

## WOOD FIRING BOILER (WOOD GASIFICATION)



wood logs



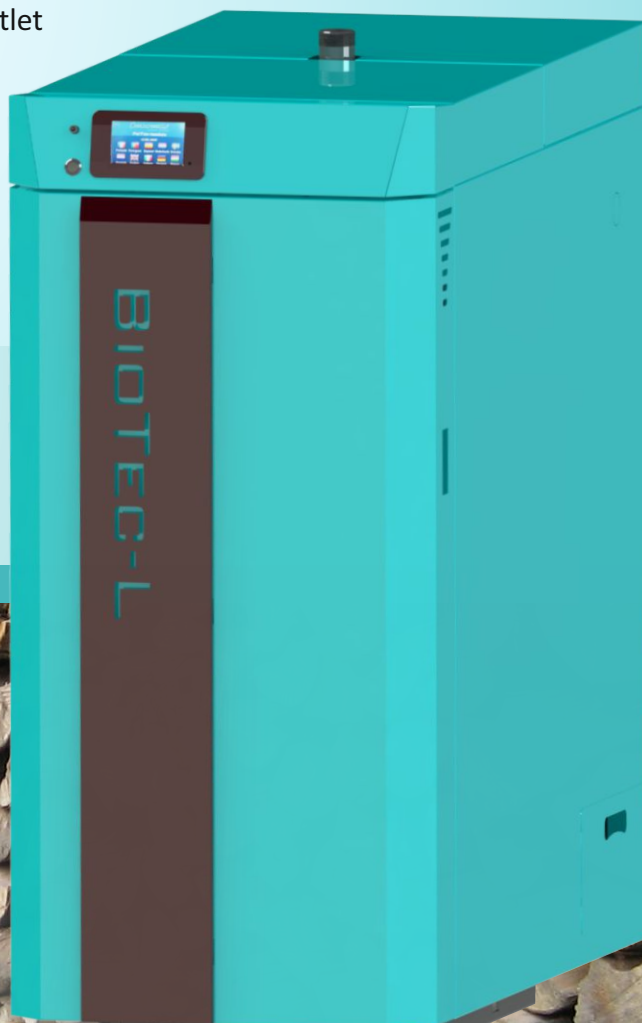
wood briquettes

# BioTec-L

25, 34 i 45 kW



**BioTec-L** steel hot water boilers (with nominal heat output of 25 to 45 kW) are designed for wood log fuel firing for the heating of small and middle sized premises. The **wood gasification** principle enables a complete fuel burning. Logs up to 550 mm long can be inserted into the large combustion chamber. The burning period for a single fill of logs is at least 4 hours at the rated output and can be extended to a whole day if the need for heating is less. The boiler can keep the glow even 12 hours, which means that in this period it is not necessary to fire up the boiler in order to keep the heating process. Boiler operation is managed with inbuilt boiler control unit using the lambda probe, using actuators for management primary and secondary air intake and changing the rpm's of underpressure fan on flue gases outlet from boiler. Boiler is connected to the central heating system through a 3-way thermostat valve accumulation (buffer) tank (like CAS, CAS B, CAS S, CAS BS). The boiler is tested and certified according to the European standard EN 303-5:2012 and meets class 5. It is manufactured in compliance with ISO 9001/2008 and ISO 14001/2004 standard.



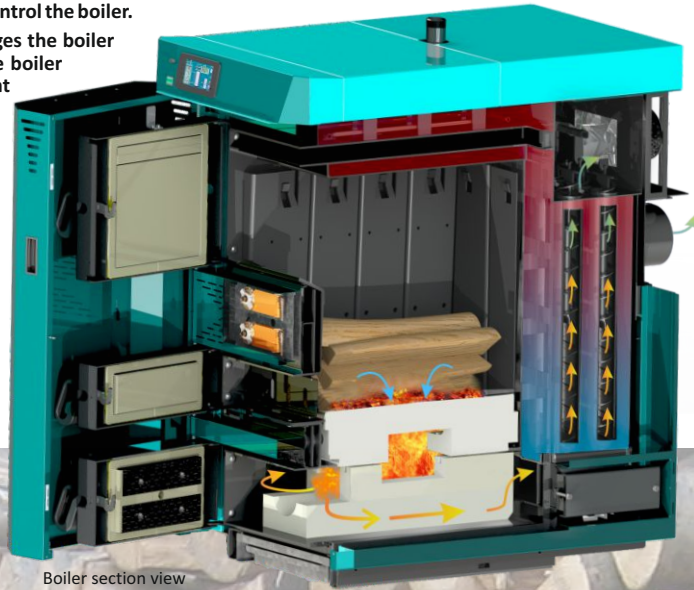
## CHARACTERISTICS OF THE BioTec-L BOILER:



