.A.1.50	1188	1298	130	385	495	373	803	316	1026	694	332	234	264	208	300	376	M10	330	216	250	233	465	130	335	519	-	531	198	155
P71	M-.xx.x.xx.A.1.65	1188	1298	130	385	495	373	803	316	1104	772	332	234	264	275	300	393	M10	330	216	250	233	533	130	403	565	313	548	198	155
P71	M-.xx.x.xx.A.1.80	1188	1298	130	385	495	373	803	316	1106	774	332	234	264	275	300	407	M10	330	216	250	233	574	130	444	565	344	562	198	155

Approximate values



MECHANICAL OPERATION

Model	Gas train	Operation	P61		P65		P71	
			Code	Price €	Code	Price €	Code	Price €
M-AB.S.xx.A.0.32	1"¼	AB	004013942		-		-	
M-AB.S.xx.A.0.40	1"½	AB	004014142		008011542		008014142	
M-AB.S.xx.A.0.50	2"	AB	004014342		008010942		008014342	
M-AB.S.xx.A.0.65	DN65	AB	004014542		008011142		008014542	
M-AB.S.xx.A.0.80	DN80	AB	-		-		008014742	
M-PR.S.xx.A.0.32	1"¼	PR (*)	004013943		-		-	
M-PR.S.xx.A.0.40	1"½	PR (*)	004014143		008011543		008014143	
M-PR.S.xx.A.0.50	2"	PR (*)	004014343		008010943		008014343	
M-PR.S.xx.A.0.65	DN65	PR (*)	004014543		008011143		008014543	
M-PR.S.xx.A.0.80	DN80	PR (*)	-		-		008014743	
M-AB.S.xx.A.1.40	1"½	AB	-		-		008014152	
M-AB.S.xx.A.1.50	2"	AB	-		-		008014352	
M-AB.S.xx.A.1.65	DN65	AB	-		-		008014552	
M-AB.S.xx.A.1.80	DN80	AB	-		-		008014752	
M-PR.S.xx.A.1.40	1"½	PR (*)	-		-		008014153	
M-PR.S.xx.A.1.50	2"	PR (*)	-		-		008014353	
M-PR.S.xx.A.1.65	DN65	PR (*)	-		-		008014553	
M-PR.S.xx.A.1.80	DN80	PR (*)	-		-		008014753	

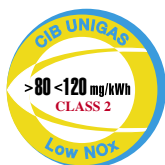
S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU


ELECTRONIC OPERATION

Model	Gas train	Operation	P61		P65		P71	
			Code	Price €	Code	Price €	Code	Price €
M-.PR.S.xx.A.1.32.EA	1"¼	PR (*)	00401395A		-		-	
M-.PR.S.xx.A.1.40.EA	1"½	PR (*)	00401415A		00801155A		00801415A	
M-.PR.S.xx.A.1.50.EA	2"	PR (*)	00401435A		00801095A		00801435A	
M-.PR.S.xx.A.1.65.EA	DN65	PR (*)	00401455A		00801115A		00801455A	
M-.PR.S.xx.A.1.80.EA	DN80	PR (*)	-		-		00801475A	

S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	P61		P65		P71	
			Code	Price €	Code	Price €	Code	Price €
M-.MD.S.xx.A.1.32.ES	1"¼	MD (**)	00401395S		-		-	
M-.MD.S.xx.A.1.40.ES	1"½	MD (**)	00401415S		00801155S		00801415S	
M-.MD.S.xx.A.1.50.ES	2"	MD (**)	00401435S		00801095S		00801435S	
M-.MD.S.xx.A.1.65.ES	DN65	MD (**)	00401455S		00801115S		00801455S	
M-.MD.S.xx.A.1.80.ES	DN80	MD (**)	-		-		00801475S	

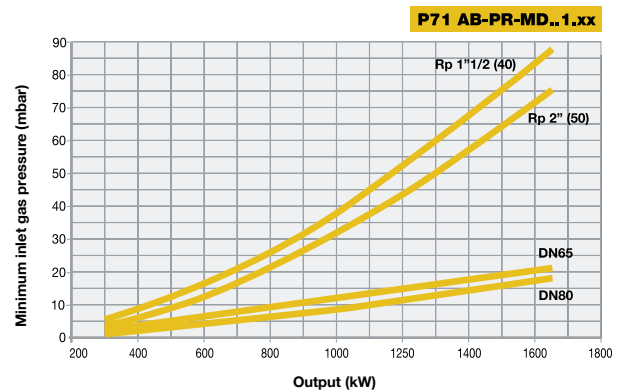
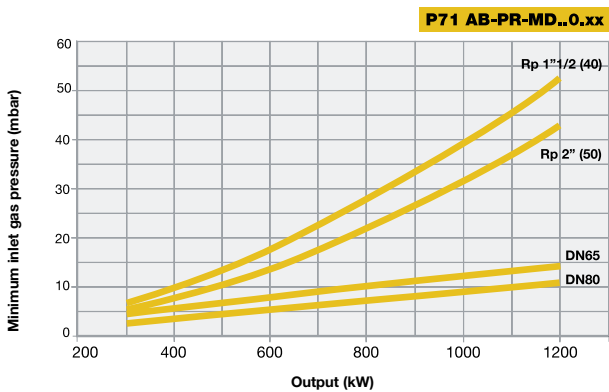
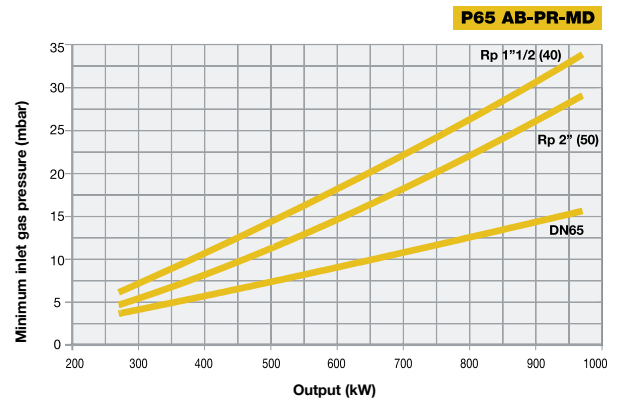
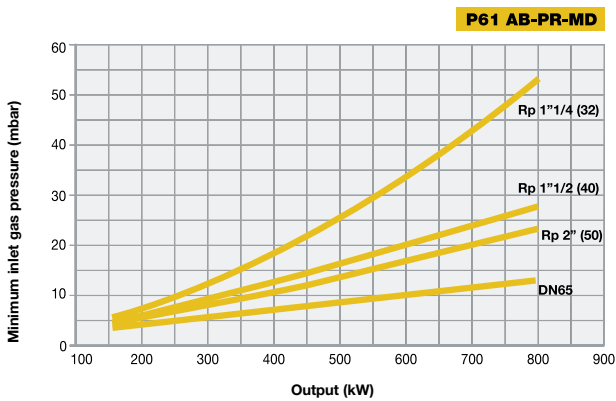
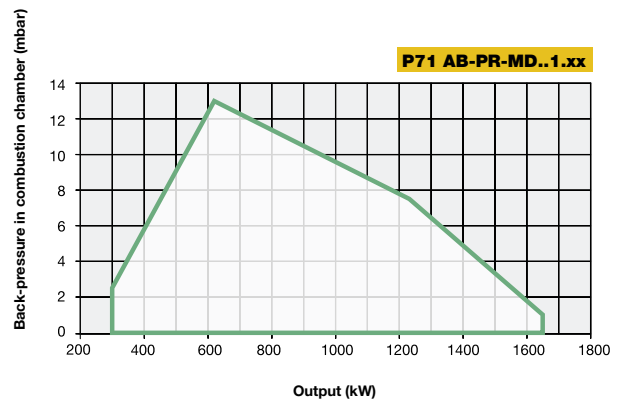
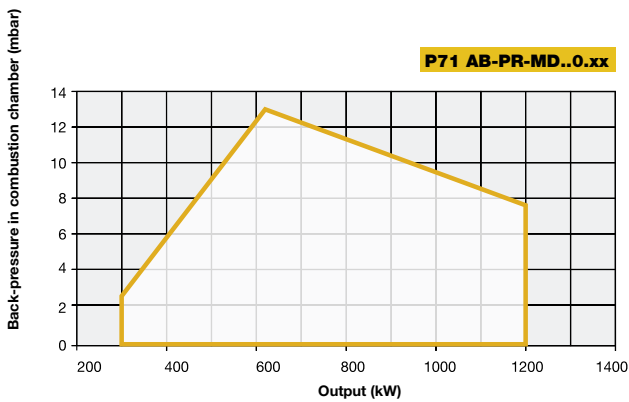
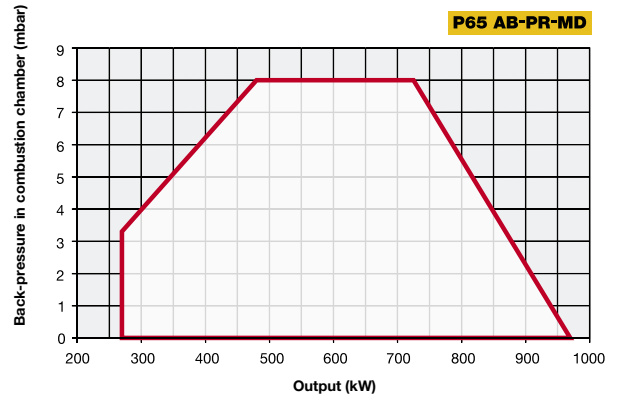
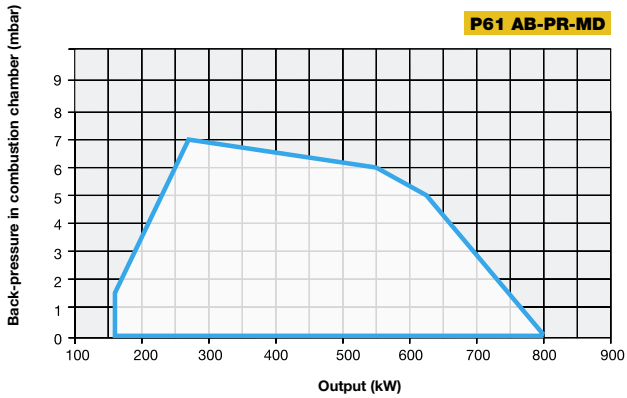
S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

(**) The burners are already MD version.

In order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU



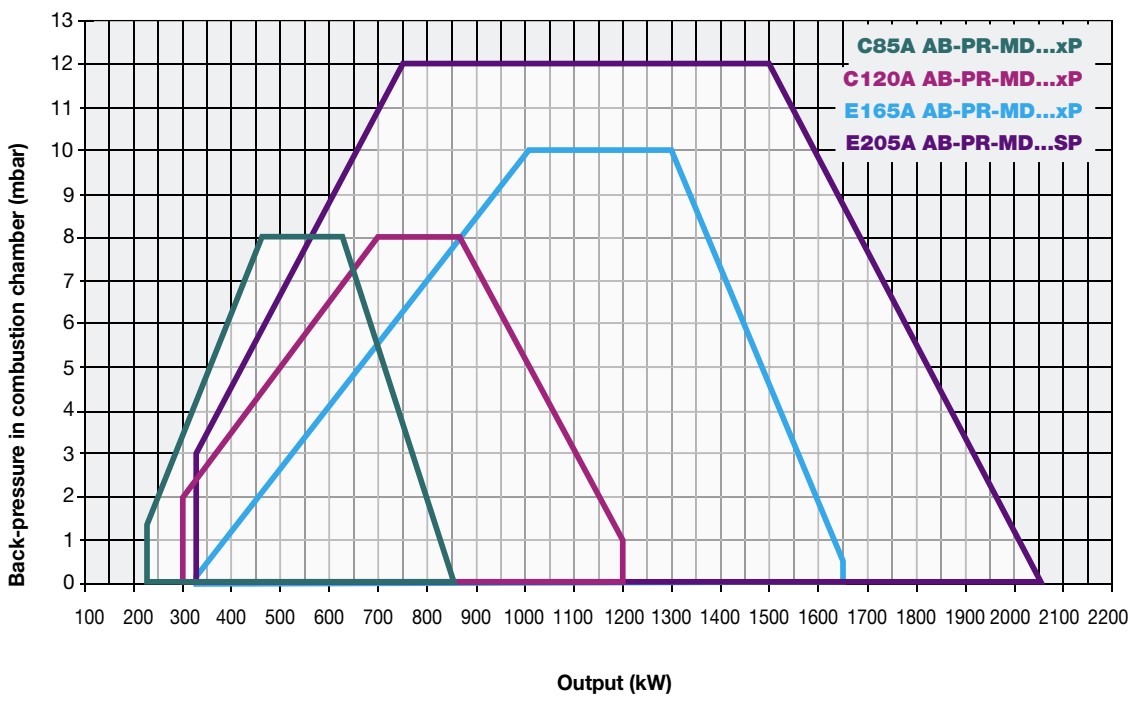
Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

NEW
GAS



C85A C120A E165A E205A...xP **tecnopress** SERIES

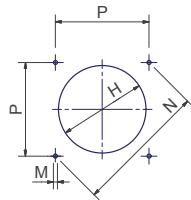
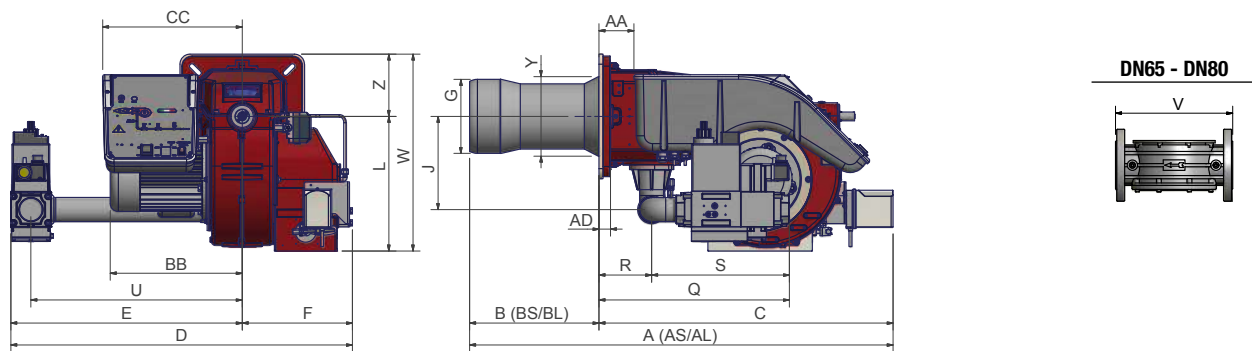
TECNOPRESS burners **Low NO_x Class 2 (< 120 mg/kWh)** cover a wide range of applications from 230 to 2.050 kW and are suitable either for heating generators with high back pressure or suction in combustion chamber. The bell-shaped combustion head is able to produce high performance flame.



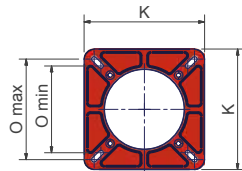
TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections	Noise level dBA
		min.	max.				
C85A	M-.xx.xP.xx.A.0.xx	230	850	230/400 V 3N ac	1,1	1"¼ - 1"½ - 2" - DN65	< 80
C120A	M-.xx.xP.xx.A.0.xx	300	1.200	230/400 V 3N ac	1,5	1"½ - 2" - DN65 - DN80	< 80
E165A	M-.xx.xP.xx.A.1.xx	320	1.650	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80	< 80
E205A	M-.xx.SP.xx.A.1.xx	340	2.050	230/400 V 3N ac	3,0	1"½ - 2" - DN65 - DN80	< 80

For the configuration of the gas train, see page 101.



Suggested boiler drilling



Burner flange

Type	Packaging dimensions (mm)			
	l	p	h	kg
C85A	1345	835	750	60
C120A	1345	835	750	60
E165A	1465	815	800	125
E205A*	1465	815	800	125

Approximate values

* Approximate values (regarding model with gas train DN80)

Type	Model	Overall dimensions (mm)																													
		AA	AS	AL	BB	BS	BL	C	CC	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	U	V	X	Y	Z	
		min.		max.																											
C85A	M-.xx.xP.xx.A.0.32	87	1122	1212	345	320	410	802	328	879	634	245	184	218	198	238	300	335	M10	330	216	250	233	456	131	325	525	-	490	198	155
C85A	M-.xx.xP.xx.A.0.40	87	1122	1212	345	320	410	802	328	879	634	245	184	218	198	238	300	335	M10	330	216	250	233	456	131	325	525	-	490	198	155
C85A	M-.xx.xP.xx.A.0.50	87	1122	1212	345	320	410	802	328	864	619	245	184	218	198	238	300	335	M10	330	216	250	233	469	131	338	525	-	490	198	155
C85A	M-.xx.xP.xx.A.0.65	87	1122	1212	345	320	410	802	328	935	690	245	184	218	198	284	300	335	M10	330	216	250	233	539	131	408	565	292	490	198	155
C120A	M-.xx.xP.xx.A.0.40	87	1182	1292	345	380	490	802	320	879	634	245	234	264	198	238	300	347	M10	330	216	250	233	456	131	325	525	-	502	198	155
C120A	M-.xx.xP.xx.A.0.50	87	1182	1292	345	380	490	802	320	864	619	245	234	264	198	238	300	347	M10	330	216	250	233	469	131	338	525	-	502	198	155
C120A	M-.xx.xP.xx.A.0.65	87	1182	1292	345	380	490	802	320	935	690	245	234	264	198	284	300	347	M10	330	216	250	233	539	131	408	565	292	502	198	155
C120A	M-.xx.xP.xx.A.0.80	87	1182	1292	345	380	490	802	320	935	690	245	234	264	198	284	300	347	M10	330	216	250	233	559	131	428	565	310	502	198	155
E165A	M-.xx.xP.xx.A.1.40	69	1221	1331	354	390	500	831	330	1050	716	334	234	264	210	233	300	420	M10	330	216	250	233	457	130	327	541	-	575	210	155
E165A	M-.xx.xP.xx.A.1.50	69	1221	1331	354	390	500	831	330	1050	716	334	234	264	210	233	300	420	M10	330	216	250	233	472	130	342	525	-	575	210	155
E165A	M-.xx.xP.xx.A.1.65	69	1244	1354	354	390	500	854	330	1134	800	334	234	264	210	233	300	420	M10	330	216	250	233	562	130	432	593	292	575	210	155
E165A	M-.xx.xP.xx.A.1.80	69	1258	1368	354	390	500	868	330	1108	774	334	234	264	210	287	300	420	M10	330	216	250	233	558	130	428	565	310	575	210	155
E205A	M-.xx.SP.xx.A.1.40	69	1334	-	374	503	-	831	374	1050	716	334	254	270	210	233	300	420	M10	330	216	250	233	472	130	342	525	-	575	210	155
E205A	M-.xx.SP.xx.A.1.50	69	1334	-	374	503	-	831	374	1050	716	334	254	270	210	233	300	420	M10	330	216	250	233	472	130	342	525	-	575	210	155
E205A	M-.xx.SP.xx.A.1.65	69	1357	-	374	503	-	854	374	1134	800	334	254	270	210	233	300	420	M10	330	216	250	233	562	130	432	593	292	575	210	155
E205A	M-.xx.SP.xx.A.1.80	69	1371	-	374	503	-	868	374	1108	774	334	254	270	210	287	300	420	M10	330	216	250	233	558	130	428	593	310	575	210	155

Approximate values



C85A C120A E165A E205A...xP **tecnopress** SERIES

MECHANICAL OPERATION

Model	Gas train	Operation	C85A...xP		C120A...xP	
			Code	Price €	Code	Price €
M-.AB.SP.xx.A.0.32	1"¼	AB	033010142		-	
M-.AB.SP.xx.A.0.40	1"½	AB	033010342		033011742	
M-.AB.SP.xx.A.0.50	2"	AB	033010542		033011942	
M-.AB.SP.xx.A.0.65	DN65	AB	033010742		033012142	
M-.AB.SP.xx.A.0.80	DN80	AB	-		033012342	
M-.PR.SP.xx.A.0.32	1"¼	PR (*)	033010143		-	
M-.PR.SP.xx.A.0.40	1"½	PR (*)	033010343		033011743	
M-.PR.SP.xx.A.0.50	2"	PR (*)	033010543		033011943	
M-.PR.SP.xx.A.0.65	DN65	PR (*)	033010743		033012143	
M-.PR.SP.xx.A.0.80	DN80	PR (*)	-		033012343	

Model	Gas train	Operation	E165A...xP		E205A...SP ***	
			Code	Price €	Code	Price €
M-.AB.SP.xx.A.1.40	1"½	AB	030017352		030018152	
M-.AB.SP.xx.A.1.50	2"	AB	030017552		030018252	
M-.AB.SP.xx.A.1.65	DN65	AB	030017752		030018352	
M-.AB.SP.xx.A.1.80	DN80	AB	030017952		030018452	
M-.PR.SP.xx.A.1.40	1"½	PR (*)	030017353		030018153	
M-.PR.SP.xx.A.1.50	2"	PR (*)	030017553		030018253	
M-.PR.SP.xx.A.1.65	DN65	PR (*)	030017753		030018353	
M-.PR.SP.xx.A.1.80	DN80	PR (*)	030017953		030018453	

SP = Standard combustion head (BS)

LP = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list).

