
wood logs
up to 0,5m long


wood briquettes


charcoal


wood pellets

with additional equipment

oil/gas

with additional equipment

EKO-CK P

The **EKO-CK P** steel hot water boilers (with nominal heat output 14 - 110 kW) are engineered for solid fuel, wood pellet, oil or gas firing to meet heating demands from the smallest to the largest premises, as a main or as an alternative heat source. This product can be easily recognized by its modern design, by its synthesis of modern technologies and its quality of material, as well as through its simple and easy assembly and its straightforward operation and control. The application of well developed and thoroughly tested technical solutions makes these boilers safe and reliable. A particular feature of these boilers is the ease of integration of any suitable burner and boiler controls. Boilers are manufactured to the EN 303-5 standard.

CHARACTERISTICS OF EKO-CK P BOILERS:

- **Hot water boiler for central heating systems is produced for solid fuel, pellets, oil or gas firing (nominal heat output 14 - 110 kW).**
- **A carefully sized combustion chamber with triple pass flue gas flow assure boiler operation at high efficiency. This makes the boilers very economical to use.**
- **The combustion chamber is made out of high quality 5 mm thick steel sheet.**
- **The large door and combustion chamber enable firing with big pieces of wood, as well as easy cleaning and maintenance. The direction the upper and lower doors swing is easily reversed.**
- **If required a thermal safety system can be built in through already prepared apertures.**
- **A thermostat for pump control is built in.**
- **The body of the boiler is delivered separately from the casing and the thermal insulation which enables easier transportation and assembly with reduced risk of damage.**
- **The basic standard boiler is delivered with a boiler water temperature gauge as well as a cleaning set with an ashtray.**
- **In the Cm Pelet-set of the boiler fired with wood pellets, there is a set for installation of a pellet burner on the lower boiler door, turbulators, a pellet burner, pellet container, pellet feeder and boiler regulation.**
- **If it is fired with oil or gas, a set for installation of an oil/gas burner and turbulators (their number depends on the power of the boiler) are required.**
- **The basic boiler regulator control unit of the burner (for oil/gas firing) is delivered separately. It can be connected via the upper casing lid of the boiler.**
- **The boiler is tested and certified to the European standard EN 303-5 and EN 304 and manufactured in accordance with ISO 9001 and ISO 14001 standard.**


Thermometer, Opening for draught regulator


The direction the lower door swing is easily reversed to the left or right.

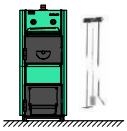

Heat pump thermostat connector and connection for installation of thermal protection.


Set for cleaning

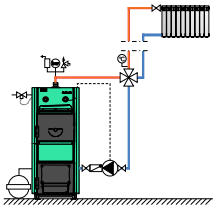

Boiler delivery

EKO-CK P 14-110 kW

DELIVERY AND OBLIGATORY ADDITIONAL EQUIPMENT:



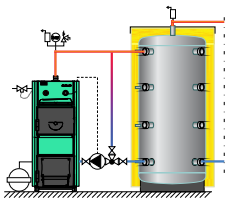
Delivery:
- Boiler body with the boiler door;
- Outer casing with thermal insulation and the heat pump thermostat, set (screws, dowels, plug, rosettes), cleaning accessories (scraper, poker, brush, accessories holder).



Solid fuel firing, without CAS accumulation tank:
- draught regulator, manual 4-way mixing valve;

Closed heating system
- thermal safety valve, heat exchanger, safety-air vent group (2.5 bar) and expansion vessel;

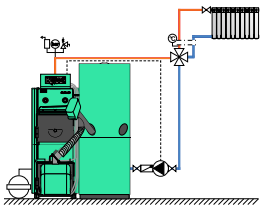
Open heating system
- open expansion vessel



Solid fuel firing, with CAS accumulation tank:
- draught regulator, CAS accumulation tank (min. 30 l/kW), 3-way thermostatic valve LTC, VTC, 3-way mixing valve with CRA111 motor actuator ... (60°C);

Closed heating system
- thermal safety valve, heat exchanger, safety-air vent group (2,5 bar) and expansion vessel;

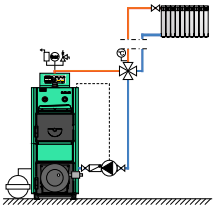
Open heating system
- open expansion vessel



Wood pellet firing:
- Cm Pelet-set;
- manual 4-way mixing valve or CAS accumulation tank (min. 10 l/kW) and LTC, VTC. (60°C);

Closed heating system
- safety-air vent group and expansion vessel;