- Boiler Class 5.
- Hot water boiler for central heating systems is engineered for wood log firing of the moisture content under 25% (min 1 year long air dried wood).
- The wood gasification principle enables total burning of the fuel, reducing the cleaning of the boiler to minimum (depends on wood quality and nominal boiler load).
- The design and construction, including the wood gasification principle of complete burning assures high efficiency and makes the boiler extremely economical.
- It is environmentally friendly because of extremely low concentration of harmful components in flue gases.
- Three large doors and the combustion chamber enable loading with large logs as well as very simple cleaning and maintenance.
- It is engineered for installation in open or closed central heating systems only through accumulation tanks (CAS), volume min. 50l/kW and a 3-way thermal valve at 60°C.
- It is delivered pre-wired with the built-in boiler control unit to control the boiler.
- The built-in boiler control with the colour touch screen manages the boiler operation using the lambda probe, temperature sensor in the boiler combustion chamber, boiler sensor, motor for the management of primary and secondary air intake and changing the rpms of underpressure fan on the flue gases outlet from the boiler.
- Possible upgrade of the GSM alarm and the module for steering up to max.8 heating circuits via mixing valves to the outside or room temperature (additional equipment).
- The boiler is tested and certified according to EN 303-5: 2012 and meets Class 5. It is manufactured in accordance with ISO 9001 and ISO 14001 standard.

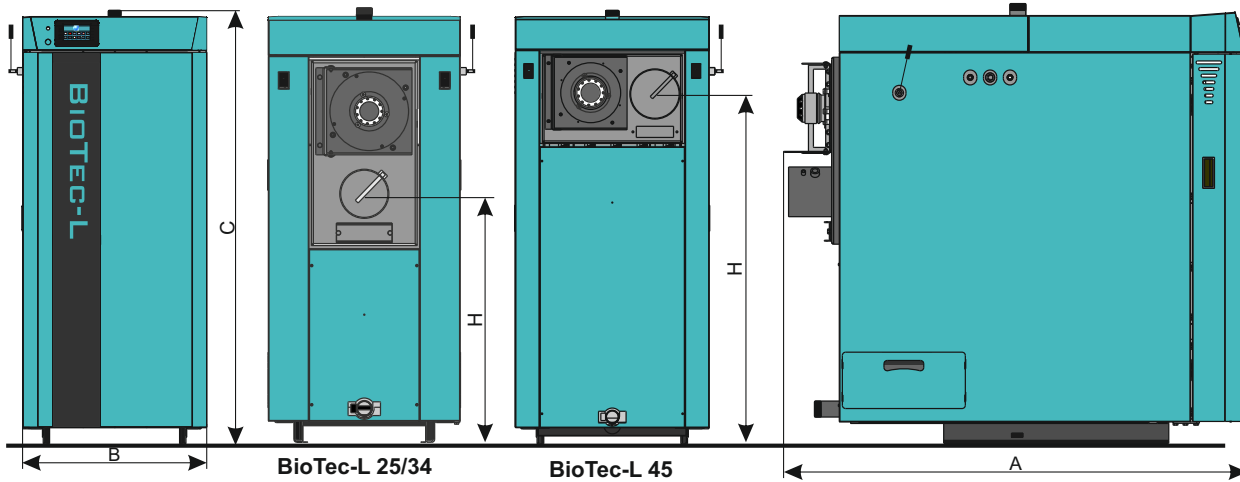


Multifunctional control with touch screen



Boiler section view

## BOILER DIMENSIONS



BioTec-L		25	34	45
Nominal heat output	(kW)	25	34	45
Chimney diameter*/ height H	Ø(mm)	150/775	160/800	180/1270
Boiler water inlet	(R)	6/4"	6/4"	6/4"
Boiler water outlet	(R)	6/4"	6/4"	6/4"
Filling / Draining	(R)	3/4"	3/4"	3/4"
Flue gas temperature	(°C)	130	130	130
Max. operating temperature	(°C)	90	90	90
Max. operating pressure	(bar)	2,5	2,5	2,5
Total boiler depth (A)	(mm)	1400	1370	1385
Total boiler height (C)	(mm)	1330	1370	1565
Total boiler width (B)	(mm)	585	700	700
Max. wood piece length	(mm)	450-550	450-550	450-550
Wood storage	(lit.)	90	144	176
Boiler water content	(lit.)	115	130	150
Boiler mass	(kg)	519	606	677
Energy efficiency class		A <sup>+</sup>	A <sup>+</sup>	A <sup>+</sup>

\* chimney inside diameter has to be determined according to the boiler nominal heat output and the height of the chimney and almost always it has to be bigger then the flue gas exhaust tube diameter.

HEATING TECHNIQUE

Centrometal

Centrometal d.o.o. shall not be responsible for possible incorrect data caused by printing errors or error made in transcription and all figures and diagrams are for explanatory purposes only and relevant adjustment have to be made at the spot. In any case, it reserves the right to modify its products as deemed to be required and useful without any prior notification.

Centrometal d.o.o. - 40306 Macinec - Glavna 12 - Croatia - tel:+385 (0)40 372 600 - fax:+385 (0)40 372 611  
Branch office - 10000 Zagreb - Babonićeva 53 - Croatia - tel:+385 (0)1 46 33 762 - fax:+385 (0)1 46 33 763

<http://www.centrometal.hr>

e-mail: [komercijala@centrometal.hr](mailto:komercijala@centrometal.hr)

P\_BTL-08/2017-ENG