

ORION KC

WALL-HUNG CONDENSING BOILER WITH INSTANTANEOUS PRODUCTION OF DHW
CAN BE MATCHED TO OUTDOOR INSTALLATION KIT



Available in the following models:



- ▶ Ambient temperature probe supplied as standard
- ▶ Modulation ratio: 1:9
- ▶ Condensation also in DHW operation thanks to the thermally insulated 26-plate DHW heat exchanger
- ▶ Management of one heating zone with ambient temperature probe and two zones with zone kit
- ▶ Double filling system: automatic and manual
- ▶ High domestic hot water production, more power during DHW operation (18 - 28 - 30 - 35 kW)
- ▶ High-efficiency modulating circulation pump with built-in air purging device
- ▶ Controls to manage two different types of solar thermal systems fitted as standard
- ▶ Thermosetting polymer-covered stainless steel heat exchanger
- ▶ Heating expansion vessel - 10 litres
- ▶ Thermoregulation with external probe (optional)
- ▶ Sanitary comfort function: ★★★
- ▶ Automatic by-pass



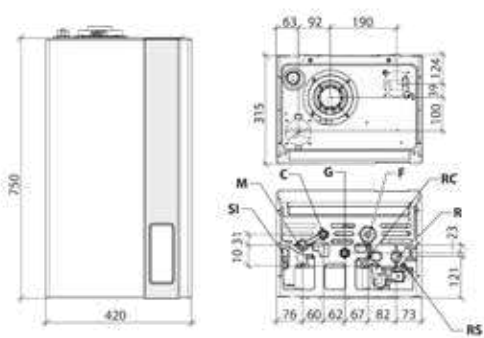
TOUCH SCREEN INTERFACE

- ▶ Modulation thermostat with ambient probe
- ▶ Day/night temperature level selection
- ▶ Weekly programming
- ▶ Timer and ambient temperature setting
- ▶ DHW "comfort" function enabling: ★★★

The TOUCH SCREEN interface of ORION KC combined with the ambient temperature probe supplied is a class V temperature control system.

Model	Gas type	Code	Heat input		W x H x D mm	Gross weight kg
			Nominal (Qn) kW	Nominal DHW kW		
KC 12	NATURAL GAS	COTXX2KC12	12,0	18,0	420x750x315	35,5
	PROPANE	COTXX6KC12				
KC 24	NATURAL GAS	COTXX2KC24	23,7	27,3	420x750x315	38,0
	PROPANE	COTXX6KC24				
KC 28	NATURAL GAS	COTXX2KC28	26,4	30,4	420x750x315	39,0
	PROPANE	COTXX6KC28				
KC 32	NATURAL GAS	COTXX2KC32	30,4	34,5	420x750x315	40,5
	PROPANE	COTXX6KC32				

DIMENSIONS AND CONNECTION CENTRE DISTANCES



SI Condensate drain
M CH system flow (3/4")
C DHW outlet (1 1/2")
G Gas inlet (1/2")

F Cold water inlet (1/2")
RC Filler tap
R CH system return (3/4")
RS Discharge tap

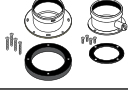




Technical data	um	KC 12	KC 24	KC 28	KC 32
Nominal heat input (Qn)	kW	12,0	23,7	26,4	30,4
Nominal heat output (80-60°C) (Pn)	kW	11,7	23,0	25,5	29,4
Heat output (50-30°C)	kW	12,6	25,0	28,0	32,3
Reduced heat input (Qr)	kW	2,0	3,0	3,3	4,2
Useful efficiency at nominal input (80-60°C)	%	97,1	96,8	96,7	96,8
Useful efficiency at nominal input (50-30°C)	%	105,1	105,6	106,0	106,2
Useful efficiency at 30% (30°C return)	%	106,0	107,4	107,4	108,3
Heating expansion vessel capacity	l	10	10	10	10
DHW nominal heat input	kW	18,0	27,3	30,4	34,5
Specific DHW flow ΔT=30K	l/min	8,8	13,4	15,5	16,2
NOx emission class	-	6	6	6	6
Electric protection rating	IP	IPX5D	IPX5D	IPX5D	IPX5D

(**) with comfort function disabled.