Open heating system
- open expansion vessel



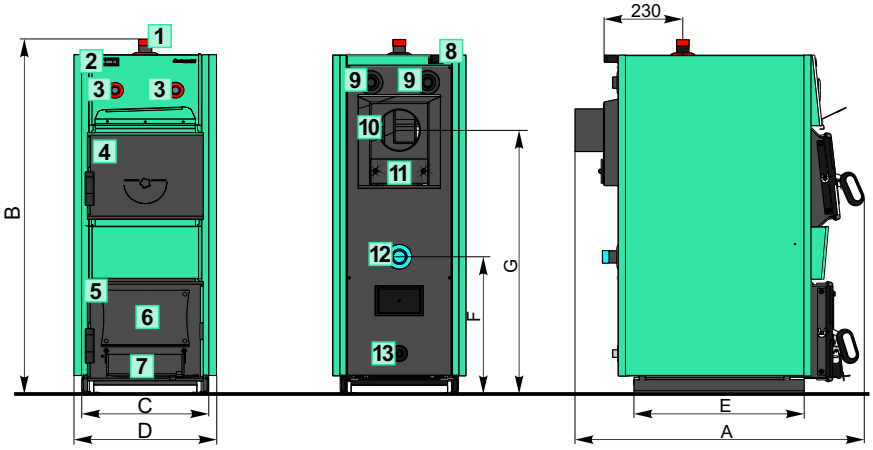
Oil/gas firing:
- boiler regulation EKO/CK/CKB;
- set for installation of the oil/gas burner with turbulators
- oil/gas burner;
- manual 4-way mixing valve

Closed heating system
- safety-air vent group and expansion vessel;

Open heating system
- open expansion vessel

BASIC DIMENSIONS:

1 - Boiler water inlet
2 - Thermometer
3 - Openings for draught reg.
4 - Upper boiler door
5 - Lower boiler door
6 - Opening for installation of the pellet/oil/gas burner
7 - Primary air door
8 - Pump thermostat connection
9 - Opening for thermal safety valves (1" inner thread)
10 - Boiler flue gas exhaust
11 - Opening for cleaning the smoke box
12 - Boiler water outlet
13 - Filling / draining



		14	20	25	30	35	40	50	60	70	90	110
Heat output range	(kW)	14	15-20	20-25	25-30	30-35	35-40	40-50	50-60	50-70	70-90	90-110
Boiler water content	(l)	59	60	64	67	76	78	96	118	135	140	157
Boiler mass	(kg)	220	227	234	255	266	293	337	355	429	455	492
Diamet.*/height(G)of uptake tube	f(mm)	150/930	150/930	150/930	160/930	160/930	180/930	180/930	180/1025	200/1085	200/1085	200/1085
Opening for the burner (hxw)	(mm)	170x165	170x165	170x165	170x165	170x165	210x165	210x165	210x165	210x165	210x165	210x165
Upper door opening (hxw)	(mm)	321x273	321x273	321x273	371x273	421x273	471x273	471x273	471x273	471/275	521/275	521/275
Lower door opening (hxw)	(mm)	321x322	321x322	321x322	371x322	421x322	471x322	471x322	471x322	471/422	521/422	521/422
Chimney draught	(Pa)	15	16	18	19	20	21	23	25	26	29	31
Boiler water Inlet/Outlet	(R)	5/4"	5/4"	5/4"	5/4"	5/4"	5/4"	5/4"	5/4"	6/4"	2"	2"
Filling/Draining	(R)	1/2"	1/2"	1/2"	1/2"	1/2"	1/2"	1/2"	1/2"	1"	1"	1"
Flue gas temp. (o / g)	(°C)	170	170	170	170	170	170	180	180	190	200	200
Flue gas temp. (wood)	(°C)	190	190	190	190	190	190	220	220	230	240	240
Max. operat. temperature	(°C)	90	90	90	90	90	90	90	90	90	90	90
Max. operat. pressure	(bar)	2,5	2,5	2,5	2,5	2,5	2,5	2,5	2,5	2,5	2,5	2,5
Depth boiler A	(mm)	985	985	1020	1020	1020	1020	1142	1142	1250	1250	1350
Height of the boiler B	(mm)	1255	1255	1255	1255	1255	1255	1255	1355	1430	1430	1430
Width of the body C	(mm)	420	420	420	470	520	570	570	570	570	620	620
Total width of the boiler D	(mm)	470	470	470	520	570	620	620	620	640	690	690
Depth of boiler base E	(mm)	565	565	600	600	600	600	725	725	815	815	915
Height of return line F	(mm)	485	485	485	485	485	485	485	485	630	630	630
Max. length wood piece	(mm)	500	500	500	500	500	500	500	500	500	500	500

*- the chimney inner diameter has to be determined according to the boiler rated thermal output and the height of the chimney and almost always it has to be bigger than the diameter of the flue gas exhaust.