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

(***) Model E205A...SP has only one type of combustion head length BS.

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	C85A...xP		C120A...xP	
			Code	Price €	Code	Price €
M-.PR.SP.xx.A.1.32 EA	1"¼	PR (*)	03301015A		-	
M-.PR.SP.xx.A.1.40.EA	1"½	PR (*)	03301035A		03301175A	
M-.PR.SP.xx.A.1.50.EA	2"	PR (*)	03301055A		03301195A	
M-.PR.SP.xx.A.1.65.EA	DN65	PR (*)	03301075A		03301215A	
M-.PR.SP.xx.A.1.80 EA	DN80	PR (*)	-		03301235A	

Model	Gas train	Operation	E165A...xP		E205A...SP ***	
			Code	Price €	Code	Price €
M-.PR.SP.xx.A.1.40.EA	1"½	PR (*)	03001735A		03001815A	
M-.PR.SP.xx.A.1.50.EA	2"	PR (*)	03001755A		03001825A	
M-.PR.SP.xx.A.1.65.EA	DN65	PR (*)	03001775A		03001835A	
M-.PR.SP.xx.A.1.80.EA	DN80	PR (*)	03001795A		03001845A	

SP = Standard combustion head (BS)

LP = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

(***) Model E205A...SP has only one type of combustion head length BS.

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	C85A...xP		C120A...xP	
			Code	Price €	Code	Price €
M-.MD.SP.xx.A.1.32 ES	1"¼	MD (**)	03301015S		-	
M-.MD.SP.xx.A.1.40.ES	1"½	MD (**)	03301035S		03301175S	
M-.MD.SP.xx.A.1.50.ES	2"	MD (**)	03301055S		03301195S	
M-.MD.SP.xx.A.1.65.ES	DN65	MD (**)	03301075S		03301215S	
M-.MD.SP.xx.A.1.80.ES	DN80	MD (**)	-		03301235S	

Model	Gas train	Operation	E165A...xP		E205A...SP ***	
			Code	Price €	Code	Price €
M-.MD.SP.xx.A.1.40.ES	1"½	MD (**)	03001735S		03001815S	
M-.MD.SP.xx.A.1.50.ES	2"	MD (**)	03001755S		03001825S	
M-.MD.SP.xx.A.1.65.ES	DN65	MD (**)	03001775S		03001835S	
M-.MD.SP.xx.A.1.80.ES	DN80	MD (**)	03001795S		03001845S	

SP = Standard combustion head (BS)

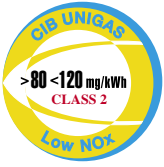
LP = For long combustion head version (BL) increase the price (see price list)

(**) The burners are already MD version.

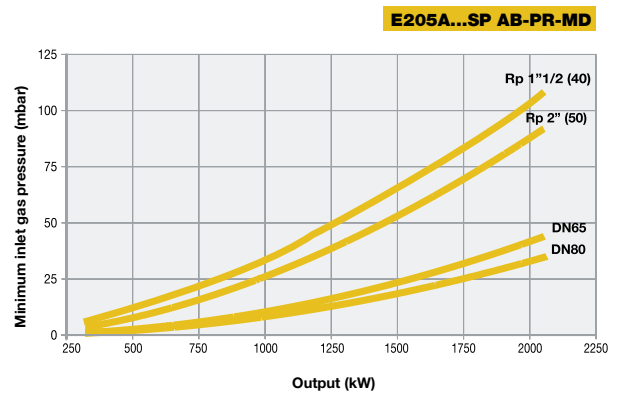
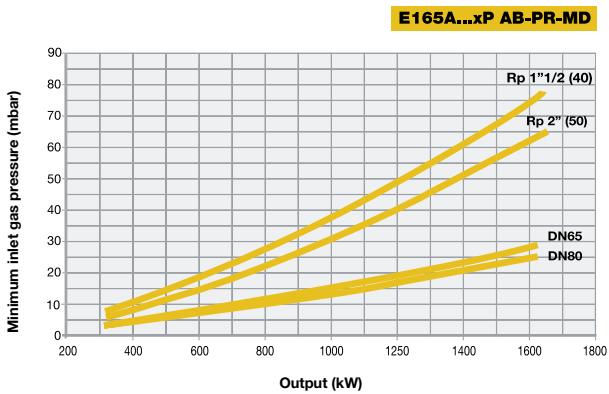
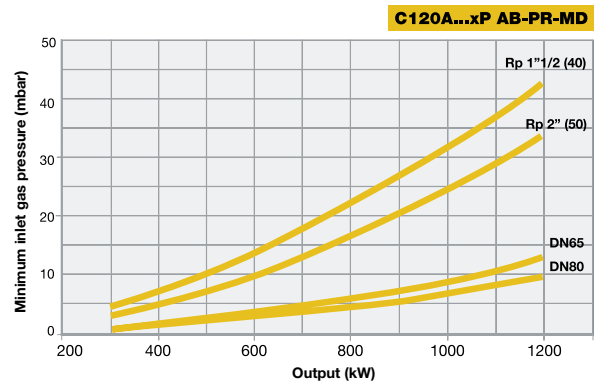
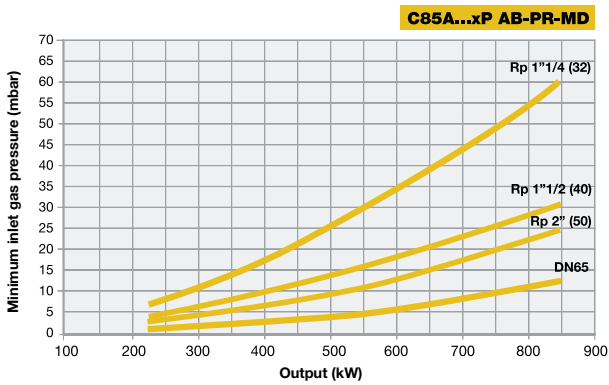
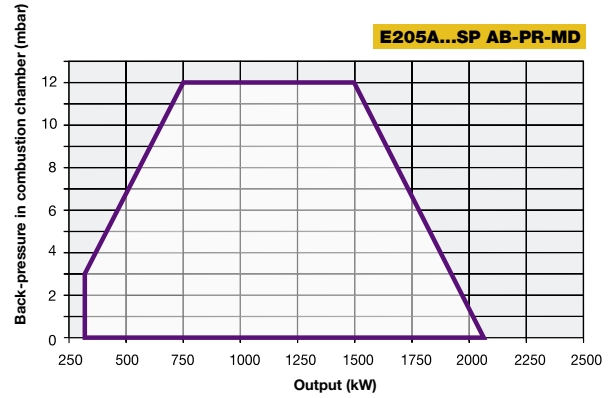
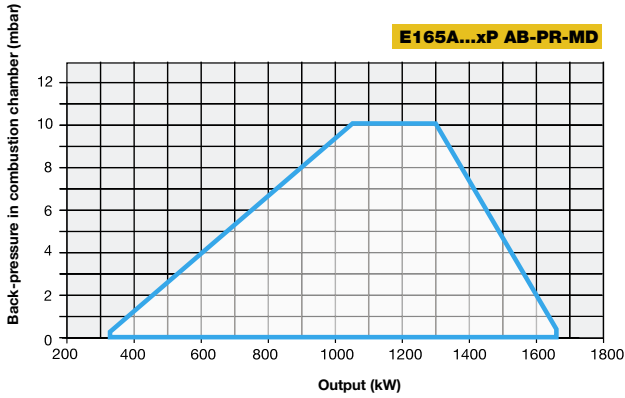
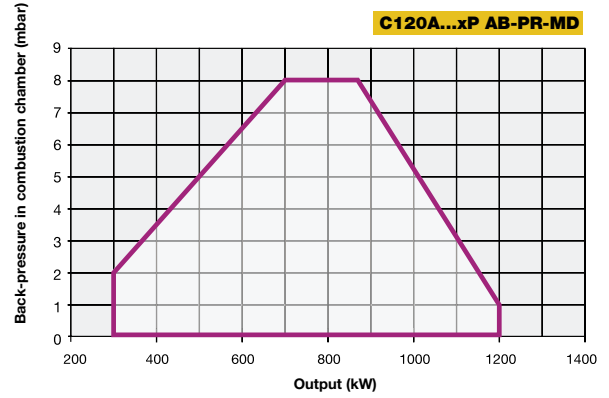
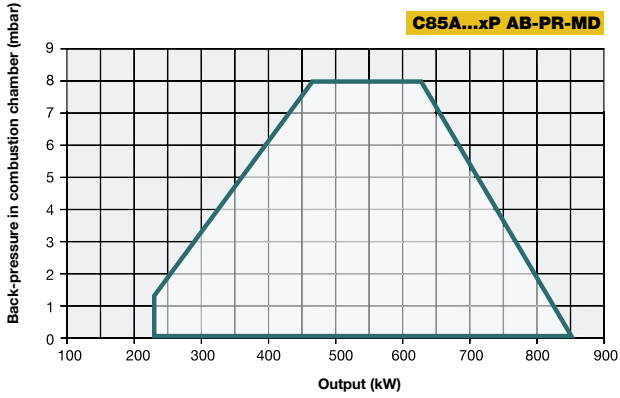
In order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

(***) Model E205A...SP has only one type of combustion head length BS.

In compliance with GAR DIRECTIVE 2016/426/EU

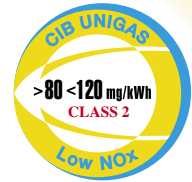


C85A C120A E165A E205A...xP **tecnopress** SERIES

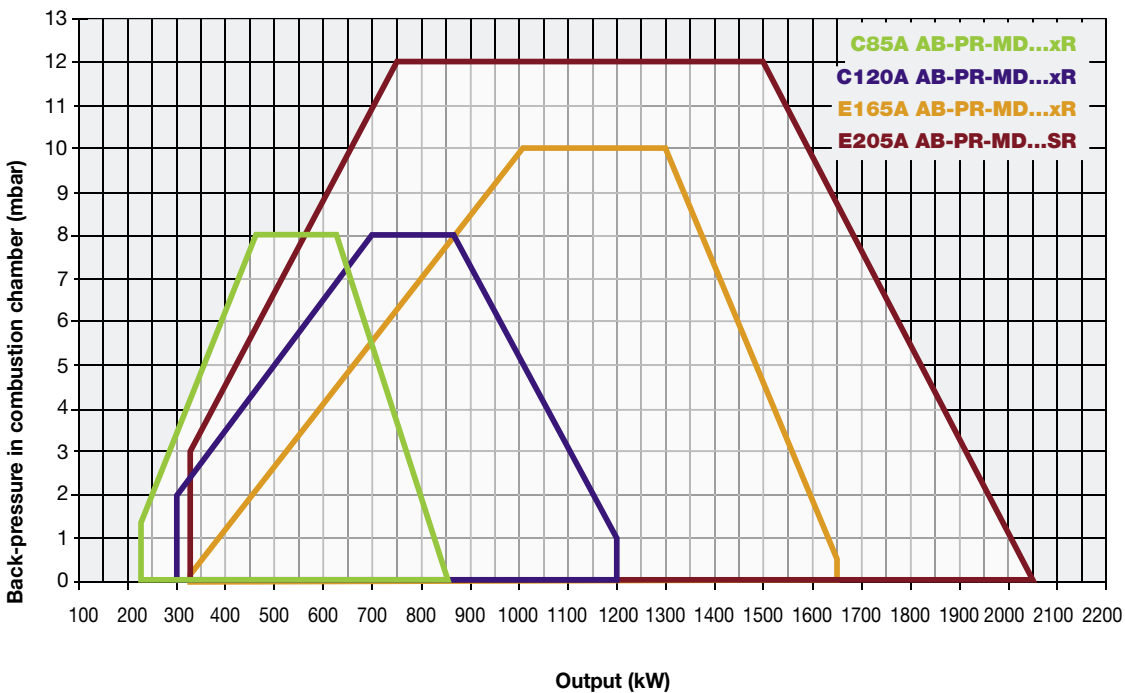


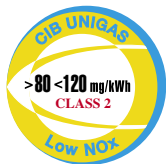
Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

tecnopress SERIES **C85A C120A E165A E205A...xR**



TECNOPRESS burners **Low NO_x Class 2 (< 120 mg/kWh)** cover a wide range of applications from 230 to 2.050 kW and are suitable either for heating generators with high back pressure or suction in combustion chamber. The bell-shaped combustion head is able to produce high performance flame. These models are equipped with air inlet silencer to reduce the noise level.





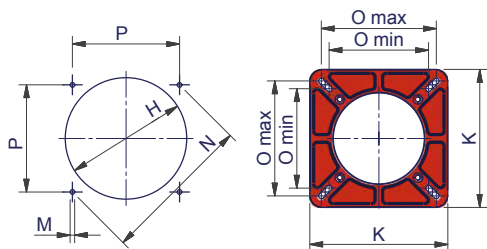
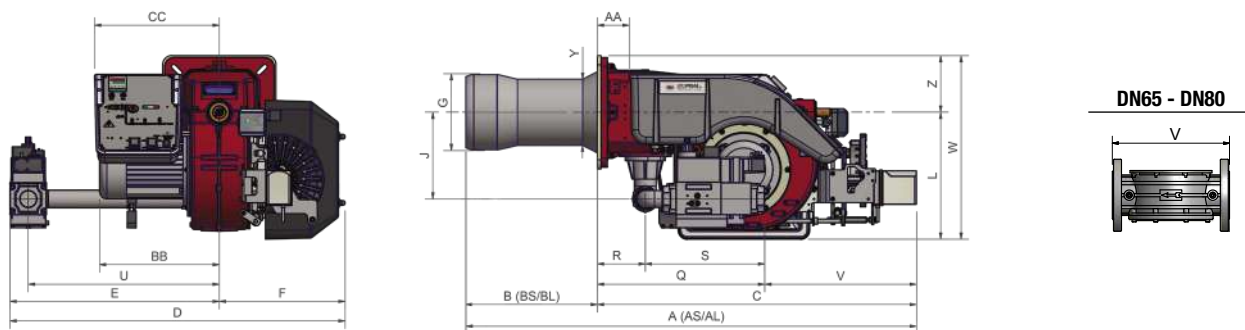
GAS

C85A C120A E165A E205A...xR **tecnopress** SERIES

TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections	Noise level dBA
		min.	max.				
C85A	M-.xx.xR.xx.A.0.xx	230	850	230/400 V 3N ac	1,1	1"¼ - 1"½ - 2" - DN65	< 75
C120A	M-.xx.xR.xx.A.0.xx	300	1.200	230/400 V 3N ac	1,5	1"½ - 2" - DN65 - DN80	< 75
E165A	M-.xx.xR.xx.A.1.xx	320	1.650	230/400 V 3N ac	2,2	1"½ - 2" -DN65 - DN80	< 75
E205A	M-.xx.SR.xx.A.1.xx	340	2.050	230/400 V 3N ac	3,0	1"½ - 2" -DN65 - DN80	< 75

For the configuration of the gas train, see page 101.



Suggested boiler drilling

Burner flange

Type	Packaging dimensions (mm)			
	l	p	h	kg
C85A	1345	835	750	60
C120A	1345	835	750	60
E165A	1465	815	800	125
E205A*	1465	815	800	125

Approximate values

* Approximate values (regarding model with gas train DN80)

Type	Model	Overall dimensions (mm)																													
		AA	AS	AL	BB	BS	BL	C	CC	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	U	V	X	Y	Z	
		min.		max.		min.		max.		min.		max.		min.		max.		min.		max.		min.		max.		min.		max.		min.	
C85A	M-.xx.xR.xx.A.0.32	87	1193	1283	345	320	410	873	342	978	634	344	184	218	198	238	300	347	M10	330	216	250	233	456	131	325	525	-	502	198	155
C85A	M-.xx.xR.xx.A.0.40	87	1193	1283	345	320	410	873	342	978	634	344	184	218	198	238	300	347	M10	330	216	250	233	456	131	325	525	-	502	198	155
C85A	M-.xx.xR.xx.A.0.50	87	1193	1283	345	320	410	873	342	963	619	344	184	218	198	238	300	347	M10	330	216	250	233	469	131	338	525	-	502	198	155
C85A	M-.xx.xR.xx.A.0.65	87	1193	1283	345	320	410	873	342	1034	690	344	184	218	198	284	300	347	M10	330	216	250	233	539	131	408	565	292	502	198	155
C120A	M-.xx.xR.xx.A.0.40	87	1253	1363	345	380	490	873	345	978	634	344	234	264	198	238	300	357	M10	330	216	250	233	456	131	325	525	-	512	198	155
C120A	M-.xx.xR.xx.A.0.50	87	1253	1363	345	380	490	873	345	963	619	344	234	264	198	238	300	357	M10	330	216	250	233	469	131	338	525	-	512	198	155
C120A	M-.xx.xR.xx.A.0.65	87	1253	1363	345	380	490	873	345	1034	690	344	234	264	198	284	300	357	M10	330	216	250	233	539	131	408	565	292	512	198	155
C120A	M-.xx.xR.xx.A.1.80	87	1253	1363	345	380	490	873	345	1034	690	344	234	264	198	284	300	357	M10	330	216	250	233	559	131	428	565	310	512	198	155
E165A	M-.xx.xR.xx.A.1.40	69	1318	1428	372	390	500	928	350	1062	700	362	234	264	210	229	300	420	M10	330	216	250	233	465	130	335	525	-	575	210	155
E165A	M-.xx.xR.xx.A.1.50	69	1318	1428	372	390	500	928	350	1062	700	362	234	264	210	229	300	420	M10	330	216	250	233	465	130	335	525	-	575	210	155
E165A	M-.xx.xR.xx.A.1.65	69	1318	1428	372	390	500	928	350	1139	777	362	234	264	210	296	300	420	M10	330	216	250	233	533	130	403	570	292	575	210	155
E165A	M-.xx.xR.xx.A.1.80	69	1318	1428	372	390	500	928	350	1141	779	362	234	264	210	296	300	428	M10	330	216	250	233	574	130	444	570	310	583	210	155
E205A	M-.xx.SR.xx.A.1.40	69	1431	-	403	503	-	928	350	1013	651	362	254	270	210	233	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E205A	M-.xx.SR.xx.A.1.50	69	1431	-	403	503	-	928	350	1013	651	362	254	270	210	233	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E205A	M-.xx.SR.xx.A.1.65	69	1431	-	403	503	-	928	350	1162	800	362	254	270	210	233	300	453	M10	330	216	250	233	562	130	432	593	292	608	210	155
E205A	M-.xx.SR.xx.A.1.80	69	1431	-	403	503	-	928	350	1136	774	362	254	270	210	287	300	453	M10	330	216	250	233	558	130	428	565	310	608	210	155

Approximate values

MECHANICAL OPERATION

Model	Gas train	Operation	C85A...xR		C120A...xR	
			Code	Price €	Code	Price €
M-.AB.SR.xx.A.0.32	1"¼	AB	033010942		-	
M-.AB.SR.xx.A.0.40	1"½	AB	033011142		033012542	
M-.AB.SR.xx.A.0.50	2"	AB	033011342		033012742	
M-.AB.SR.xx.A.0.65	DN65	AB	033011542		033012942	
M-.AB.SR.xx.A.0.80	DN80	AB	-		033013142	
M-.PR.SR.xx.A.0.32	1"¼	PR (*)	033010943		-	
M-.PR.SR.xx.A.0.40	1"½	PR (*)	033011143		033012543	
M-.PR.SR.xx.A.0.50	2"	PR (*)	033011343		033012743	
M-.PR.SR.xx.A.0.65	DN65	PR (*)	033011543		033012943	
M-.PR.SR.xx.A.0.80	DN80	PR (*)	-		033013143	

Model	Gas train	Operation	E165A...xR		E205A...SR ***	
			Code	Price €	Code	Price €
M-.AB.SR.xx.A.1.40	1"½	AB	030013752		030016952	
M-.AB.SR.xx.A.1.50	2"	AB	030013952		030017052	
M-.AB.SR.xx.A.1.65	DN65	AB	030014152		030017152	
M-.AB.SR.xx.A.1.80	DN80	AB	030014352		030017252	
M-.PR.SR.xx.A.1.40	1"½	PR	030013753		030016953	
M-.PR.SR.xx.A.1.50	2"	PR	030013953		030017053	
M-.PR.SR.xx.A.1.65	DN65	PR	030014153		030017153	
M-.PR.SR.xx.A.1.80	DN80	PR	030014353		030017253	

SR = Standard combustion head (BS)

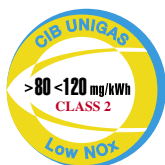
LR = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

(***) Model E205A...SR has only one type of combustion head length BS.

