

External electrostatic precipitator ETA EEP for ETA HACK and PE-K

ETA^η
... my heating system



**Reduce emissions -
even when using fuels of variable quality**



A passion for perfection.
www.eta.co.at

External electrostatic precipitator ETA EEP for ETA HACK and PE-K



Reduce emissions - even when using fuels of variable quality

What type of wood is processed into wood chips? How high is the water content? How much bark was included in processing? – Depending on the quality of the wood chips, the flue gas contains varying concentrations of dust particles. Complying with mandated emission values is not always easy.

Up to 85% less dust in flue gases

The ETA precipitator guarantees worry-free operation in this regard. It filters 80 to 85% of dust particles out of flue gases. It fits perfectly into an ETA system, runs via the ETA Touch control and is practically maintenance-free. The precipitator features automatic cleaning at regular intervals: The dust particles separated from flue gases are transported automatically via a screw into external ash bins.

Clever use of a natural phenomenon

Why does dust keep building up on the computer screen? It's because the dust particles are electrostatically charged and are attracted by the screen. – ETA makes use of this effect in its precipitator. With the aid of an electrode in the flue gas duct the particles which are swirling in the flue gas are energised and ionised. This means they are deposited on the internal wall of the separator and can no longer escape from the chimney with the flue gases.



Advantages at a glance:

- ▶ **80 to 85% less dust** in flue gases, ensuring your boiler is **future-proof**, even if emission regulations become more stringent
- ▶ **communicates via the ETA Touch control system with the boiler** and fits perfectly into the overall ETA system
- ▶ **a standardised draught fan** for boilers and precipitators: **saves power and money**
- ▶ **requires little space**
- ▶ **fully automatic mechanical cleaning** of the precipitator
- ▶ **fully automatic transport of particles** into an external ash bin via a screw
- ▶ **only one contact person** for planning an ETA boiler with precipitator
- ▶ **easy to transport** lifting handles can be temporarily attached
- ▶ **approved by BAFA in Germany**

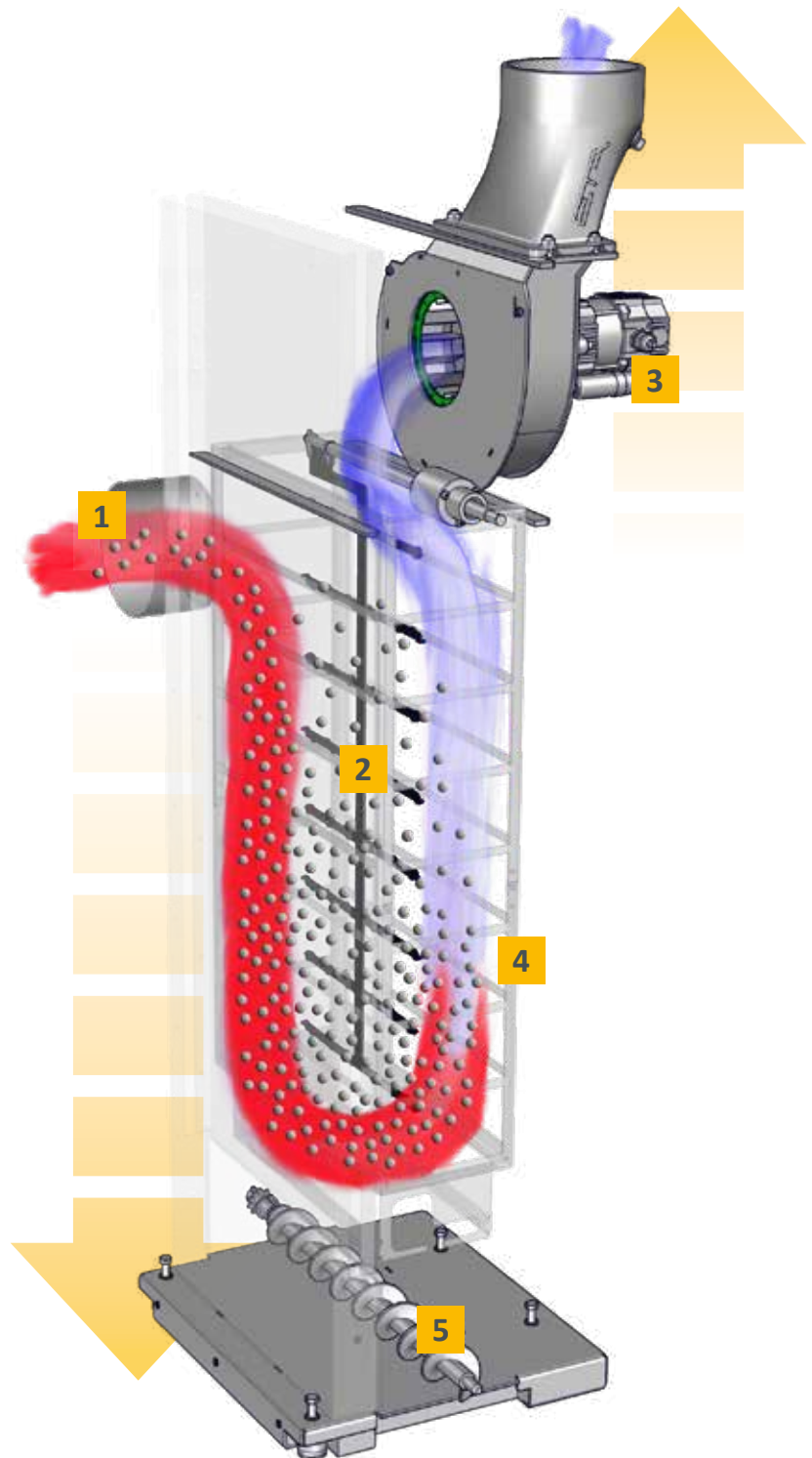
Ideal solution for the future

- 1 Flue gas inlet:** The boiler flue gases are drawn by the underpressure in the external precipitator. The supplied cable line fits perfectly with your ETA boiler and thus simplifies assembly.