For other technical specifications, see from page 36 - Maximum length of flue gas venting, see page 120

Item	Description	Code
	Coaxial kit Ø 60/100 length 75cm	0CONDASP00
	Remote control, ErP V class (118x85x32 mm)	0CREMOTO04
	Coaxial fitting kit Ø60/100	0KITATCO00
	Splitter kit Ø80+80	0KITSDOP08
	Electrical kit for zone management with external probe	0KITZONE05

Item	Description	Code
	External probe (60x45x31 mm)	0SONDAES01
	Kit for connection to solar plant	0KITSOLC07
	Tap kit with filter KC-KRB-CT-RBT	0KITRUBI05
	Magnetic dirt separator filter	0AFILDEF00

For other accessories, see from page 119

ORION KR

WALL-HUNG CONDENSING BOILER CH ONLY

CONNECTION TO AN EXTERNAL HOT WATER STORAGE TANK (OPTIONAL) WITH EXTERNAL 3-WAY VALVE (OPTIONAL)



- ▶ **Modulation ratio: 1:9**
- ▶ **Multifunction relay for connection to systems with zone valves or to solar plant or to remote alarm signal**
- ▶ **Management of one heating zone with ambient temperature probe and two zones with zone kit**
- ▶ **Standard management of one type of solar thermal system**
- ▶ **External hot water storage tank heating setting (optional)**
- ▶ **High-efficiency modulating circulation pump with built-in air purging device**
- ▶ Thermosetting polymer-covered stainless steel heat exchanger
- ▶ Heating expansion vessel - 10 litres
- ▶ Thermoregulation with external probe (optional)
- ▶ Automatic by-pass

Available in the following models:



TOUCH SCREEN INTERFACE

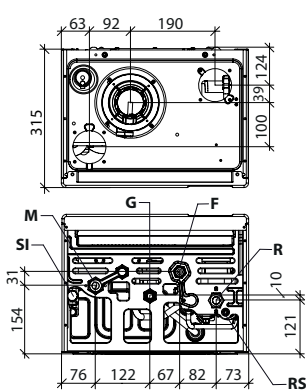
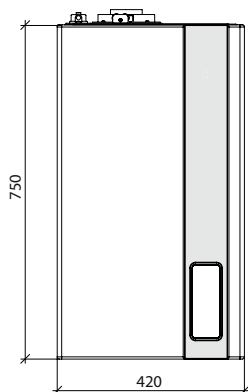
- ▶ Modulation thermostat with ambient probe
- ▶ Day/night temperature level selection
- ▶ Weekly programming
- ▶ Timer and ambient temperature setting
- ▶ Heater DHW "comfort" function enabling

The TOUCH SCREEN interface of ORION KR combined with the ambient temperature probe supplied is a class V temperature control system.

Model	Gas type	Code	Heat input		W x H x D	Gross weight
			Nominal (Qn) kW	Nominal DHW kW	mm	kg
KR 12	NATURAL GAS	COTXX2KR12	12,0	18,0 (*)	420x750x315	34,0
	PROPANE	COTXX6KR12				
KR 24	NATURAL GAS	COTXX2KR24	23,7	27,3 (*)	420x750x315	35,5
	PROPANE	COTXX6KR24				
KR 28	NATURAL GAS	COTXX2KR28	26,4	30,4 (*)	420x750x315	37,0
	PROPANE	COTXX6KR28				
KR 32	NATURAL GAS	COTXX2KR32	30,4	34,5 (*)	420x750x315	38,5
	PROPANE	COTXX6KR32				

(*) with optional hot water storage tank.

DIMENSIONS AND CONNECTION CENTRE DISTANCES



SI Condensate drain
M CH system flow (3/4")
G Gas inlet (1/2")

F Cold water inlet (1/2")
R CH system return (3/4")
RS Discharge tap



Technical data	um	KR 12	KR 24	KR 28	KR 32
Nominal heat input (Qn)	kW	12,0	23,7	26,4	30,4
Nominal heat output (80-60°C) (Pn)	kW	11,7	23,0	25,5	29,4
Heat output (50-30°C)	kW	12,6	25,0	28,0	32,3
Reduced heat input (Qr)	kW	2,0	3,0	3,3	4,2
Useful efficiency at nominal input (80-60°C)	%	97,1	96,8	96,7	96,8
Useful efficiency at nominal input (50-30°C)	%	105,1	105,6	106,0	106,2
Useful efficiency at 30% (30°C return)	%	106,0	107,4	107,4	108,3
Heating expansion vessel capacity	l	10	10	10	10
DHW nominal heat input	kW	18,0 (*)	27,3 (*)	30,4 (*)	34,5 (*)
NOx emission class	-	6	6	6	6
Electric protection rating	IP	IPX5D	IPX5D	IPX5D	IPX5D

(*) with optional hot water storage tank.