In compliance with GAR DIRECTIVE 2016/426/EU



GAS

C85A C120A E165A E205A...xR **tecnopress** SERIES

ELECTRONIC OPERATION

Model	Gas train	Operation	C85A...xR		C120A...xR	
			Code	Price €	Code	Price €
M-.PR.SR.xx.A.1.32.EA	1"¼	PR	03301095A		-	
M-.PR.SR.xx.A.1.40.EA	1"½	PR	03301115A		03301255A	
M-.PR.SR.xx.A.1.50.EA	2"	PR	03301135A		03301275A	
M-.PR.SR.xx.A.1.65.EA	DN65	PR	03301155A		03301295A	
M-.PR.SR.xx.A.1.80.EA	DN80	PR	-		03301315A	

Model	Gas train	Operation	E165A...xR		E205A...SR ***	
			Code	Price €	Code	Price €
M-.PR.SR.xx.A.1.40.EA	1"½	PR	03001375A		03001695A	
M-.PR.SR.xx.A.1.50.EA	2"	PR	03001395A		03001705A	
M-.PR.SR.xx.A.1.65.EA	DN65	PR	03001415A		03001715A	
M-.PR.SR.xx.A.1.80.EA	DN80	PR	03001435A		03001725A	

SR = Standard combustion head (BS)

LR = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

(***) Model E205A...SR has only one type of combustion head length BS.

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	C85A...xR		C120A...xR	
			Code	Price €	Code	Price €
M-.MD.SR.xx.A.1.32.ES	1"¼	MD (**)	03301095S		-	
M-.MD.SR.xx.A.1.40.ES	1"½	MD (**)	03301115S		03301255S	
M-.MD.SR.xx.A.1.50.ES	2"	MD (**)	03301135S		03301275S	
M-.MD.SR.xx.A.1.65.ES	DN65	MD (**)	03301155S		03301295S	
M-.MD.SR.xx.A.1.80.ES	DN80	MD (**)	-		03301315S	

Model	Gas train	Operation	E165A...xR		E205A...SR ***	
			Code	Price €	Code	Price €
M-.MD.SR.xx.A.1.40.ES	1"½	MD (**)	03001375S		03001695S	
M-.MD.SR.xx.A.1.50.ES	2"	MD (**)	03001395S		03001705S	
M-.MD.SR.xx.A.1.65.ES	DN65	MD (**)	03001415S		03001715S	
M-.MD.SR.xx.A.1.80.ES	DN80	MD (**)	03001435S		03001725S	

SR = Standard combustion head (BS)

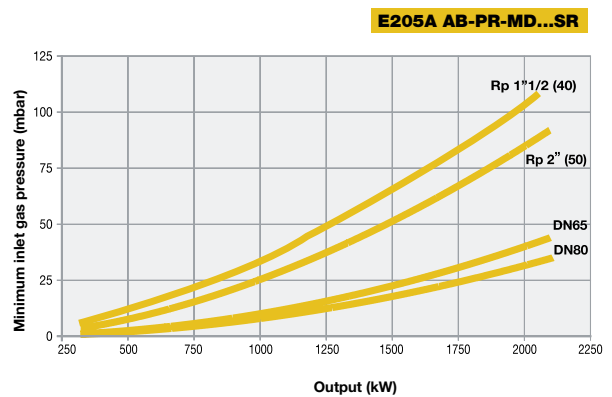
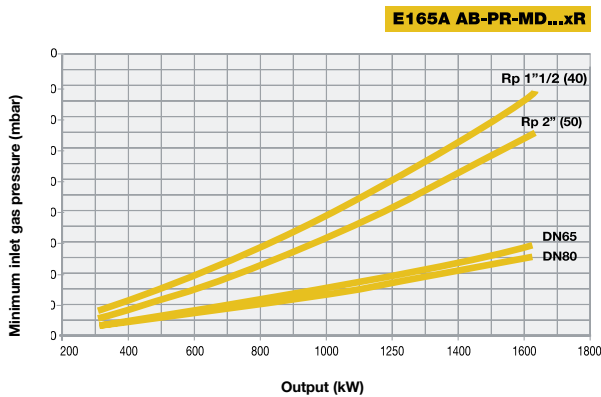
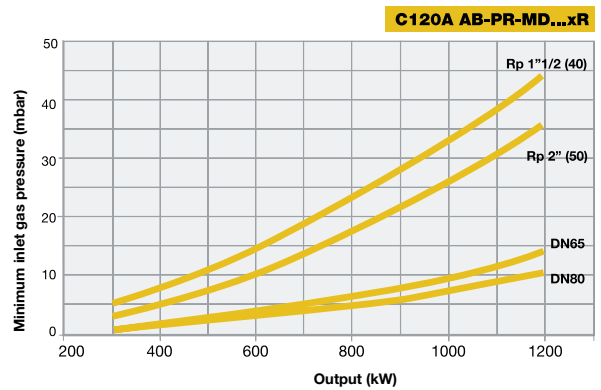
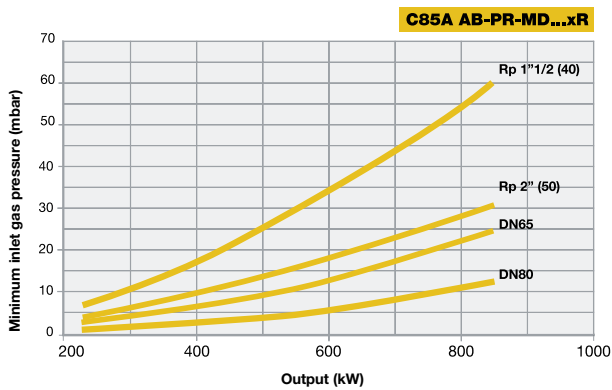
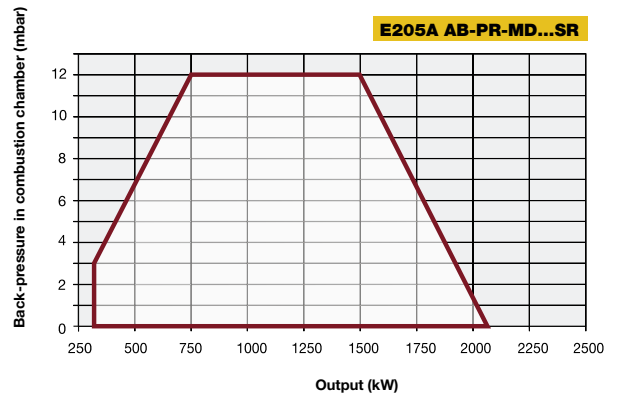
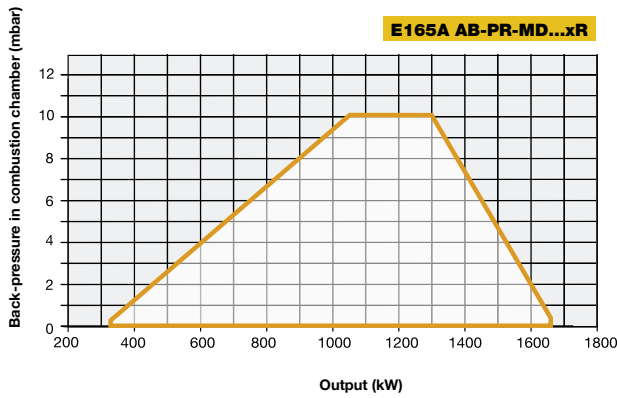
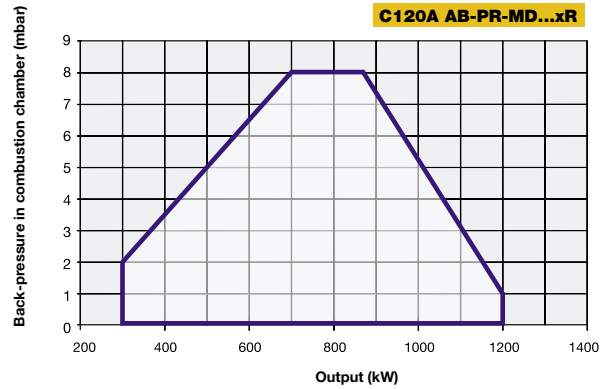
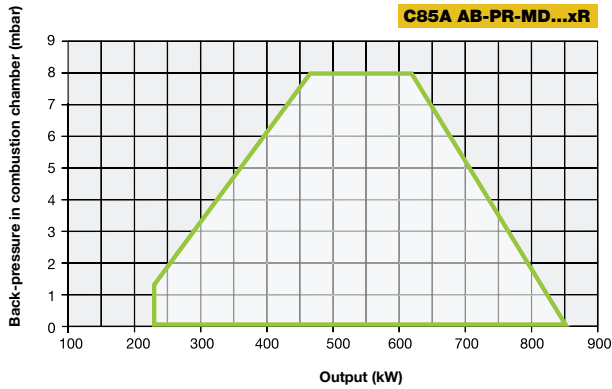
LR = For long combustion head version (BL) increase the price (see price list)

(**) The burners are already MD version.

In order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

(***) Model E205A...SR has only one type of combustion head length BS.

In compliance with GAR DIRECTIVE 2016/426/EU



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

tecnopan S5 S10 S18 chef S5 miniflam SERIES

BURNERS FOR KITCHENS AND BAKERY OVENS

This burners series has been produced to work on bakery and rotary ovens. The customers of this series are generally commercial kitchens, big hotels and restaurants.

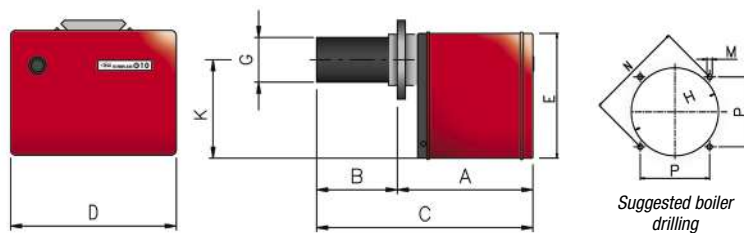
These burners are equipped with a double protection shield and a combustion head in thermalsteel for high temperature operation.



TECHNICAL DETAILS

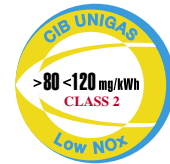
Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
Tecnopan S5	M-.TN.x.xx.B.0.15	35	70	230 V 1N ac	0,10	1/2"
Tecnopan S10	M-.TN.x.xx.B.0.20	65	120	230 V 1N ac	0,15	3/4"
Tecnopan S18	M-.TN.x.xx.B.0.25	80	200	230 V 1N ac	0,15	1"
Chef S5	M-.TN.S.xx.D.0.15	35	70	230 V 1N ac	0,10	1/2"

For the configuration of the gas train, see page 101.



Type	Model	Overall dimensions (mm)										Foratura caldaia (mm)				Packaging dimensions (mm)			
		A	B	BL	C	CL	D	E	G	K	H	P min.	P max.	M	N	l	p	h	kg
S5	M-.TN.x.xx.B.0.15	320	0÷80	0÷180	400	500	310	230	80	190	90	85	134	M8	155,5	360	300	560	16,8
S10	M-.TN.x.xx.B.0.20	350	180	275	530	625	340	255	113	210	125	105	134	M8	169,7	420	340	620	22
S18	M-.TN.x.xx.B.0.25	350	205	300	555	650	340	255	126	210	132	105	134	M8	169,7	420	340	620	24
Chef S5	M-.TN.S.xx.D.0.15	320	0÷80	0÷180	400	500	310	230	80	190	90	85	134	M8	155,5	360	300	560	16,8

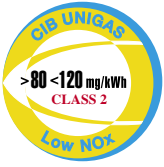
Approximate values



MECHANICAL OPERATION

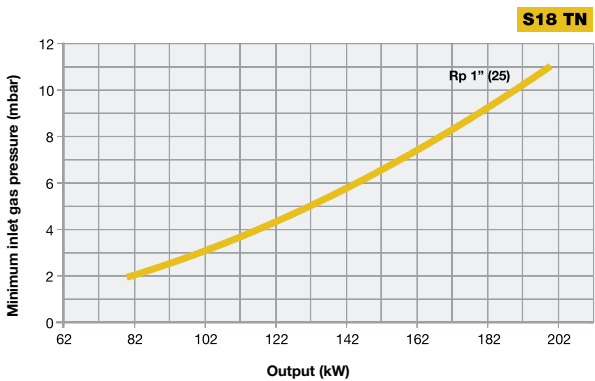
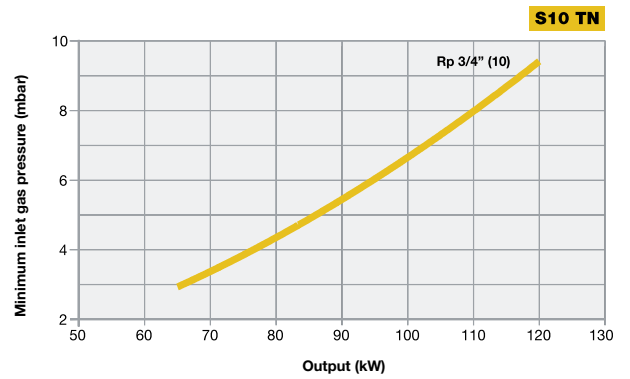
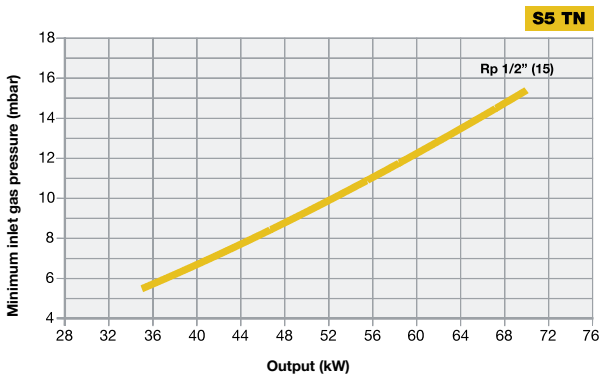
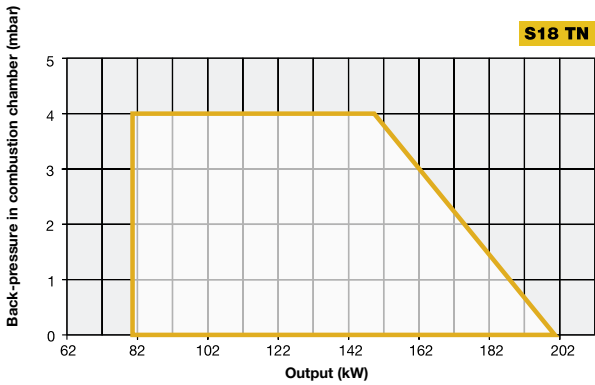
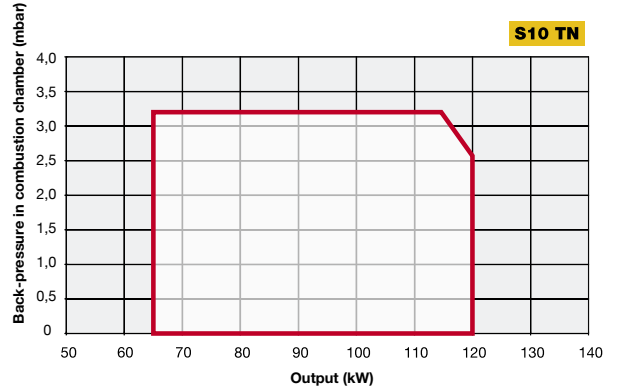
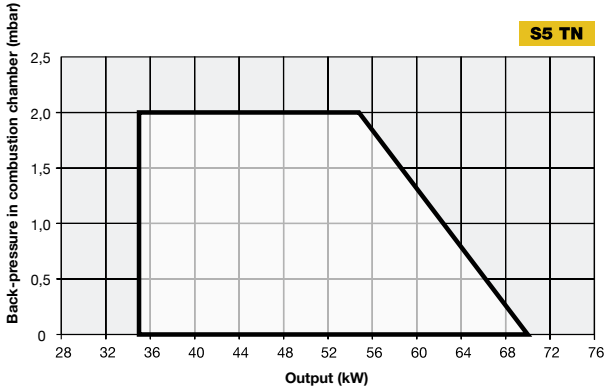
Model	Gas train	Operation	S5		S10		S18	
			Code	Price €	Code	Price €	Code	Price €
M-.TN.S.xx.B.0.15	1/2"	TN	001010341		-		-	
M-.TN.L.xx.B.0.15	1/2"	TN	001010441		-		-	
M-.TN.S.xx.B.0.20	3/4"	TN	-		002010541		-	
M-.TN.L.xx.B.0.20	3/4"	TN	-		002010641		-	
M-.TN.S.xx.B.0.25	1"	TN	-		-		002010741	
M-.TN.L.xx.B.0.25	1"	TN	-		-		002010841	
M-.TN.S.xx.D.0.15	1/2"	TN	001010641		-		-	

In compliance with GAR DIRECTIVE 2016/426/EU



tecnopan S5 S10 S18 chef S5 miniflam SERIES

BURNERS FOR KITCHENS AND BAKERY OVENS



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

CIB UNIGAS and its mission: Natural gas low NO_x burners (natural gas only)

Real progress is based on the distribution of the advantages it brings, among which are included the improvement of the living standards and the protection of the environment. Well-aware of the vital role it plays in the development of ecologically compatible products and thanks to forty years of experience in the design and in the manufacturing of burners for civil and industrial applications, CIB UNIGAS S.P.A. ranks among the European leaders its sector. The continuous investment in the development of technologically advanced products, which takes place in the company research laboratory, has allowed the creation of special burners which are suited to applications demanding the lowest NO_x emissions. These burners homologated with the



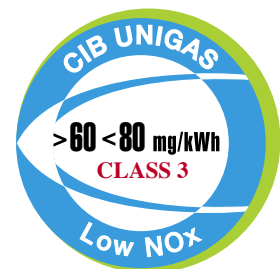
CE Mark (Gas Appliances Directive), by one of the most authoritative European certification agencies in the sector, embrace the entire range of our products, from burners for civil application (20 kW) up to burners for industrial application (80 MW).