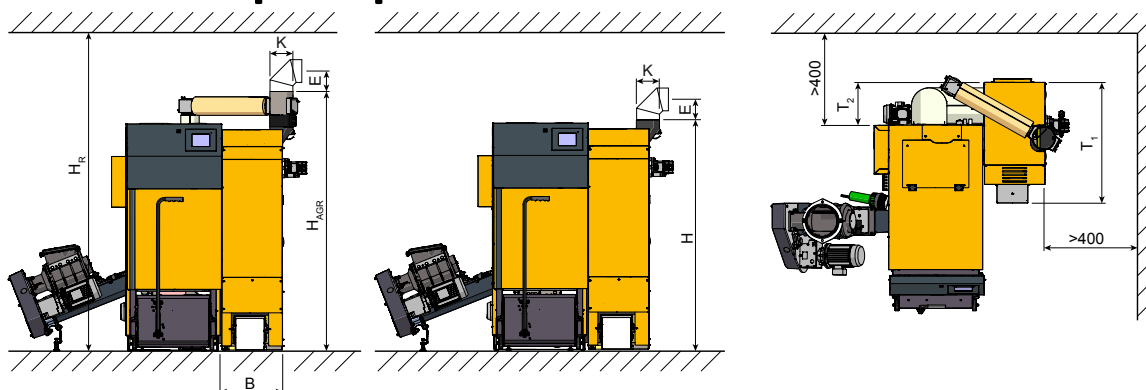
Supplied
connecting pipe



- 2 Electrode:** It statically charges the dust particles and is the key element of the precipitator. While this electrode is operated with a high voltage, the power requirement is extremely low, similar to a farmer's electric fence. Easy on the pocket
- 3 Draught fan:** The draught fan is removed from the boiler and attached to the precipitator. The entire boiler system is operated with just one fan with underpressure. This reduces operating costs while increasing safety.
- 4 Cleaning basket:** The statically loaded dust particles accumulate on the walls of the precipitator and are transported downward from the cleaning basket to the ash of the heat exchanger.
- 5 Ash screw:** It transports the separated dust and fly ash into a large ash box, where they are compacted.



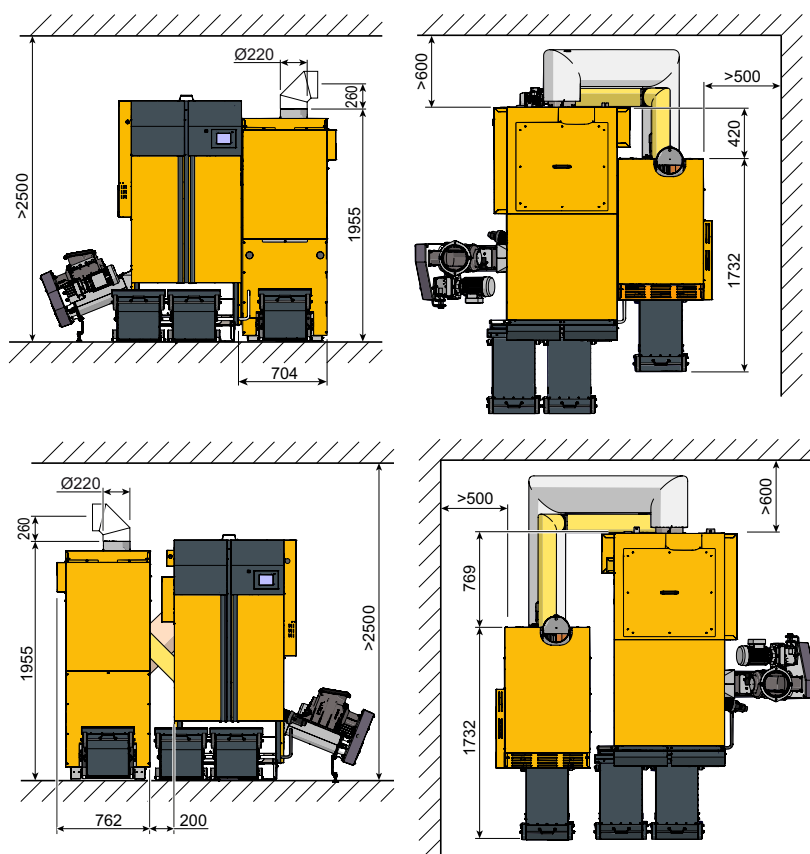
ETA EEP 20-130 precipitator



Boiler	Unit	W	H	H_{FGR}^*	T_1	T_2	K	E	H_R
20 - 50 kW	mm	393	1,485	1,674	952	320	150	210	$> 2,100$
63 - 90 kW	mm	440	1,700	1,888	1,153	320	150	210	$> 2,500$
110 - 130 kW	mm	440	1,760	1,947	1,767	347	180	230	$> 2,500$

*FGR: Boiler and precipitator with flue gas recirculation

ETA EEP 200 precipitator



Particle filter for wood chip boiler	Unit	EEP 50 20 - 50 kW	EEP 90 63 - 90 kW	EEP 130 110 - 130 kW	EEP 200 200 kW
Weight	kg	162	227	294	440
Ash container volumes	Litres	15	21	80	80
Electrical power consumption during operation (maximum value/regular operation)	W	38 / 19	75 / 38	113 / 57	113 / 57
Electrical power consumption in ready mode	W	1			

Electrical connection

Voltage is supplied through the boiler

1 x 230 V / 50 Hz