For other technical specifications, see from page 37 - Maximum length of flue gas venting, see page 120

Item	Description	Code
	Coaxial kit Ø 60/100 length 75cm	0CONDASP00
	Remote control, ErP V class (118x85x32 mm)	0CREMOTO04
	Coaxial fitting kit Ø60/100	0KITATCO00
	Splitter kit Ø80+80	0KITSDOP08
	hot water storage tank temperature probe 3m	0KITSOND00
	Electrical kit for zone management with external probe	0KITZONE05
	External probe (60x45x31 mm)	0SONDAES01
	Tap kit with filter KR-KB-RT	0KITRUBI04

Item	Description	Code
	Magnetic dirt separator filter	0AFILDEF00
	Coax. adapter kit D.60/100 to D.80/125	0KITADCO00

For other accessories, see from page 119

Accessories supplied as standard

Item	Description
	Ambient temperature probe

ORION KRB

WALL-HUNG CONDENSING BOILER, CH ONLY, WITH INTEGRATED 3-WAY VALVE
CONNECTION TO AN EXTERNAL HOT WATER STORAGE TANK (OPTIONAL)



Available in the following models:



- ▶ **Modulation ratio: 1:9**
- ▶ **Multifunction relay for connection to systems with zone valves or to solar plant or to remote alarm signal**
- ▶ **Management of one heating zone with ambient temperature probe and two zones with zone kit**
- ▶ **Standard management of one type of solar thermal system**
- ▶ **Integrated 3-way deviating valve**
- ▶ **High-efficiency modulating circulation pump with built-in air purging device**
- ▶ Thermosetting polymer-covered stainless steel heat exchanger
- ▶ Thermoregulation with external probe (optional)
- ▶ Heating expansion vessel - 10 litres
- ▶ Anti-legionella function for hot water storage tank
- ▶ Automatic by-pass
- ▶ External hot water storage tank heating setting (optional)



TOUCH SCREEN INTERFACE

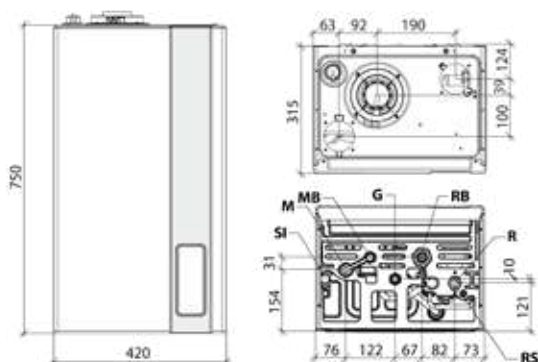
- ▶ Modulation thermostat with ambient probe
- ▶ Day/night temperature level selection
- ▶ Weekly programming
- ▶ Timer and ambient temperature setting
- ▶ Heater DHW "comfort" function enabling

The TOUCH SCREEN interface of ORION KRB combined with the ambient temperature probe supplied is a class V temperature control system.

Model	Gas type	Code	Heat input		W x H x D	Gross weight
			Nominal (Qn) kW	Nominal DHW kW	mm	kg
KRB 12	NATURAL GAS	COTXX2KU12	12,0	18,0 (*)	420x750x315	36,5
	PROPANE	COTXX6KU12				
KRB 24	NATURAL GAS	COTXX2KU24	23,7	27,3 (*)	420x750x315	37,0
	PROPANE	COTXX6KU24				
KRB 28	NATURAL GAS	COTXX2KU28	26,4	30,4 (*)	420x750x315	38,5
	PROPANE	COTXX6KU28				
KRB 32	NATURAL GAS	COTXX2KU32	30,4	34,5 (*)	420x750x315	40,0
	PROPANE	COTXX6KU32				

(*) with optional hot water storage tank.

DIMENSIONS AND CONNECTION CENTRE DISTANCES



- SI** Condensate drain
- M** CH system flow (3/4")
- MB** Flow for hot water storage tank (1/2")
- G** Gas inlet (1/2")

- RB** Return from hot water storage tank (1/2")
- R** CH system return (3/4")
- RS** Discharge tap



Technical data	um	KRB 12	KRB 24	KRB 28	KRB 32
Nominal heat input (Q _n)	kW	12,0	23,7	26,4	30,4
Nominal heat output (80-60°C) (P _n)	kW	11,7	23,0	25,5	29,4
Heat output (50-30°C)	kW	12,6	25,0	28,0	32,3
Reduced heat input (Q _r)	kW	2,0	3,0	3,3	4,2
Useful efficiency at nominal input (80-60°C)	%	97,1	96,8	96,7	96,8
Useful efficiency at nominal input (50-30°C)	%	105,1	105,6	106,0	106,2
Useful efficiency at 30% (30°C return)	%	106,0	107,4	107,4	108,3
Heating expansion vessel capacity	l	10	10	10	10
DHW nominal heat input	kW	18,0 (*)	27,3 (*)	30,4 (*)	34,5 (*)
NOx emission class	-	6	6	6	6
Electric protection rating	IP	IPX5D	IPX5D	IPX5D	IPX5D

(*) with optional hot water storage tank.