Our expert technicians, specialized and dedicated to the implementation of these products, have capitalized on the experience accumulated over years in the field of standard burners (with normal emission) in order to create a parallel range of low environmental impact burners. **In addition to the scrupulous respect of the limits prescribed by the European directives regulating the pollutant emissions, all these models guarantee values well below those limits; reaching a level of emissions of less than 80 mg/KWh (class 3 EN 676) if CIB UNIGAS's recommendation about boiler thermal load value is respected.** Our low NO_x burners benefit from the installation of an innovative combustion head that re-distributes the gaseous element according to different weights and in negative pressure zone, in this way letting a part of the combusted gases to circulate freely inside.

The applications in which these emission values are required vary widely, such as for example in the systems used for cultivation in greenhouses. Thanks to the special combustion head of our burners, the combustion fumes can be used for the injection of the CO₂ required for the growth

of plants into the greenhouses without the risk of CO emissions that are dangerous for the personnel working inside.

Our burners can be equipped with the most modern automatic mechanical or electronic modulation system which allows the correct gas/air ratio. In this way, the burners' thermal load can be adapted with precision to the heat required at every moment of the operation, thus optimizing the performance. The electronic modulation system makes perfect use of the fuel/combustion air curve, which proves to be wider than the curve obtained by mechanical modulation system. As a consequence the electronic system is faster, timely and optimal in



the adjustment phase. In addition, thanks to the presence of a microprocessor that controls the various phases of the process, the absolute precision in the repetition of the operation sequences is ensured. The reliability of this product, that has been proven by the close cooperation with some of the most important European boiler manufactures, coupled with the company's remarkable versatility, allow us to supply the widest and most complete offer of low pollutant emission burners for the satisfaction of the most particular and specific consumers' requests.

Precisely due to the particularity of the applications for which they have been designed, low NO_x burners require specific technical skills and experience that CIB UNIGAS S.p.A. is happy to provide through its technical assistance that operates around the world and that is regularly re-trained through courses held at the company's headquarters.

Far from representing mere compliance to the latest standards and regulations or the exclusive consequence of marketing logic, these results have been achieved as part of our mission to improve standards of living because we believe our natural environment to be much more than just an abstract concept: it is the home of our present and future.

LOW NO_x NATURAL GAS BURNERS

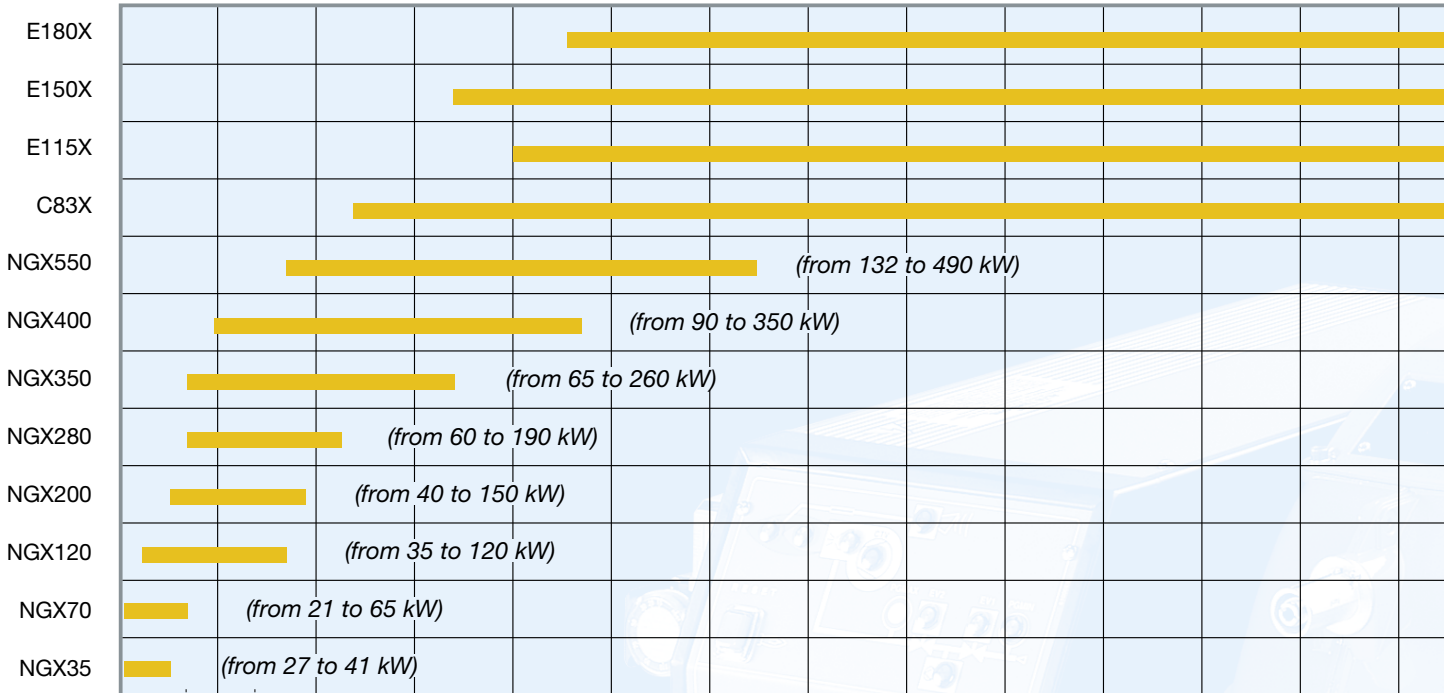
idea series

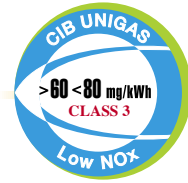
NGX35 - TN
NGX70 - TN/AB
NGX120 - TN/AB
NGX200 - TN/AB/PR/MD
NGX280 - TN/AB
NGX350 - PR/MD
NGX400 - PR/MD
NGX550 - PR/MD

NEW tecnopress series

C83X - AB/PR/MD
E115X - AB/PR/MD
E150X - AB/PR/MD
E180X - AB/PR/MD

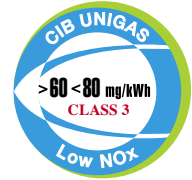
Type





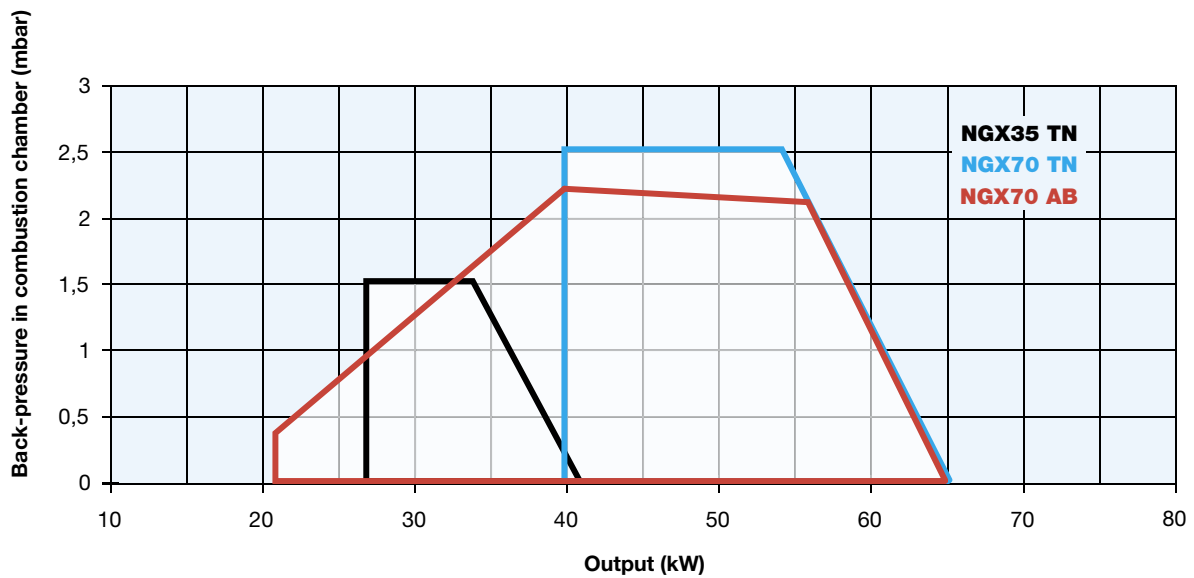
										(from 320 to 1.800 kW)		
							(from 250 to 1.550 kW)					
					(from 300 to 1.150 kW)							
			(from 200 to 830 kW)									

idea SERIES NGX35 NGX70



GAS

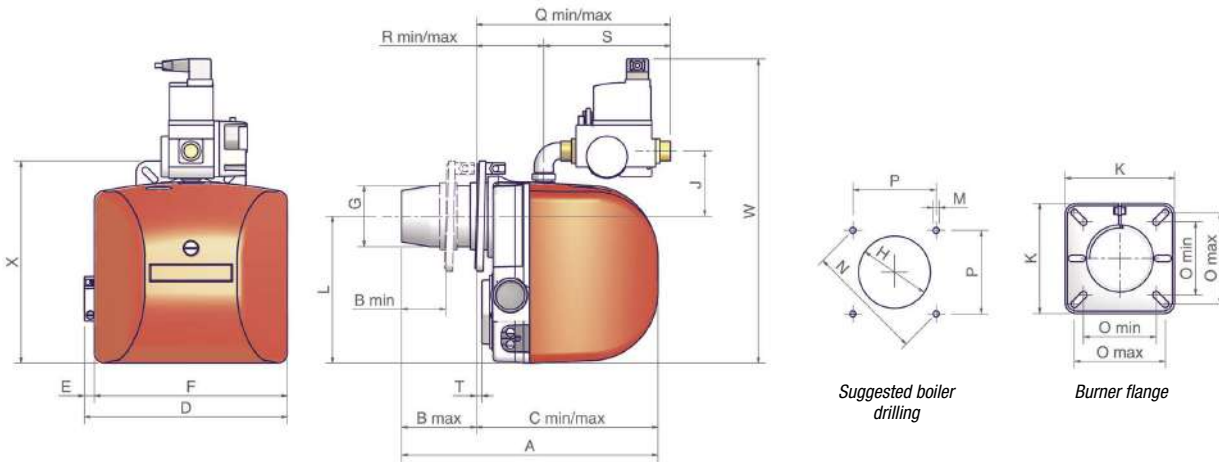
This new generation of IDEA burners **Low NO_x Class 3 (< 80 mg/kWh)**, has been developed and built to ensure the lowest environmental impact. This is achieved thanks to the new combustion head that allows a staged air flow in order to let the flame burn progressively along the length of the combustion chamber.



TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
NGX35	M-.TN.x.xx.A.0.xx	27	41	230 V 1N ac	0,075	1/2"
NGX70	M-.TN.x.xx.A.0.xx	40	65	230 V 1N ac	0,10	1/2" - 3/4"
NGX70	M-.AB.x.xx.A.0.xx	21	65	230 V 1N ac	0,10	1/2" - 3/4"

For the configuration of the gas train, see page 101.



Type	Packaging dimensions (mm)			
	l	p	h	kg
NGX35	290	260	490	10
NGX70	400	300	520	14

Approximate values

Type	Model	Overall dimensions (mm)																Boiler drilling (mm)				Burner flange (mm)						
		A		B		C		D	E	F	G	J	L	Q		R		S	T	W	X	H	M	N	P	K	O	
		min.	max.	min.	max.	min.	max.							min.	max.	min.	max.											
NGX35	M-.TN.S.xx.A.0.xx	338	58	98	240	280	269	14	255	80	86	194	257	297	89	129	180	7	400	266	95	M8	153	108	145	96	120	
NGX35	M-.TN.L.xx.A.0.xx	418	58	178	240	360	269	14	255	80	86	194	257	417	89	209	180	7	400	266	95	M8	153	108	145	96	120	
NGX70	M-.xx.S.xx.A.0.xx	393	76	299	304	14	291	80	99	218	296	130	180	7	438	291	95	M8	153	108	145	96	120					
NGX70	M-.xx.L.xx.A.0.xx	461	76	149	294	377	304	14	291	80	99	218	292	375	125	208	180	7	438	291	95	M8	153	108	145	96	120	

Approximate values



MECHANICAL OPERATION

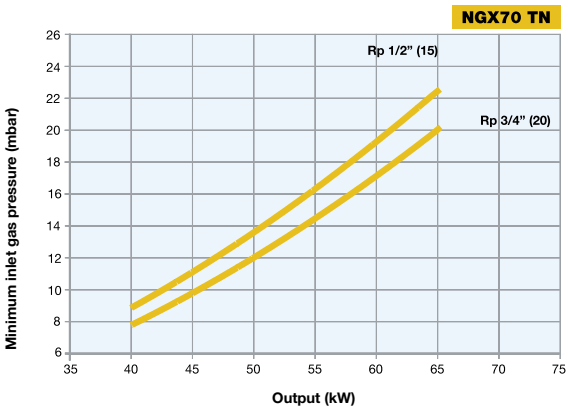
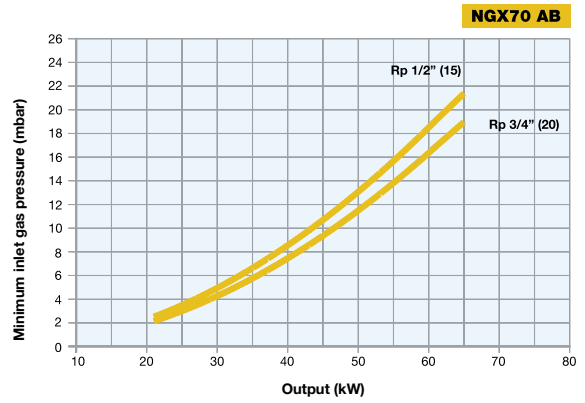
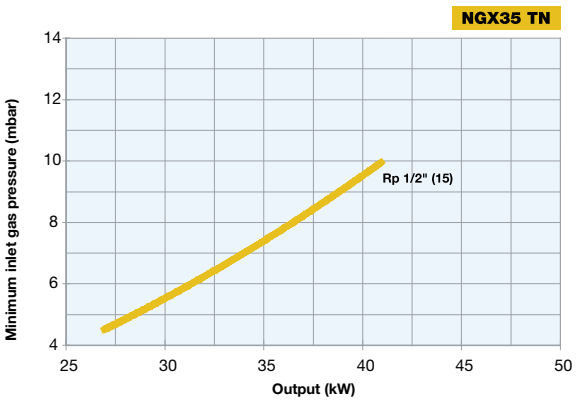
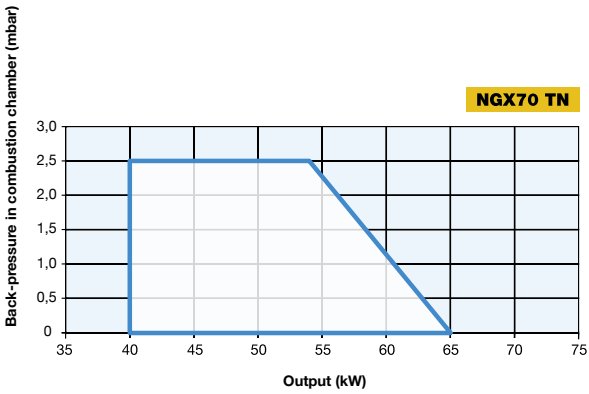
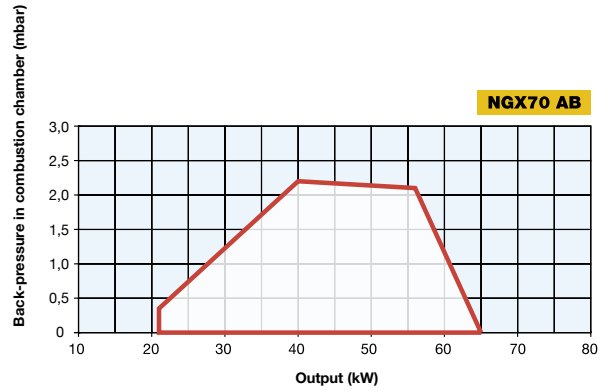
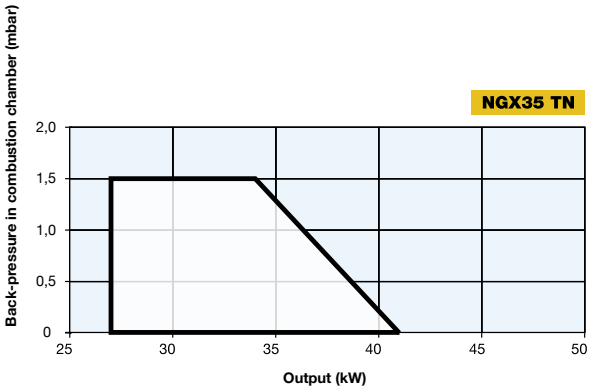
Model	Gas train	Operation	NGX35		NGX70	
			Code	Price €	Code	Price €
M-.TN.S.xx.A.0.15	1/2"	TN	024011441		025012141	
M-.TN.S.xx.Z.0.15 ♦	1/2"	TN	024011641		-	
M-.TN.S.xx.A.0.20	3/4"	TN	-		025012341	
M-.AB.S.xx.A.0.15	1/2"	AB	-		025012142	
M-.AB.S.xx.A.0.20	3/4"	AB	-		025012342	

S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

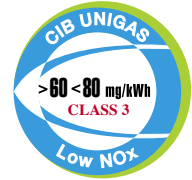
♦ Burner equipped with external air inlet.

In compliance with GAR DIRECTIVE 2016/426/EU



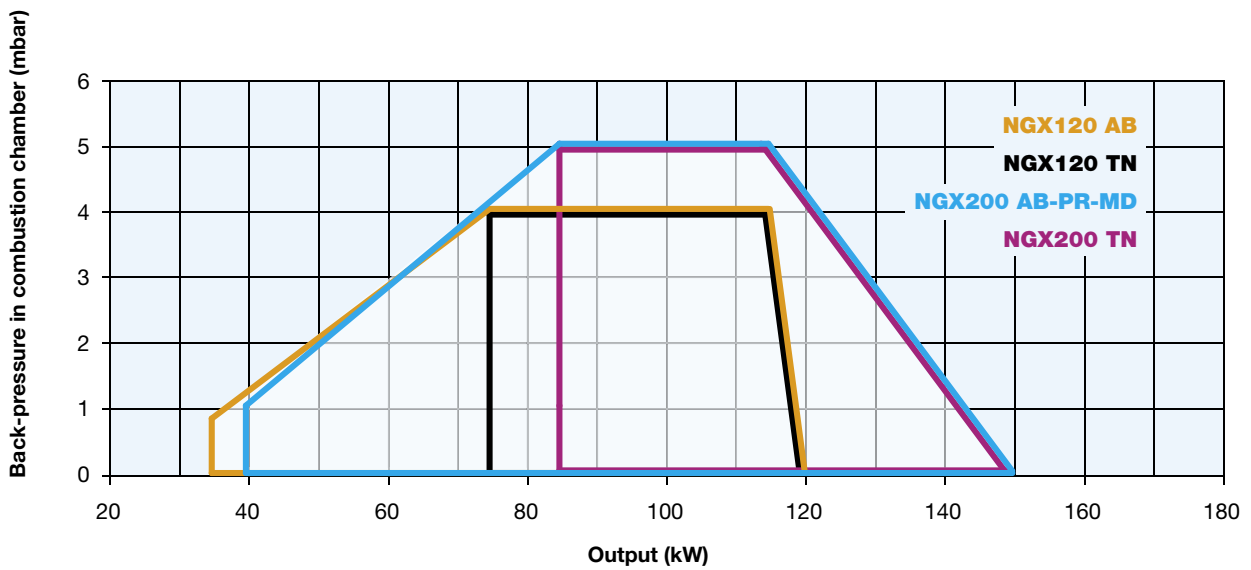
Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

idea SERIES **NGX120 NGX200**



GAS

These burners **Low NO_x Class 3 (< 80 mg/kWh)** can be installed on all pressurized boilers up to 150 kW. Thanks to the new placement of the mechanical and electronic components and to the innovative combustion head, they are easy to use and to be maintained and they ensure optimized performance. The latter aspect is due to the optimal air/fuel mix which lets the flame burn progressively along the length of the combustion chamber.





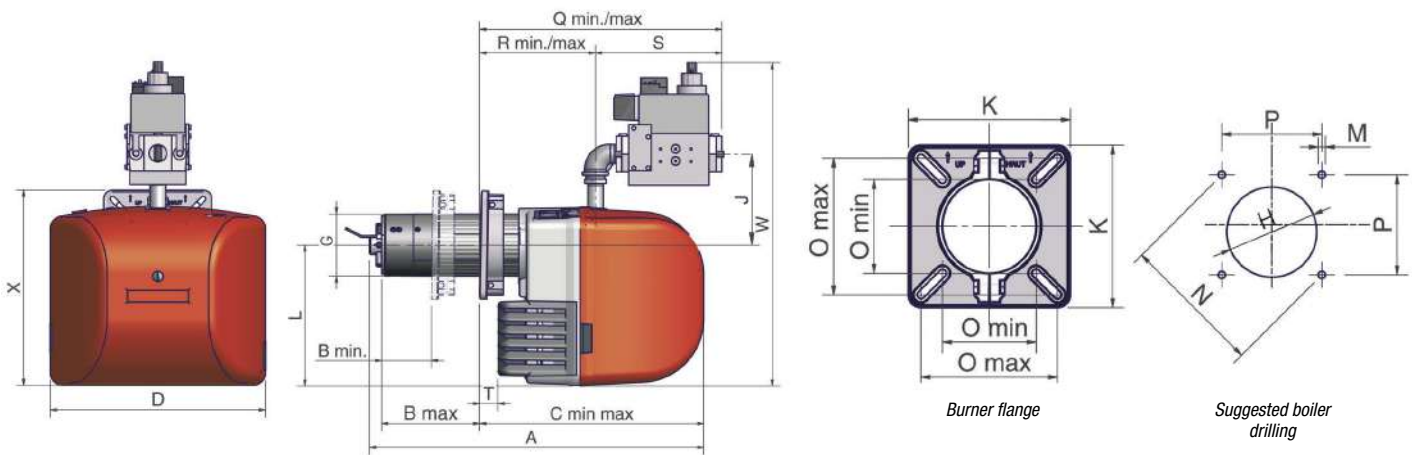
GAS

NGX120 NGX200 *idea* SERIES

TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
NGX120	M-.TN.x.xx.A.0.20	75	120	230 V 1N ac	0,18	3/4"
NGX120	M-.AB.x.xx.A.0.20	35	120	230 V 1N ac	0,18	3/4"
NGX200	M-.TN.x.xx.A.0.xx	85	150	230 V 1N ac	0,18	3/4" - 1"
NGX200	M-.xx.x.xx.A.0.xx	40	150	230 V 1N ac	0,18	3/4" - 1"

For the configuration of the gas train, see page 101.



Type	Packaging dimensions (mm)			
	l	p	h	kg
NGX120..S	600	370	400	24
NGX120..L	750	370	400	25
NGX200..S	600	370	400	24
NGX200..L	750	370	400	25

Approximate values

Type	Model	Overall dimensions (mm)															Foratura caldaia (mm)				Flangia bruciatore (mm)				
		A	B		C		D	G	J	L	Q		R		S	T	W	X	H	M	N	P	K	O	
			min.	max.	min.	max.					min.	max.	min.	max.										min.	max.
NGX120	M-.xx.S.xx.A.0.20	581	85	170	390	475	373	108	158	245	421	506	201	286	220	32	560	340	128	M8	188	133	188	108	158
NGX120	M-.xx.L.xx.A.0.20	681	85	270	390	575	373	108	158	245	421	506	201	286	220	32	560	340	128	M8	188	133	188	108	158
NGX200	M-.xx.S.xx.A.0.25	581	85	170	390	475	373	115	158	245	421	506	201	286	220	32	560	340	134	M8	188	133	188	108	158
NGX200	M-.xx.L.xx.A.0.25	681	85	270	390	575	373	115	158	245	421	506	201	286	220	32	560	340	134	M8	188	133	188	108	158

Approximate values



MECHANICAL OPERATION

Model	Gas train	Operation	NGX120		NGX200	
			Code	Price €	Code	Price €
M-.TN.S.xx.A.0.20	3/4"	TN	026011341		026011741	
M-.TN.S.xx.A.0.25	1"	TN	-		026011941	
M-.AB.S.xx.A.0.20	3/4"	AB	026011342		026011742	
M-.AB.S.xx.A.0.25	1"	AB	-		026011942	
M-.PR.S.xx.A.0.25	1"	PR	-		026011943	

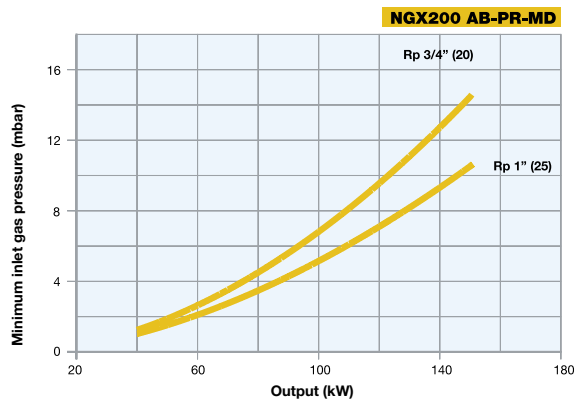
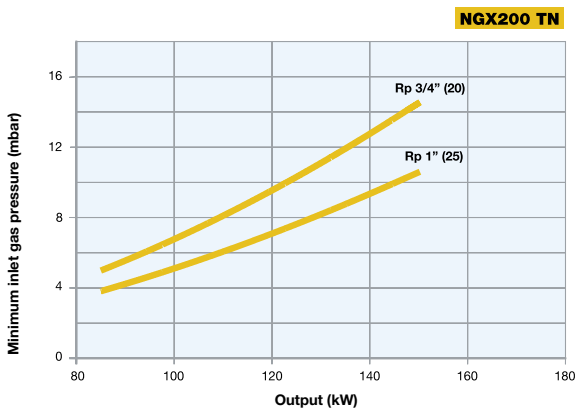
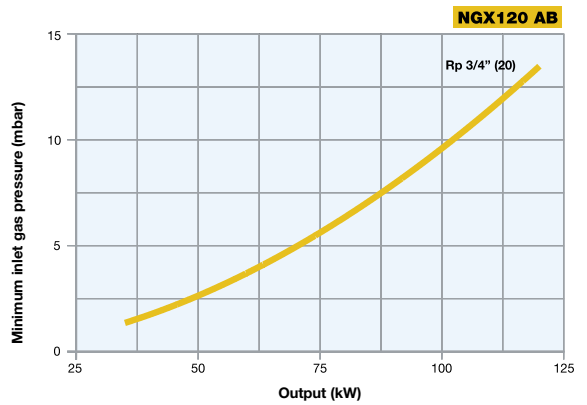
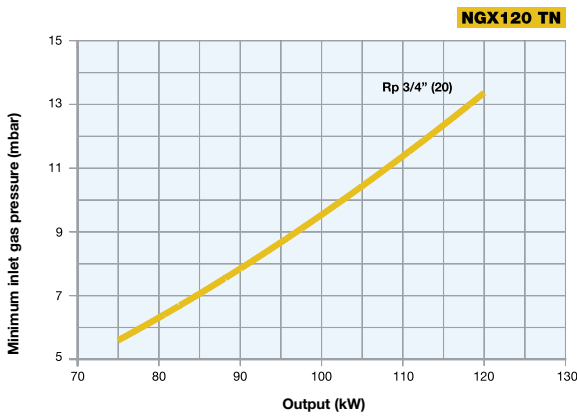
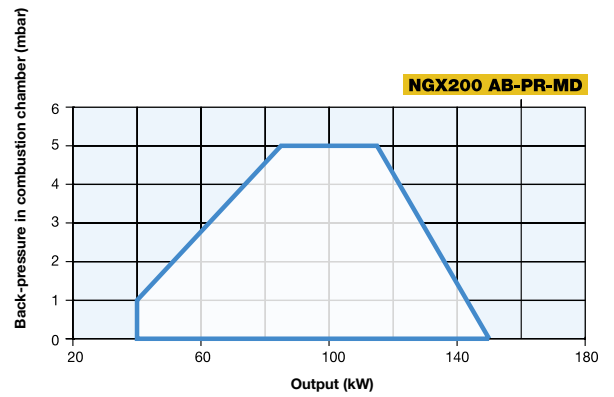
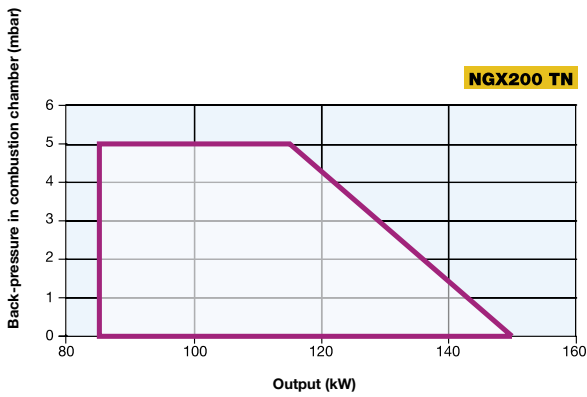
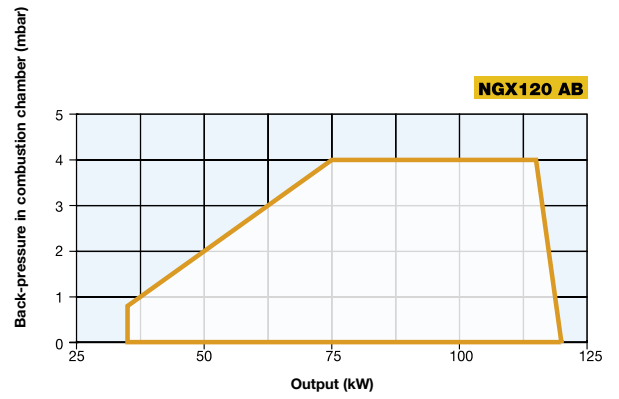
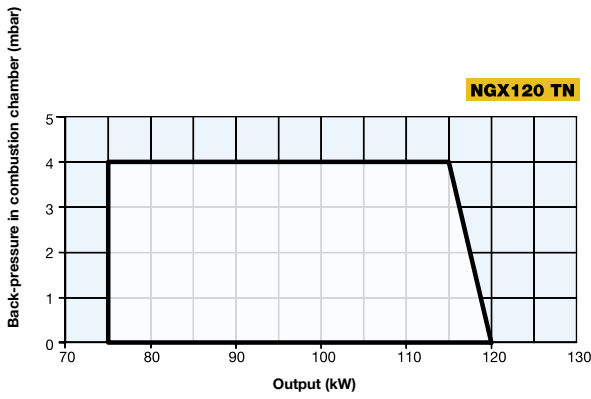
S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

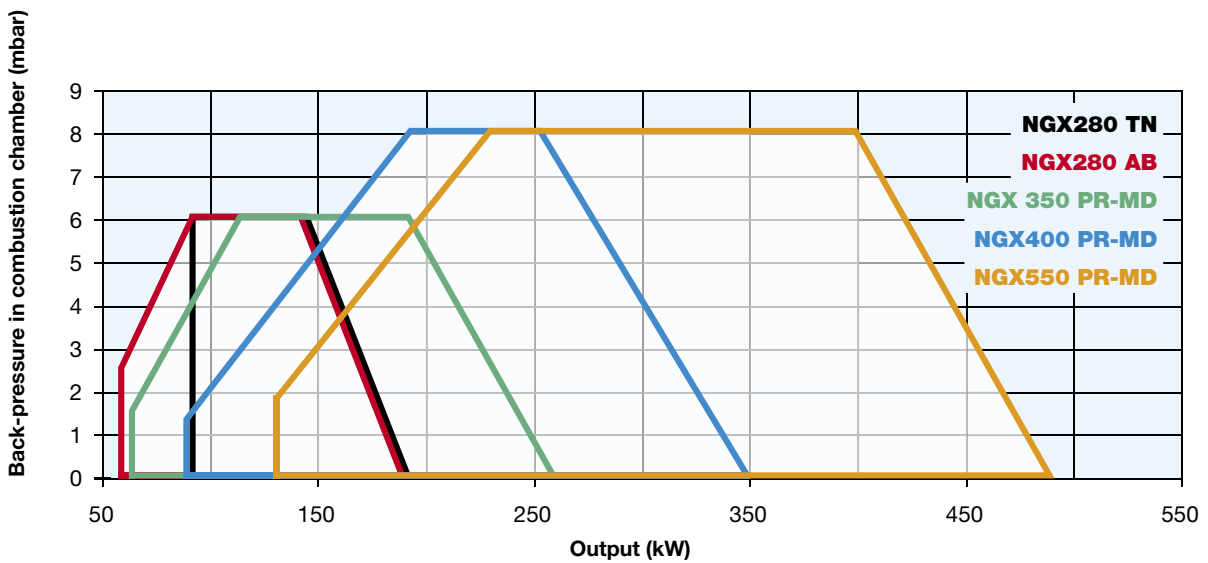
In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

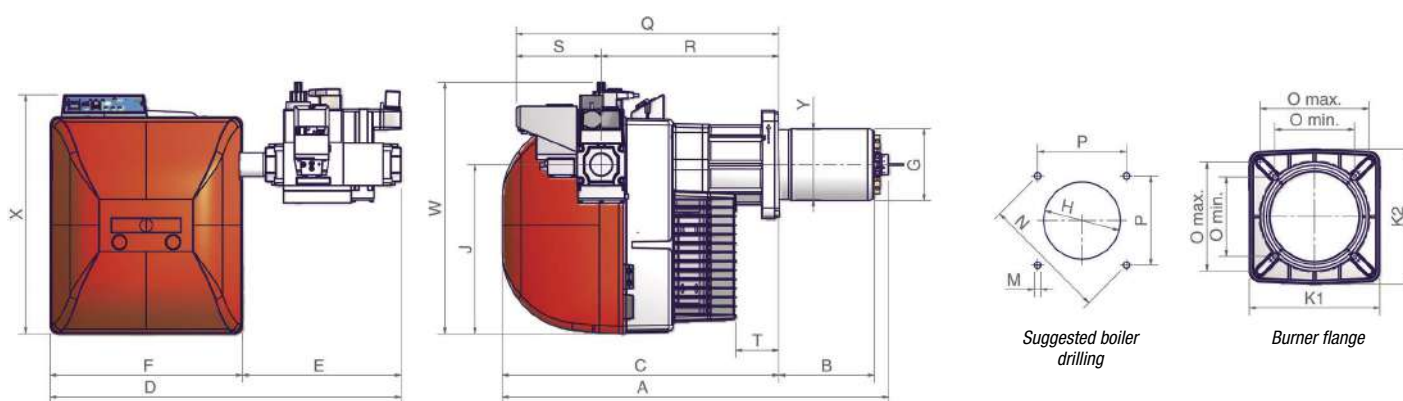
The burners of the series IDEA **Low NO_x Class 3** (< 80 mg/kWh) covering this output range, have been provided with a very advanced and performing combustion head which ensure a stable combustion in all working conditions. The placement of the components inside the burner permits an easy and precise regulation and maintenance.



TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections
		min.	max.			
NGX280	M-.TN.x.xx.A.0.xx	93	190	230 V 1N ac	0,25	1" - 1"¼ - 1"½
NGX280	M-.xx.x.xx.A.0.xx	60	190	230 V 1N ac	0,25	1" - 1"¼ - 1"½
NGX350	M-.xx.x.xx.A.0.xx	65	260	230 V 1N ac	0,37	1" - 1"¼ - 1"½
NGX400	M-.xx.x.xx.A.0.xx	90	350	230 V 1N ac	0,37	1" - 1"¼ - 1"½ - 2"
NGX550	M-.xx.x.xx.A.0.xx	132	490	230 V 1N ac	0,62	1"¼ - 1"½ - 2"

For the configuration of the gas train, see page 101.