For other technical specifications, see from page 38 - Maximum length of flue gas venting, see page 120

Item	Description	Code	Item	Description	Code
	Coaxial kit Ø 60/100 length 75cm	0CONDASP00		Electrical kit for zone management with external probe	0KITZONE05
	Remote control, ErP V class (118x85x32 mm)	0CREMOTO04		External probe (60x45x31 mm)	0SONDAES01
	Coaxial fitting kit Ø60/100	0KITATCO00		Tap kit with filter KC-KRB-CT-RBT	0KITRUBI05
	Splitter kit Ø80+80	0KITSDOP08		Coax. adapter kit D.60/100 to D.80/125	0KITADCO00

For other accessories, see from page 119

ORION KB

WALL-HUNG CONDENSING BOILER WITH AN INTEGRATED WATER TANK FOR THE PRODUCTION OF DHW



- ▶ **Modulation ratio: 1:9**
- ▶ **Thermally-insulated 45-litre stainless steel hot water storage tank**
- ▶ **hot water storage tank heating setting**
- ▶ **Management of one heating zone with ambient temperature probe and two zones with zone kit**
- ▶ **Multifunction relay for connection to systems with zone valves or to solar plant or to remote alarm signal**
- ▶ **Heating expansion vessel - 10 litres**
 -) Thermosetting polymer-covered stainless steel heat exchanger
 -) Thermoregulation with external probe (optional)
 -) Anti-legionella function for hot water storage tank
 -) Prearranged for connection to a recirculation system
 -) 3-speed circulation pump with built-in air purging device
 -) Automatic by-pass

Available in the following models:



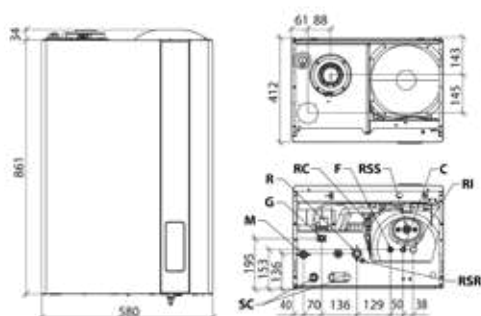
TOUCH SCREEN INTERFACE

- ▶ *Modulation thermostat with ambient probe*
- ▶ *Day/night temperature level selection*
- ▶ *Weekly programming*
- ▶ *Timer and ambient temperature setting*
- ▶ *Heater DHW "comfort" function enabling*

The TOUCH SCREEN interface ORION KB combined with the ambient temperature probe supplied is a class V adjustment system.

Model	Gas type	Code	Heat input		W x H x D	Gross weight
			Nominal (Qn) kW	Nominal DHW kW	mm	kg
KB 24	NATURAL GAS	COTXX2KB24	23,7	27,3	580x861x412	74,0
	PROPANE	COTXX6KB24				
KB 32	NATURAL GAS	COTXX2KB32	30,4	34,5	580x861x412	79,0
	PROPANE	COTXX6KB32				

DIMENSIONS AND CONNECTION CENTRE DISTANCES



- M** CH system flow (3/4")
- G** Gas inlet (1/2")
- R** CH system return (3/4")
- RC** Filler tap
- F** Cold water inlet (1/2")

- RSS** DHW drain cock
- C** DHW outlet (1 1/2")
- RI** Recirculation inlet (1/2")
- RSR** CH discharge tap
- SC** Condensate drain and safety valves





COMFORT



MADE IN ITALY



1:9



Technical data	um	KB 24	KB 32
Nominal heat input (Q _n)	kW	23,7	30,4
Nominal heat output (80-60°C) (P _n)	kW	23,0	29,4
Heat output (50-30°C)	kW	25,0	32,3
Reduced heat input (Q _r)	kW	3,0	4,2
Useful efficiency at nominal input (80-60°C)	%	96,8	96,2
Useful efficiency at nominal input (50-30°C)	%	105,6	106,2
Useful efficiency at 30% (30°C return)	%	107,4	108,3
Heating expansion vessel capacity	l	10	10
DHW nominal heat input	kW	27,3	34,5
Specific DHW flow ΔT=30K	l/min	16,2	19,5
NOx emission class	-	6	6
Electric protection rating	IP	IPX4D	IPX4D

For other technical specifications, see from page 39 - Maximum length of flue gas venting, see page 120

Item	Description	Code
	Coaxial kit Ø 60/100 length 75cm	0CONDASP00
	Remote control, ErP V class (118x85x32 mm)	0CREMOTO04
	Splitter kit Ø80+80	0KITSDOP08
	Electrical kit for zone management with external probe	0KITZONE05

Item	Description	Code
	External probe (60x45x31 mm)	0SONDAES01
	Recirculation kit	0KRICIRC02
	Tap kit with filter KR-KB-RT	0KITRUBI04
	Magnetic dirt separator filter	0AFILDEF00

For other accessories, see from page 119