Type	Packaging dimensions (mm)			
	l	p	h	kg
NGX280/350/400	1120	440	580	42
NGX550	1200	460	630	55

Approximate values

Type	Model	Overall dimensions (mm)																									
		AS	AL	BS	BL	C	D	E	F	G	H	J	K		M	N	O		P	Q	R	S	T	W	X	Y	
													1	2	min.		max.										
NGX280	M-.xx.x.xx.A.0.25/32	754	899	163	308	570	596	200	396	113	164	348	215	223	M10	219	131	179	155	541	366	175	128	508	491	144	
NGX280	M-.xx.x.xx.A.0.40	754	899	163	308	570	726	330	396	113	164	348	215	223	M10	219	131	179	155	541	366	175	128	517	491	144	
NGX350	M-.xx.x.xx.A.0.25/32	778	908	178	308	570	596	200	396	131	164	348	215	223	M10	219	131	179	155	541	366	175	89	508	491	144	
NGX350	M-.xx.x.xx.A.0.40	778	908	178	308	570	726	330	396	131	164	348	215	223	M10	219	131	179	155	541	366	175	89	517	491	144	
NGX400	M-.xx.x.xx.A.0.25/32	798	928	198	328	570	596	200	396	148	168	348	215	223	M10	219	131	179	155	541	366	175	89	508	491	144	
NGX400	M-.xx.x.xx.A.0.40	798	928	198	328	570	726	330	396	148	168	348	215	223	M10	219	131	179	155	541	366	175	89	517	491	144	
NGX400	M-.xx.x.xx.A.0.50	798	928	198	328	570	726	330	396	148	168	348	215	223	M10	219	131	179	155	541	366	175	89	567	491	144	
NGX550	M-.xx.x.xx.A.0.32	874	974	253	353	590	671	245	426	168	198	384	241	241	M10	247	157	192	174	552	377	175	69	543	533	155	
NGX550	M-.xx.x.xx.A.0.40	874	974	253	353	590	744	318	426	168	198	384	241	241	M10	247	157	192	174	552	377	175	69	553	533	155	
NGX550	M-.xx.x.xx.A.0.50	874	974	253	353	590	744	318	426	168	198	384	241	241	M10	247	157	192	174	552	377	175	69	603	533	155	

Approximate values

MECHANICAL OPERATION

Model	Gas train	Operation	NGX280		NGX350	
			Code	Price €	Code	Price €
M-.TN.S.xx.A.0.25	1"	TN	027012341		-	
M-.TN.S.xx.A.0.32	1"¼	TN	027012541		-	
M-.TN.S.xx.A.0.40	1"½	TN	027012741		-	
M-.AB.S.xx.A.0.25	1"	AB	027012342		-	
M-.AB.S.xx.A.0.32	1"¼	AB	027012542		-	
M-.AB.S.xx.A.0.40	1"½	AB	027012742		-	
M-.PR.S.xx.A.0.25	1"	PR (*)	027012343		-	
M-.PR.S.xx.A.0.32	1"¼	PR (*)	027012543		-	
M-.PR.S.xx.A.0.40	1"½	PR (*)	027012743		-	
M-.PR.M.xx.A.0.25	1"	PR (*)	-		027010843	
M-.PR.M.xx.A.0.32	1"¼	PR (*)	-		027010943	
M-.PR.M.xx.A.0.40	1"½	PR (*)	-		027011043	

Model	Gas train	Operation	NGX400		NGX550	
			Code	Price €	Code	Price €
M-.PR.M.xx.A.0.25	1"	PR (*)	027011143		-	
M-.PR.M.xx.A.0.32	1"¼	PR (*)	027011243		-	
M-.PR.M.xx.A.0.40	1"½	PR (*)	027011343		-	
M-.PR.M.xx.A.0.50	2"	PR (*)	027011543		-	
M-.PR.S.xx.A.0.32	1"¼	PR (*)	-		028010943	
M-.PR.S.xx.A.0.40	1"½	PR (*)	-		028011143	
M-.PR.S.xx.A.0.50	2"	PR (*)	-		028011343	

S = Standard combustion head (BS)

L = For long combustion head version (BL) increase the price (see price list)

M = Short and long reversible combustion head

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU



NGX280 NGX350 NGX400 NGX550 **idea** SERIES

ELECTRONIC OPERATION

Model	Gas train	Operation	NGX280		NGX350	
			Code	Price €	Code	Price €
M-.PR.S.xx.A.1.25.EA	1"	PR (*)	02701235A		-	
M-.PR.S.xx.A.1.32.EA	1"¼	PR (*)	02701255A		-	
M-.PR.S.xx.A.1.40.EA	1"½	PR (*)	02701275A		-	
M-.PR.M.xx.A.1.25.EA	1"	PR (*)	-		02701085A	
M-.PR.M.xx.A.1.32.EA	1"¼	PR (*)	-		02701095A	
M-.PR.M.xx.A.1.40.EA	1"½	PR (*)	-		02701105A	

Model	Gas train	Operation	NGX400		NGX550	
			Code	Price €	Code	Price €
M-.PR.M.xx.A.1.25.EA	1"	PR (*)	02701115A		-	
M-.PR.M.xx.A.1.32.EA	1"¼	PR (*)	02701125A		-	
M-.PR.M.xx.A.1.40.EA	1"½	PR (*)	02701135A		-	
M-.PR.M.xx.A.1.50.EA	2"	PR (*)	02701155A		-	
M-.PR.S.xx.A.1.32.EA	1"¼	PR (*)	-		02801095A	
M-.PR.S.xx.A.1.40.EA	1"½	PR (*)	-		02801115A	
M-.PR.S.xx.A.1.50.EA	2"	PR (*)	-		02801135A	

S = Standard combustion head (BS)

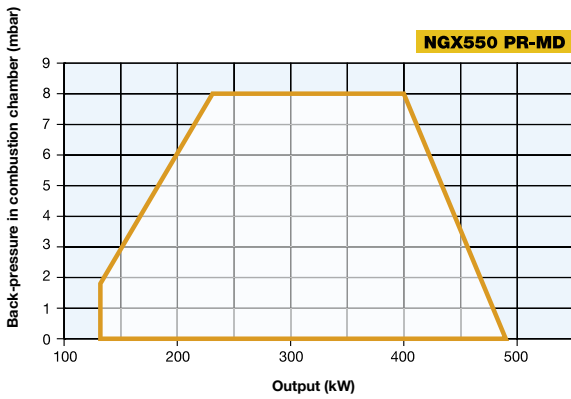
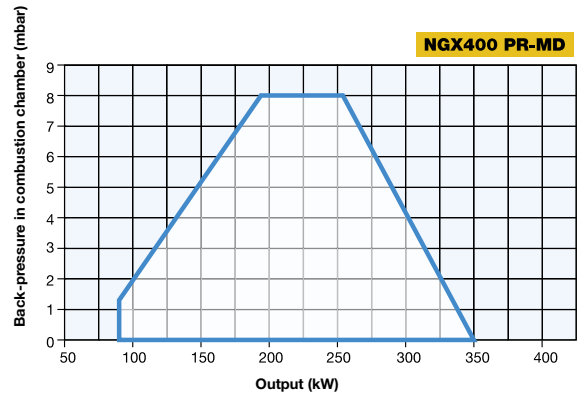
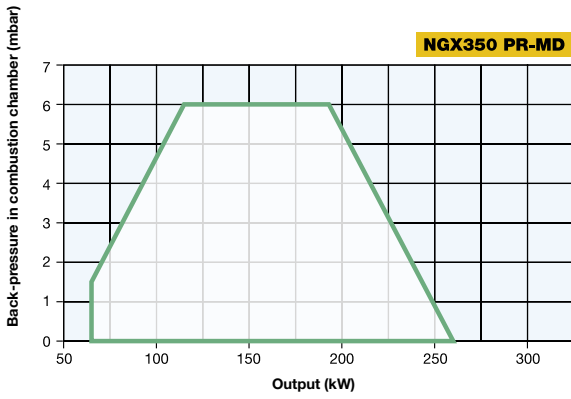
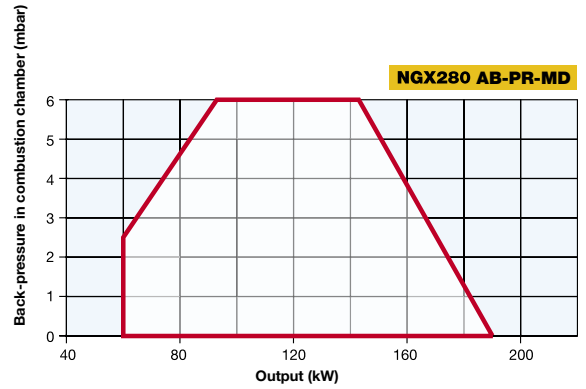
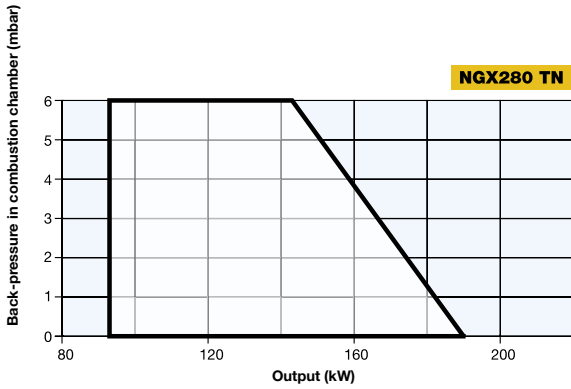
L = For long combustion head version (BL) increase the price (see price list)

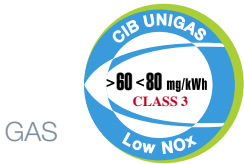
M = Short and long reversible combustion head

(*) Progressive PR control, for modulating version MD add € (see price list)

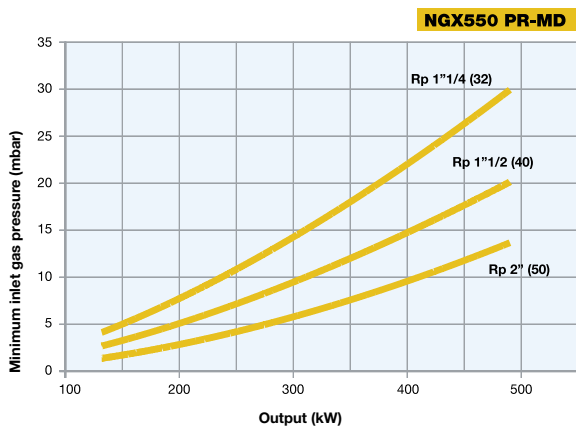
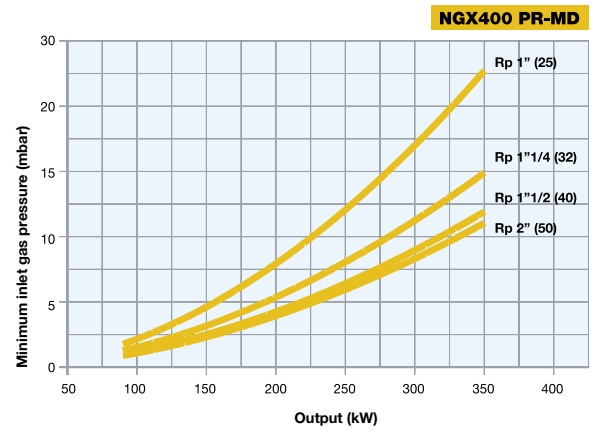
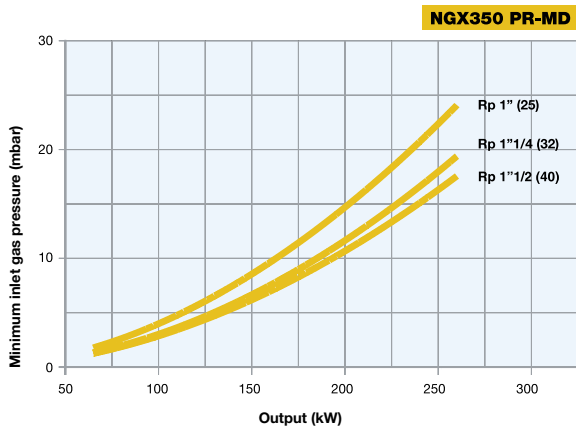
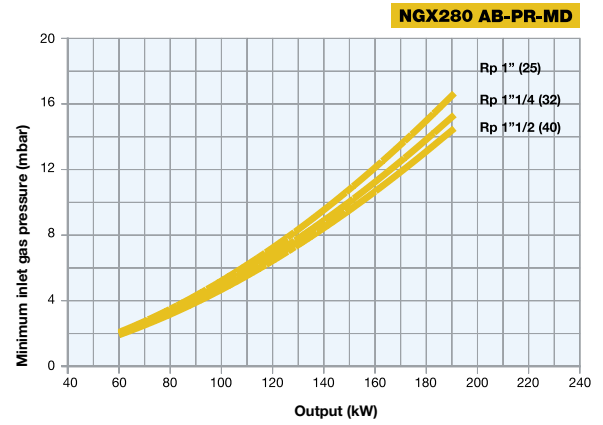
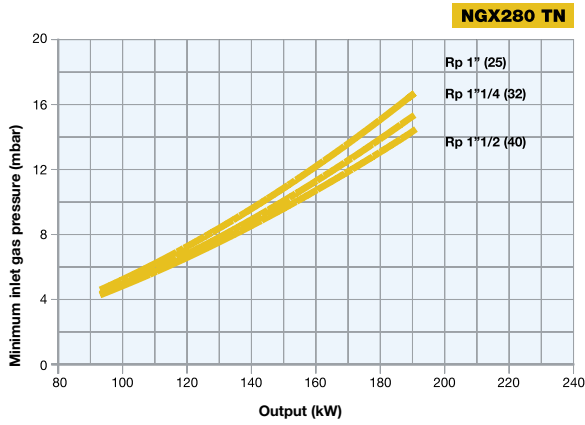
In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU



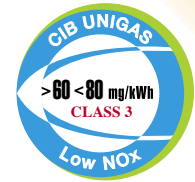


NGX280 NGX350 NGX400 NGX550 **idea** SERIES



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

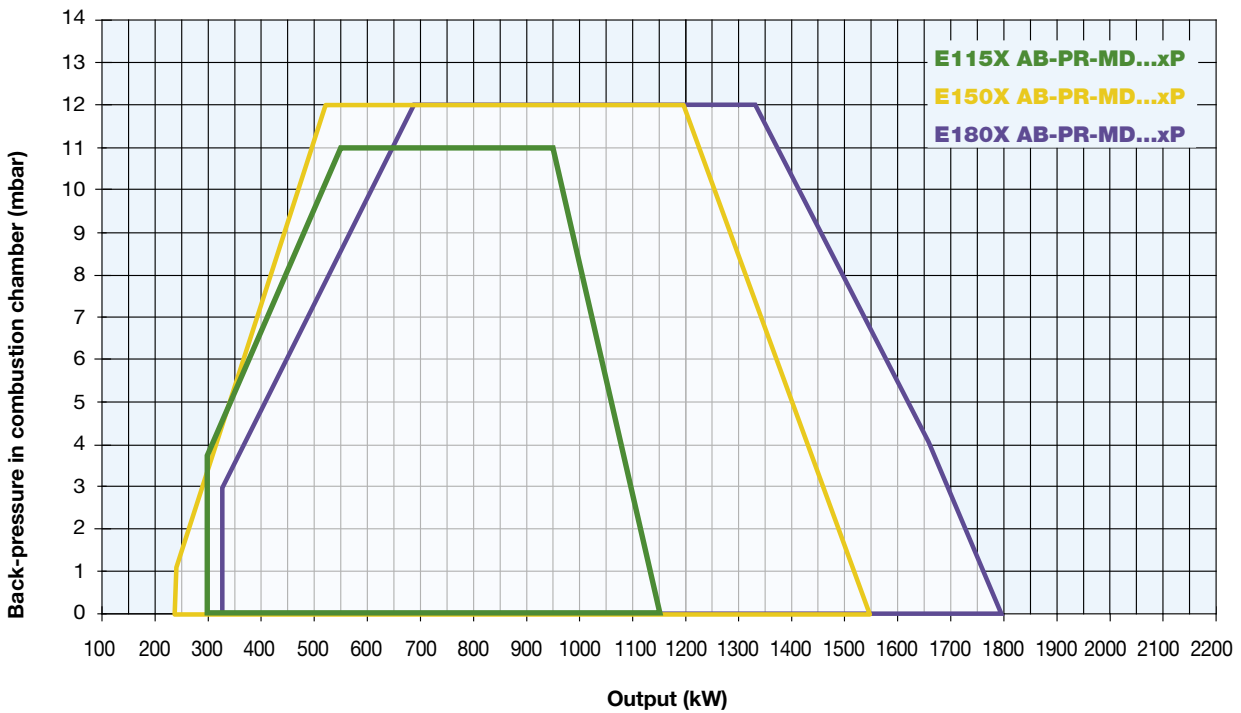
tecnopress SERIES E115X E150X E180X...xP



GAS



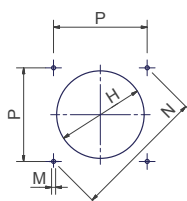
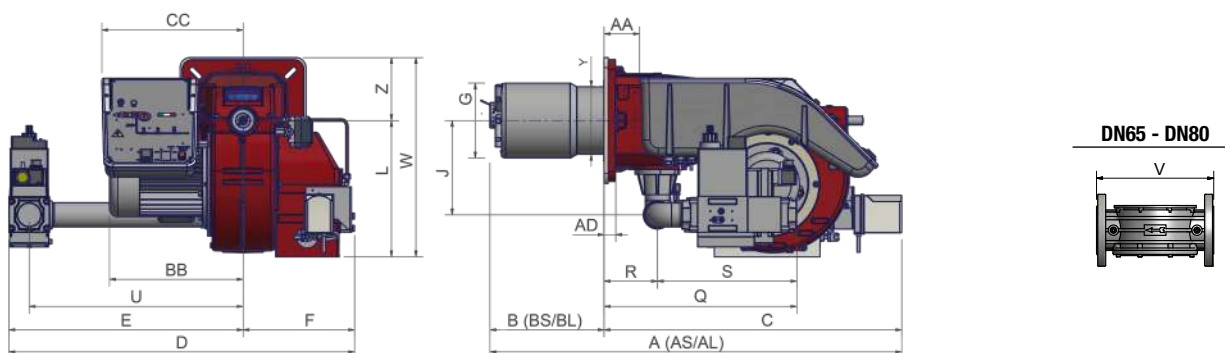
The TECNOPRESS series **Low NO_x Class 3 (< 80 mg/kWh)**, represents the average output range. This series is the result of CIB UNIGAS great experience on burners with output up to 1.800 kW. It is characterized by simple mechanical or electronic adjusting procedure and simple maintenance, thanks to the accessible placement of the components.



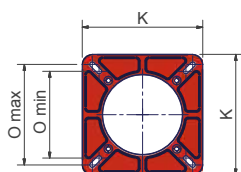
TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections	Noise level dBA
		min.	max.				
E115X	M-.xx.xP.xx.A.0.xx	300	1.150	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80	< 80
E150X	M-.xx.xP.xx.A.1.xx	250	1.550	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80	< 80
E180X	M-.xx.xP.xx.A.1.xx	320	1.800	230/400 V 3N ac	3,0	1"½ - 2" - DN65 - DN80	< 80

For the configuration of the gas train, see page 101.



Suggested boiler drilling



Burner flange

Type	Packaging dimensions (mm)			
	l	p	h	kg
E115X	1465	815	800	115
E150X	1465	815	800	125
E180X*	1465	815	800	125

Approximate values

* Approximate values (regarding model with gas train DN80)

Type	Model	Overall dimensions (mm)																													
		AA	AS	AL	BB	BS	BL	C	CC	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	U	V	X	Y	Z	
		min. max.																													
E115X	M-.xx.xP.xx.A.0.40	69	1170	1255	372	305	390	831	352	925	591	334	219	249	210	233	300	420	M10	330	216	250	233	457	130	327	541	-	575	210	155
E115X	M-.xx.xP.xx.A.0.50	69	1170	1255	372	305	390	831	352	860	526	334	219	249	210	233	300	420	M10	330	216	250	233	472	130	342	526	-	575	210	155
E115X	M-.xx.xP.xx.A.0.65	69	1170	1255	372	305	390	831	352	1052	718	334	219	249	210	233	300	420	M10	330	216	250	233	562	130	432	593	292	575	210	155
E115X	M-.xx.xP.xx.A.0.80	69	1170	1255	372	305	390	831	352	1026	692	334	219	249	210	233	300	420	M10	330	216	250	233	558	130	428	565	310	575	210	155
E150X	M-.xx.xP.xx.A.1.40	69	1265	1331	372	400	500	831	352	1050	716	334	259	280	210	233	300	453	M10	330	216	250	233	457	130	327	541	-	608	210	155
E150X	M-.xx.xP.xx.A.1.50	69	1265	1331	372	400	500	831	352	985	651	334	259	280	210	233	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E150X	M-.xx.xP.xx.A.1.65	69	1265	1331	372	400	500	831	352	1134	800	334	259	280	210	233	300	453	M10	330	216	250	233	562	130	432	593	292	608	210	155
E150X	M-.xx.xP.xx.A.1.80	69	1265	1331	372	400	500	831	352	1108	774	334	259	280	210	233	300	453	M10	330	216	250	233	562	130	432	565	310	608	210	155
E180X	M-.xx.xP.xx.A.1.40	69	1265	1365	403	400	500	831	352	1050	716	334	259	280	210	235	300	420	M10	330	216	250	233	457	130	327	541	-	575	210	155
E180X	M-.xx.xP.xx.A.1.50	69	1265	1365	403	400	500	831	352	985	651	334	259	280	210	235	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E180X	M-.xx.xP.xx.A.1.65	69	1265	1365	403	400	500	831	352	1134	800	334	259	280	210	235	300	453	M10	330	216	250	233	562	130	432	593	292	608	210	155
E180X	M-.xx.xP.xx.A.1.80	69	1265	1365	403	400	500	831	352	1108	774	334	259	280	210	235	300	453	M10	330	216	250	233	558	130	428	565	310	608	210	155

Approximate values

MECHANICAL OPERATION

Model	Gas train	Operation	E115X...xP		E150X..xP		E180X...xP	
			Code	Price €	Code	Price €	Code	Price €
M-.AB.SP.xx.A.0.40	1"½	AB	030014542		-		-	
M-.AB.SP.xx.A.0.50	2"	AB	030014742		-		-	
M-.AB.SP.xx.A.0.65	DN65	AB	030014942		-		-	
M-.AB.SP.xx.A.0.80	DN80	AB	030015142		-		-	
M-.PR.SP.xx.A.0.40	1"½	PR (*)	030014543		-		-	
M-.PR.SP.xx.A.0.50	2"	PR (*)	030014743		-		-	
M-.PR.SP.xx.A.0.65	DN65	PR (*)	030014943		-		-	
M-.PR.SP.xx.A.0.80	DN80	PR (*)	030015143		-		-	
M-.AB.SP.xx.A.1.40	1"½	AB	-		03001A552		03001B352	
M-.AB.SP.xx.A.1.50	2"	AB	-		03001A752		03001B552	
M-.AB.SP.xx.A.1.65	DN65	AB	-		03001A952		03001B752	
M-.AB.SP.xx.A.1.80	DN80	AB	-		03001B152		03001B952	
M-.PR.SP.xx.A.1.40	1"½	PR (*)	-		03001A553		03001B353	
M-.PR.SP.xx.A.1.50	2"	PR (*)	-		03001A753		03001B553	
M-.PR.SP.xx.A.1.65	DN65	PR (*)	-		03001A953		03001B753	
M-.PR.SP.xx.A.1.80	DN80	PR (*)	-		03001B153		03001B953	

SP = Standard combustion head (BS)

LP = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	E115X...xP		E150X..xP		E180X...xP	
			Code	Price €	Code	Price €	Code	Price €
M-.PR.SP.xx.A.1.40.EA	1"½	PR (*)	03001455A		03001A55A		03001B35A	
M-.PR.SP.xx.A.1.50.EA	2"	PR (*)	03001475A		03001A75A		03001B55A	
M-.PR.SP.xx.A.1.65.EA	DN65	PR (*)	03001495A		03001A95A		03001B75A	
M-.PR.SP.xx.A.1.80.EA	DN80	PR (*)	03001515A		03001B15A		03001B95A	

SP = Standard combustion head (BS)

LP = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	E115X...xP		E150X..xP		E180X...xP	
			Code	Price €	Code	Price €	Code	Price €
M-.MD.SP.xx.A.1.40.ES	1"½	MD (**)	03001455S		03001A55S		03001B35S	
M-.MD.SP.xx.A.1.50.ES	2"	MD (**)	03001475S		03001A75S		03001B55S	
M-.MD.SP.xx.A.1.65.ES	DN65	MD (**)	03001495S		03001A95S		03001B75S	
M-.MD.SP.xx.A.1.80.ES	DN80	MD (**)	03001515S		03001B15S		03001B95S	

SP = Standard combustion head (BS)

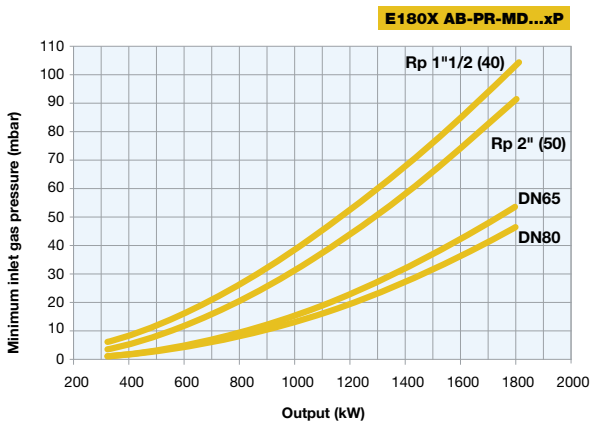
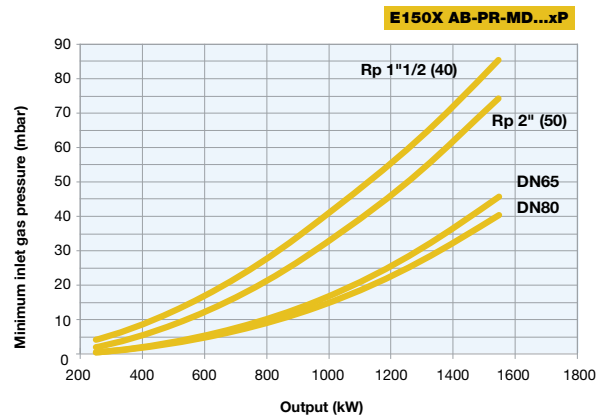
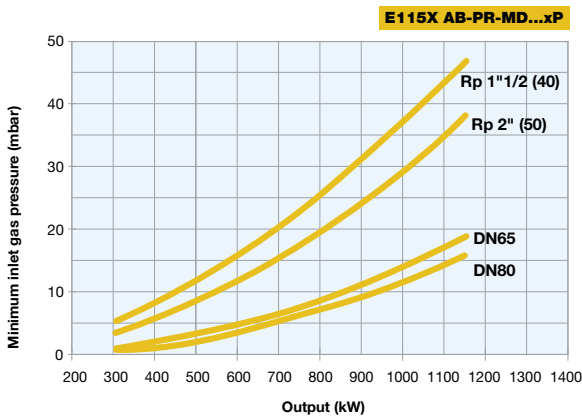
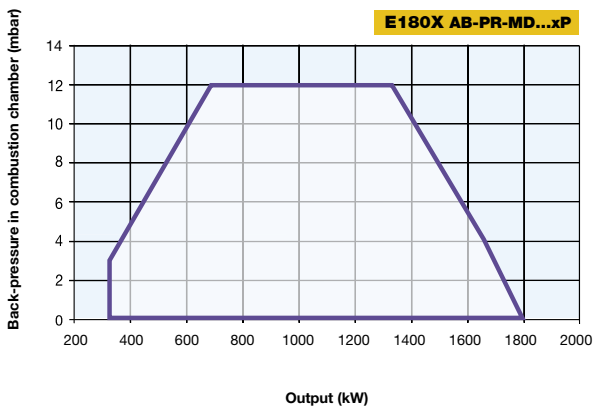
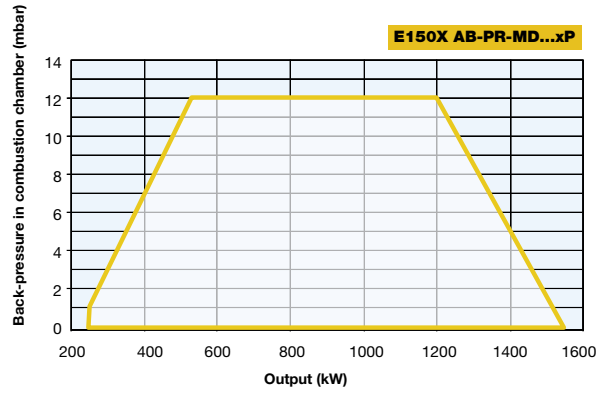
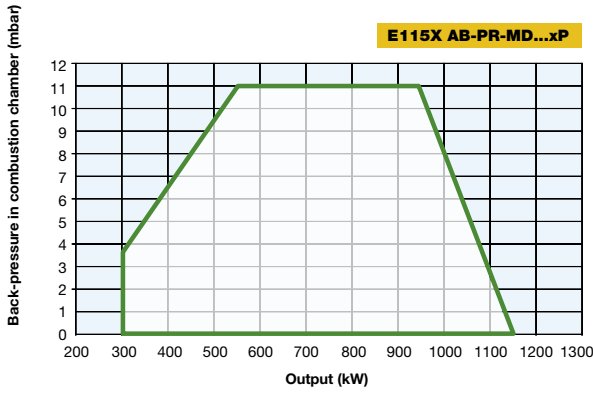
LP = For long combustion head version (BL) increase the price (see price list)

(**) The burners are already MD version. In order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

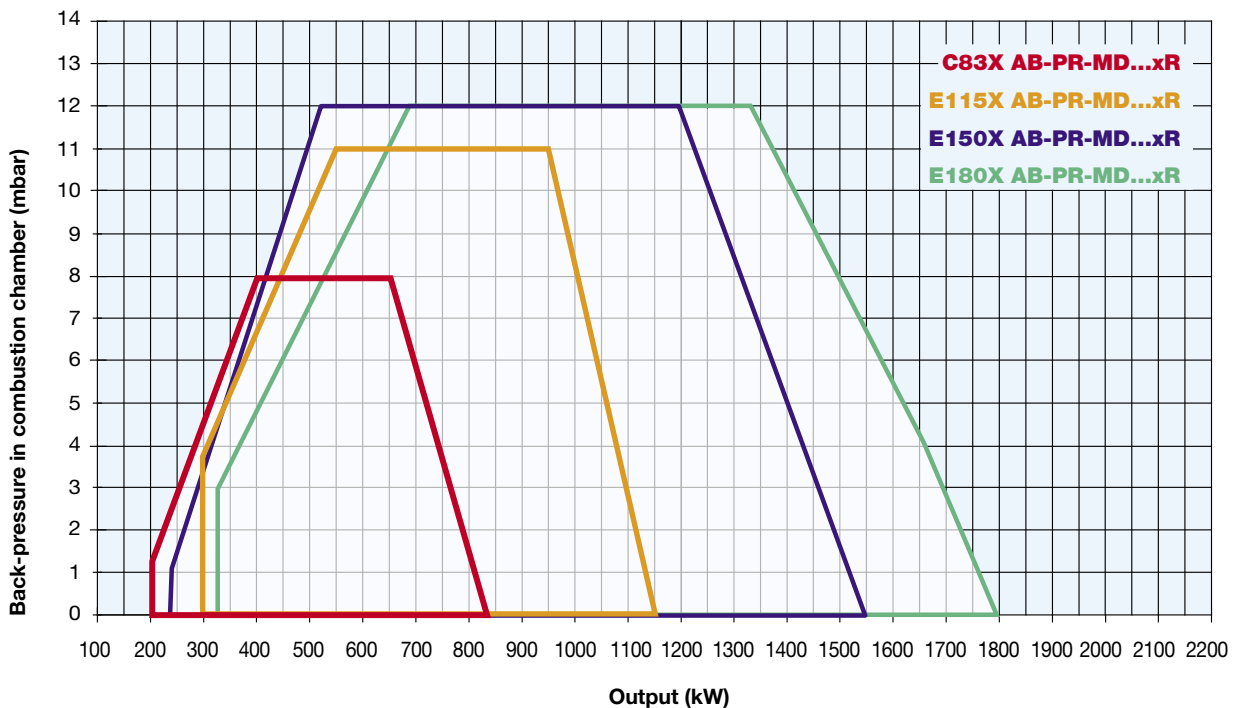


E115X E150X E180X...xP **tecnopress** SERIES



Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

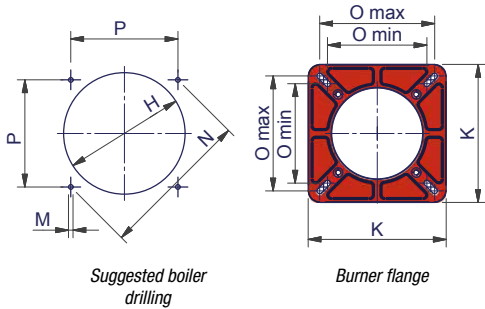
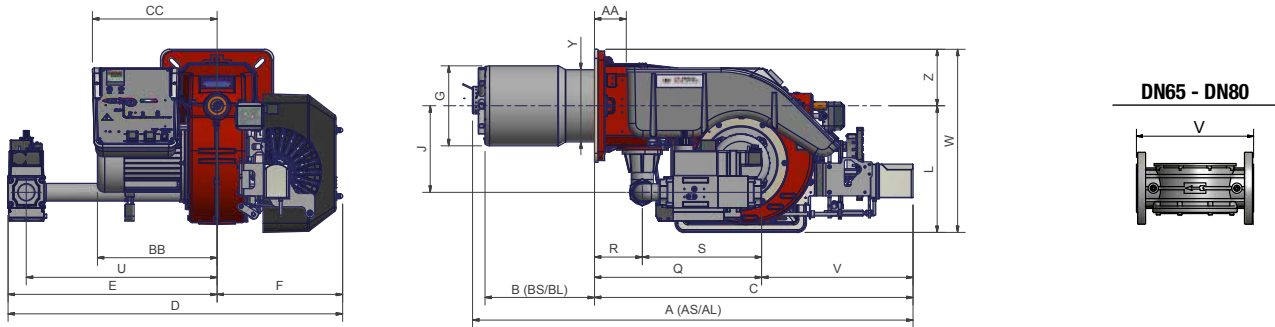
TECNOPRESS burners **Low NO_x Class 3 (< 80 mg/kWh)**, represent the average output range. This series is the result of the CIB UNIGAS great experience on burners with output up to 1.800 kW. It is characterized by simple mechanical or electronic adjusting procedure and simple maintenance, thanks to the accessible placement of the components. These models are equipped with air inlet silencer to reduce the noise level.



TECHNICAL DETAILS

Type	Model	Power kW		Electric power supply	Fan motor kW	Gas connections	Noise level dBA
		min.	max.				
C83X	M-.xx.xR.xx.A.0.xx	200	830	230/400 V 3N ac	1,1	1"¼ - 1"½ - 2" - DN65	< 75
E115X	M-.xx.xR.xx.A.0.xx	300	1.150	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80	< 75
E150X	M-.xx.xR.xx.A.1.xx	250	1.550	230/400 V 3N ac	2,2	1"½ - 2" - DN65 - DN80	< 75
E180X	M-.xx.xR.xx.A.1.xx	320	1.800	230/400 V 3N ac	3,0	1"½ - 2" - DN65 - DN80	< 75

For the configuration of the gas train, see page 101.



Type	Packaging dimensions (mm)			
	l	p	h	kg
C83X	1345	835	750	60
E115X	1465	815	800	115
E150X	1465	815	800	125
E180X*	1465	815	800	125

Approximate values

* Approximate values (regarding model with gas train DN80)

Type	Model	Overall dimensions (mm)																													
		AA	AS	AL	BB	BS	BL	C	CC	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	U	V	W	Y	Z	
		min.		max.		min.		max.		min.		max.		min.		max.		min.		max.		min.		max.		min.		max.		min.	
C83X	M-.xx.xR.xx.A.0.32	87	1207	1335	328	300	450	873	342	978	634	344	219	249	198	233	300	347	M10	330	216	250	233	387	131	256	540	-	502	198	155
C83X	M-.xx.xR.xx.A.0.40	87	1207	1335	328	300	450	873	342	978	634	344	219	249	198	233	300	347	M10	330	216	250	233	461	131	330	540	-	502	198	155
C83X	M-.xx.xR.xx.A.0.50	87	1207	1335	328	300	450	873	342	978	634	344	219	249	198	233	300	347	M10	330	216	250	233	471	131	340	525	-	502	198	155
C83X	M-.xx.xR.xx.A.0.65	87	1207	1335	328	300	450	873	342	1064	720	344	219	249	198	233	300	347	M10	330	216	250	233	571	131	440	593	292	502	198	155
E115X	M-.xx.xR.xx.A.0.40	69	1267	1352	372	305	390	928	352	953	591	362	219	249	210	233	300	453	M10	330	216	250	233	457	130	327	541	-	608	210	155
E115X	M-.xx.xR.xx.A.0.50	69	1267	1352	372	305	390	928	352	888	526	362	219	249	210	233	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E115X	M-.xx.xR.xx.A.0.65	69	1267	1352	372	305	390	928	352	1080	718	362	219	249	210	233	300	453	M10	330	216	250	233	562	130	432	593	292	608	210	155
E115X	M-.xx.xR.xx.A.0.80	69	1267	1352	372	305	390	928	352	1054	692	362	219	249	210	233	300	453	M10	330	216	250	233	558	130	428	565	310	608	210	155
E150X	M-.xx.xR.xx.A.1.40	69	1362	1428	372	400	500	928	352	1078	716	362	259	280	210	233	300	453	M10	330	216	250	233	457	130	327	541	-	608	210	155
E150X	M-.xx.xR.xx.A.1.50	69	1362	1428	372	400	500	928	352	1013	651	362	259	280	210	233	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E150X	M-.xx.xR.xx.A.1.65	69	1362	1428	372	400	500	928	352	1162	800	362	259	280	210	233	300	453	M10	330	216	250	233	562	130	432	593	292	608	210	155
E150X	M-.xx.xR.xx.A.1.80	69	1362	1428	372	400	500	928	352	1136	774	362	259	280	210	233	300	453	M10	330	216	250	233	562	130	432	565	310	608	210	155
E180X	M-.xx.xR.xx.A.1.40	69	1362	1462	403	400	500	928	352	1078	716	362	259	280	210	235	300	453	M10	330	216	250	233	457	130	327	541	-	608	210	155
E180X	M-.xx.xR.xx.A.1.50	69	1362	1462	403	400	500	928	352	1013	651	362	259	280	210	235	300	453	M10	330	216	250	233	472	130	342	526	-	608	210	155
E180X	M-.xx.xR.xx.A.1.65	69	1362	1462	403	400	500	928	352	1162	800	362	259	280	210	235	300	453	M10	330	216	250	233	562	130	432	593	292	608	210	155
E180X	M-.xx.xR.xx.A.1.80	69	1362	1462	403	400	500	928	352	1136	774	362	259	280	210	235	300	453	M10	330	216	250	233	558	130	428	565	310	608	210	155

Approximate values

MECHANICAL OPERATION

Model	Gas train	Operation	C83X...xR		E115X...xR	
			Code	Price €	Code	Price €
M-.AB.SR.xx.A.0.32	1"¼	AB	033014142		-	
M-.AB.SR.xx.A.0.40	1"½	AB	033014342		030012942	
M-.AB.SR.xx.A.0.50	2"	AB	033014542		030013142	
M-.AB.SR.xx.A.0.65	DN65	AB	033014742		030013342	
M-.AB.SR.xx.A.0.80	DN80	AB	-		030013542	
M-.PR.SR.xx.A.0.32	1"¼	PR (*)	033014143		-	
M-.PR.SR.xx.A.0.40	1"½	PR (*)	033014343		030012943	
M-.PR.SR.xx.A.0.50	2"	PR (*)	033014543		030013143	
M-.PR.SR.xx.A.0.65	DN65	PR (*)	033014743		030013343	
M-.PR.SR.xx.A.0.80	DN80	PR (*)	-		030013543	

Model	Gas train	Operation	E150X...xR		E180X...xR	
			Code	Price €	Code	Price €
M-.AB.SR.xx.A.1.40	1"½	AB	03001D152		03001D952	
M-.AB.SR.xx.A.1.50	2"	AB	03001D352		03001E152	
M-.AB.SR.xx.A.1.65	DN65	AB	03001D552		03001E352	
M-.AB.SR.xx.A.1.80	DN80	AB	03001D752		03001E552	
M-.PR.SR.xx.A.1.40	1"½	PR (*)	03001D153		03001D953	
M-.PR.SR.xx.A.1.50	2"	PR (*)	03001D353		03001E153	
M-.PR.SR.xx.A.1.65	DN65	PR (*)	03001D553		03001E353	
M-.PR.SR.xx.A.1.80	DN80	PR (*)	03001D753		03001E553	

SR = Standard combustion head (BS)

LR = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU



C83X E115X E150X E180X...xR **tecnopress** SERIES

ELECTRONIC OPERATION

Model	Gas train	Operation	C83X...xR		E115X...xR	
			Code	Price €	Code	Price €
M-.PR.SR.xx.A.1.32.EA	1"¼	PR (*)	03301415A		-	
M-.PR.SR.xx.A.1.40.EA	1"½	PR (*)	03301435A		03001295A	
M-.PR.SR.xx.A.1.50.EA	2"	PR (*)	03301455A		03001315A	
M-.PR.SR.xx.A.1.65.EA	DN65	PR (*)	03301475A		03001335A	
M-.PR.SR.xx.A.1.80.EA	DN80	PR (*)	-		03001355A	

Model	Gas train	Operation	E150X...xR		E180X...xR	
			Code	Price €	Code	Price €
M-.PR.SR.xx.A.1.40.EA	1"½	PR (*)	03001D15A		03001D95A	
M-.PR.SR.xx.A.1.50.EA	2"	PR (*)	03001D35A		03001E15A	
M-.PR.SR.xx.A.1.65.EA	DN65	PR (*)	03001D55A		03001E35A	
M-.PR.SR.xx.A.1.80.EA	DN80	PR (*)	03001D75A		03001E55A	

SR = Standard combustion head (BS)

LR = For long combustion head version (BL) increase the price (see price list)

(*) Progressive PR control, for modulating version MD add € (see price list)

In the full modulating version MD in order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

In compliance with GAR DIRECTIVE 2016/426/EU

ELECTRONIC OPERATION

Model	Gas train	Operation	C83X...xR		E115X...xR	
			Code	Price €	Code	Price €
M-.MD.SR.xx.A.1.32.ES	1"¼	MD (**)	03301415S		-	
M-.MD.SR.xx.A.1.40.ES	1"½	MD (**)	03301435S		03001295S	
M-.MD.SR.xx.A.1.50.ES	2"	MD (**)	03301455S		03001315S	
M-.MD.SR.xx.A.1.65.ES	DN65	MD (**)	03301475S		03001335S	
M-.MD.SR.xx.A.1.80.ES	DN80	MD (**)	-		03001355S	

Model	Gas train	Operation	E150X...xR		E180X...xR	
			Code	Price €	Code	Price €
M-.MD.SR.xx.A.1.40.ES	1"½	MD (**)	03001D15S		03001D95S	
M-.MD.SR.xx.A.1.50.ES	2"	MD (**)	03001D35S		03001E15S	
M-.MD.SR.xx.A.1.65.ES	DN65	MD (**)	03001D55S		03001E35S	
M-.MD.SR.xx.A.1.80.ES	DN80	MD (**)	03001D75S		03001E55S	

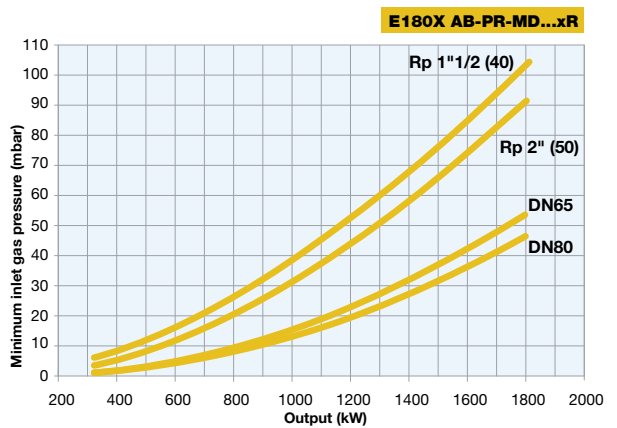
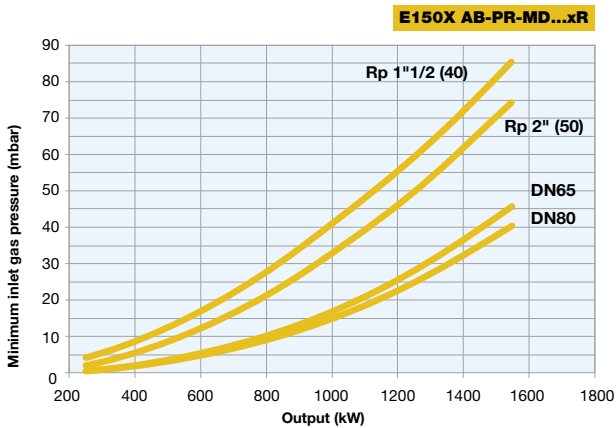
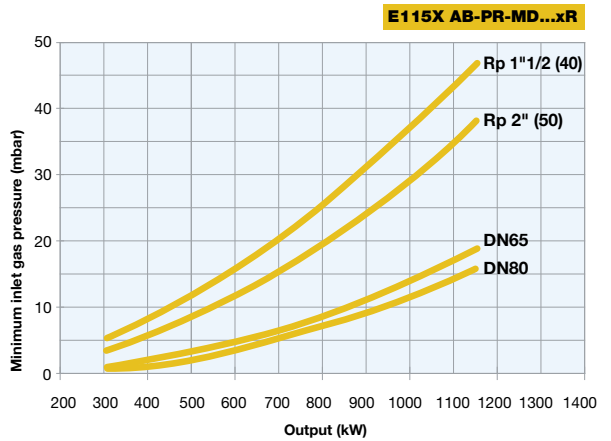
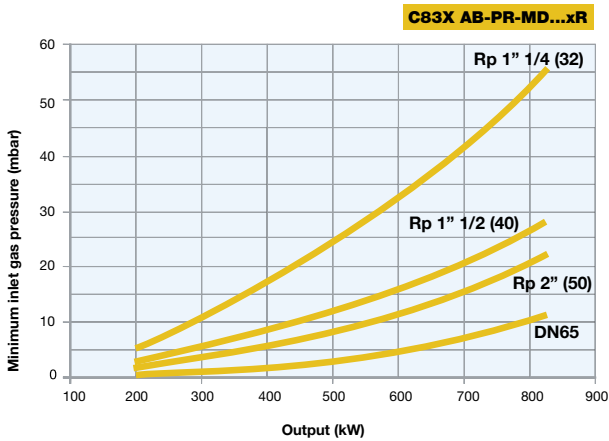
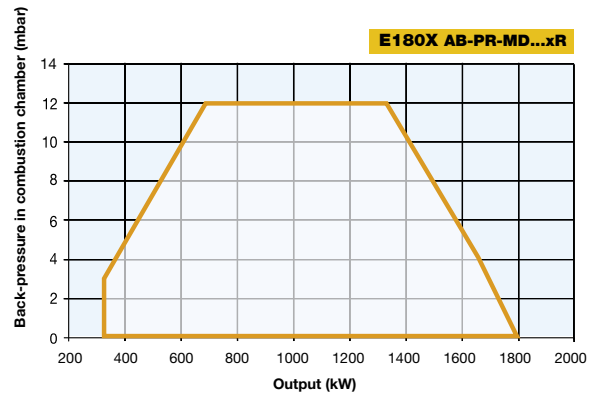
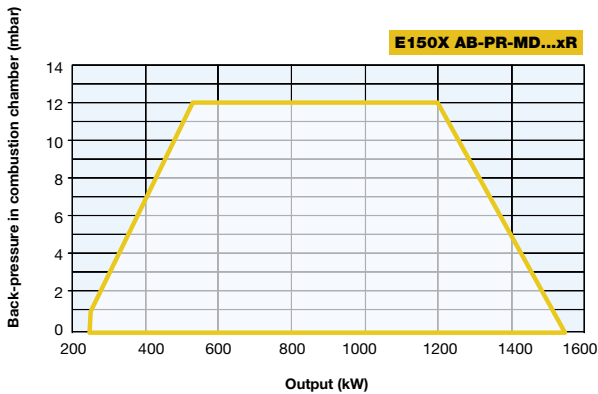
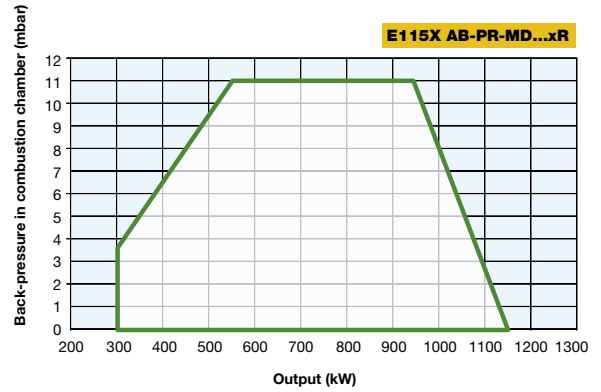
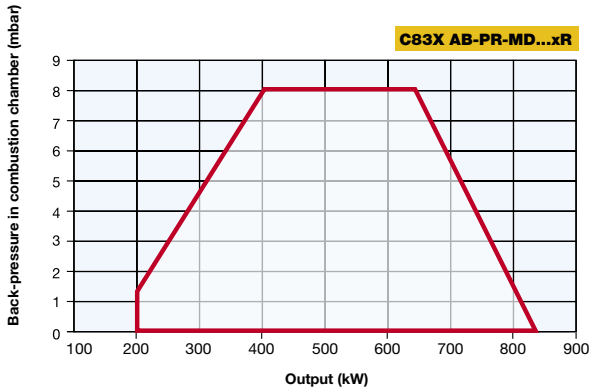
SR = Standard combustion head (BS)

LR = For long combustion head version (BL) increase the price (see price list)

(**) The burners are already MD version.

In order for the supply to be completed, the burner must be equipped with the respective modulating probe (see accessory table, page 174).

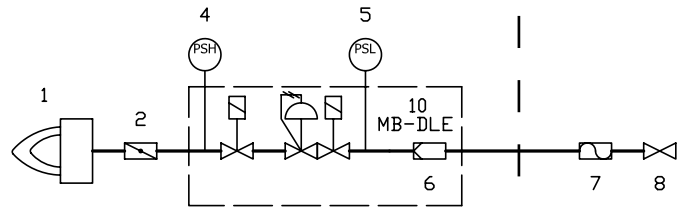
In compliance with GAR DIRECTIVE 2016/426/EU



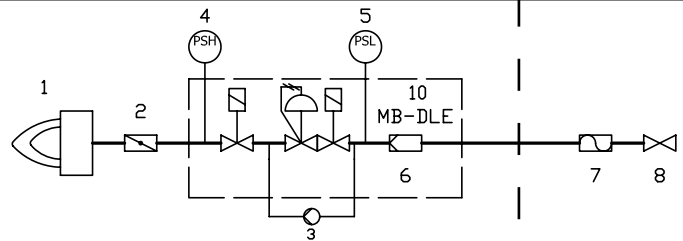
Attention: the graph shows the value of the gas output (kW) against the corresponding pressure without the combustion chamber back pressure. To know the minimum gas pressure at gas train, in order to get the gas output, it is necessary to add the boiler back pressure to the value read on the curve.

MANUFACTURER | INSTALLER

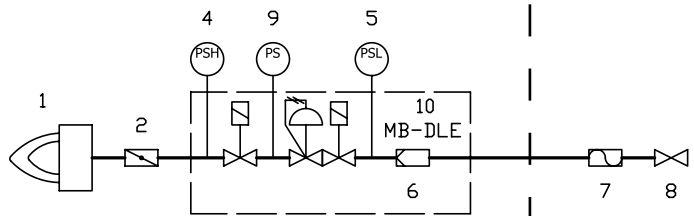
Gas train with valves group MB-DLE
(2 valves + gas filter + pressure governor).



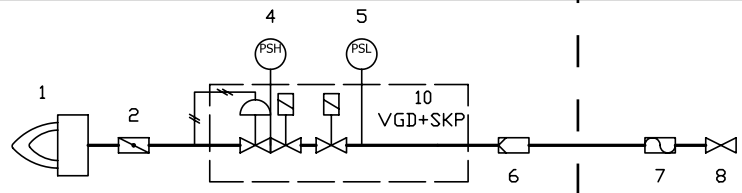
Gas train with valves group MB-DLE
(2 valves + gas filter + pressure governor) + leakage control VPS504.



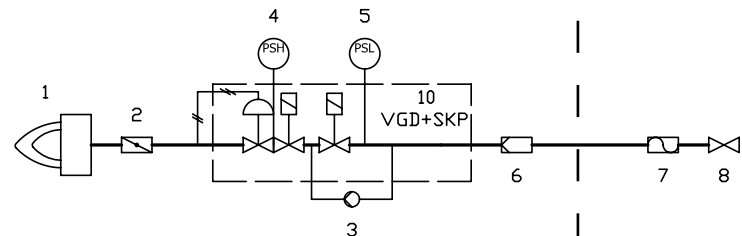
Gas train with valves group MB-DLE
(2 valves + gas filter + pressure governor) + leakage control pressure switch.



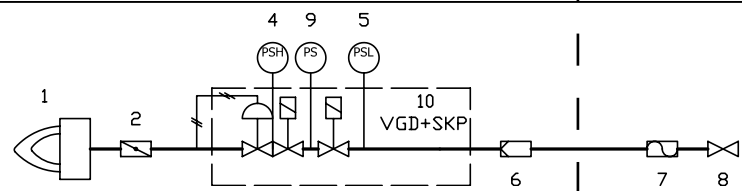
Gas train with valves group VGD
with built-in gas pressure governor.



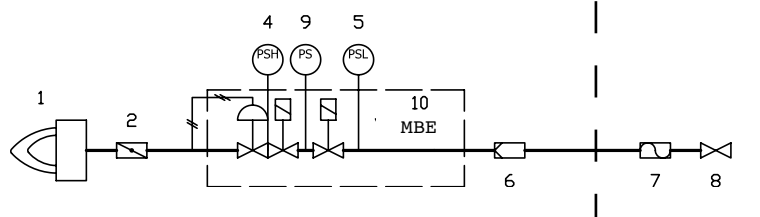
Gas train with valves group VGD
with built-in gas pressure governor + leakage control VPS504.



Gas train with valves group VGD
with built-in gas pressure governor + leakage control pressure switch



Gas train with valve group MBE,
c/w built-in pressure governor+ leakage control pressure switch+ max pressure switch.



KEY

- | | |
|---|--|
| 1 Burner | 6 Gas filter |
| 2 Butterfly valve | 7 Anti-vibrating joint |
| 3 Leakage control device (optional if output < 1200 kW) | 8 Manual cut off valve |
| 4 Maximum gas pressure switch (optional) | 9 Leakage control pressure switch (optional if output < 1200 kW) |
| 5 Minimum gas pressure switch | 10 Valves group |

OPTIONS GAS BURNERS



MANUAL CUT OFF VALVES, THREADED (ball valve)

Gas connections	Model	Code	Price €
1/2"	V15	2.81.00.01	
3/4"	V20	2.81.00.02	
1"	V25	2.81.00.03	
1 1/4"	V32	2.81.00.04	
1 1/2"	V40	2.81.00.05	
2"	V50	2.81.00.06	



MANUAL CUT OFF VALVES, FLANGED (ball valve)

Gas connections	Model	Code	Price €
DN65	V65	2.81.00.12	
DN80	V80	2.81.00.13	



ANTI VIBRATING JOINT (threaded)

Gas connections	Model	Code	Price €
1/2"	GA15	2.34.00.62	
3/4"	GA20	2.34.00.63	
1"	GA25	2.34.00.64	
1 1/4"	GA32	2.34.00.80	
1 1/2"	GA40	2.34.00.65	
2"	GA50	2.34.00.66	



ANTI VIBRATING JOINT (flanged)

Gas connections	Model	Code	Price €
DN65	GA65	2.34.00.81	
DN80	GA80	2.34.00.82	



GAS FILTERS (threaded)

Gas connections	Model	Code	Price €
1/2"	F15	2.09.01.01	
3/4"	F20	2.09.01.02	



GAS FILTERS (max inlet pressure 2 bar)

Gas connections	Model	Code	Price €
1"	F25	2.09.01.15	
1 1/2"	F40	2.09.01.05	
2"	F50	2.09.01.06	



GAS FILTERS (flanged: max inlet pressure 2 bar)

Gas connections	Model	Code	Price €
DN65	F65	2.09.01.17	
DN80	F80	2.09.01.18	



PRESSURE GOVERNORS WITH GAS FILTERS (threaded: Pe max 1 bar)

Gas connections	Model	Code	Price €
1/2"	S.P.15	2.80.00.85	
3/4"	S.P.20	2.80.00.94	
1"	S.P.25	2.80.00.72	
1"1/2	S.P.40	2.80.00.65	
2"	S.P.50	2.80.00.67	



PRESSURE GOVERNORS WITH GAS FILTERS (flanged: Pe max 1 bar)

Gas connections	Model	Code	Price €
DN65	S.P.65	2.80.00.69	
DN80	S.P.80	2.80.00.71	



LEAKAGE CONTROLS

Description	Code	Price €
DUNGS VPS 504 with plug	2.19.16.06	

LEAKAGE CONTROLS MOUNTING KITS (for groups with separate valves only)

Description	Code	Price €
DUNGS VPS 504	2.19.12.01	



MAXIMUM PRESSURE

Description	Code	Price €
Gas maximum pressure switch kit	2.19.12.41	



SUPPORT FOR PRESSURE GAUGE

Model	Code	Price €
Push botton valve	2810010	



MANOMETER

Model	Code	Price €
Glycerine gauge 0 ÷ 60 mbar	2520001	
Glycerine gauge 0 ÷ 400 mbar	2520028	
Glycerine gauge 0 ÷ 1 bar	2520030	

OPTIONS GAS BURNERS

GAS PRESSURE REDUCING STATIONS

Gas pressure reducing stations (available for inlet pressures up to 6 bar).

Tipo	Power (kW)	Capacity (Nm ³ /h)	Burners*	Max pressure (bar)	Price €
GRG2	200	21	NG200	6	
GRG6	550	60	NG550	6	
GRG17	1600	170	P71	6	

Gas pressure reducing station according to the below figure

The station includes all the components as shown in the picture (see scheme and legend)

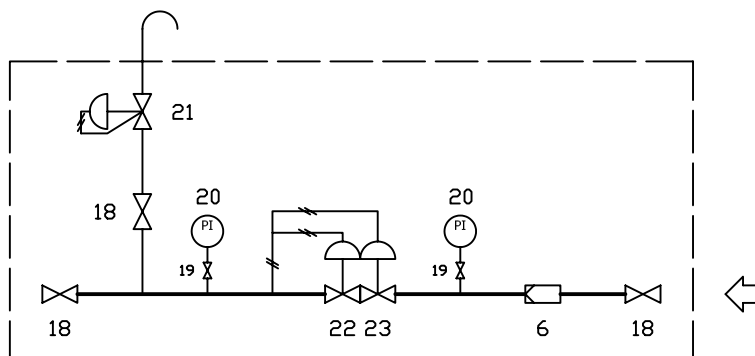
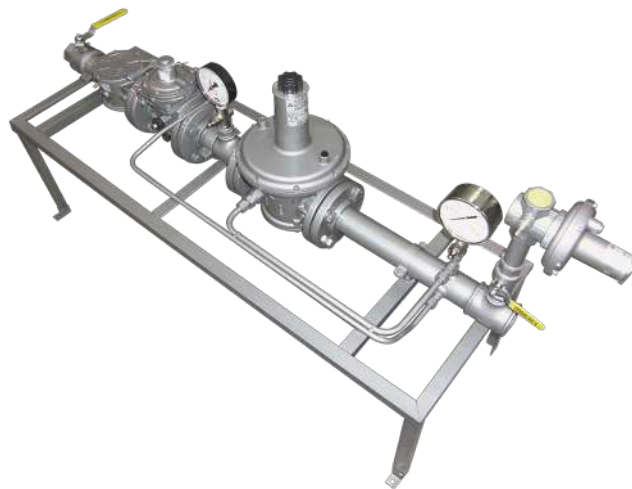
The station is pre-assembled on a frame

Packaging included

The stations are ready to work with natural gas, matching and sizes can vary according to the pressure and type of gas.

Max inlet pressure over 6 bar: price upon request

*The burner in an example of a typical installation, however the same station can supply different burners of smaller size.



KEY

6	Gas filter	21	Relief valve
18	Manual cut off (ball valve)	22	Reducer
19	Manual cut off for manometer	23	Safety block valve
20	Manometer		