



**WOOD CHIP HEATING
INSTALLATIONS**
2009

*“...AND WHEN YOU
COME HOME,
YOU JUST HAVE
TO FEEL
COMFORTABLE.”*

WWW.EVOTHERM.AT

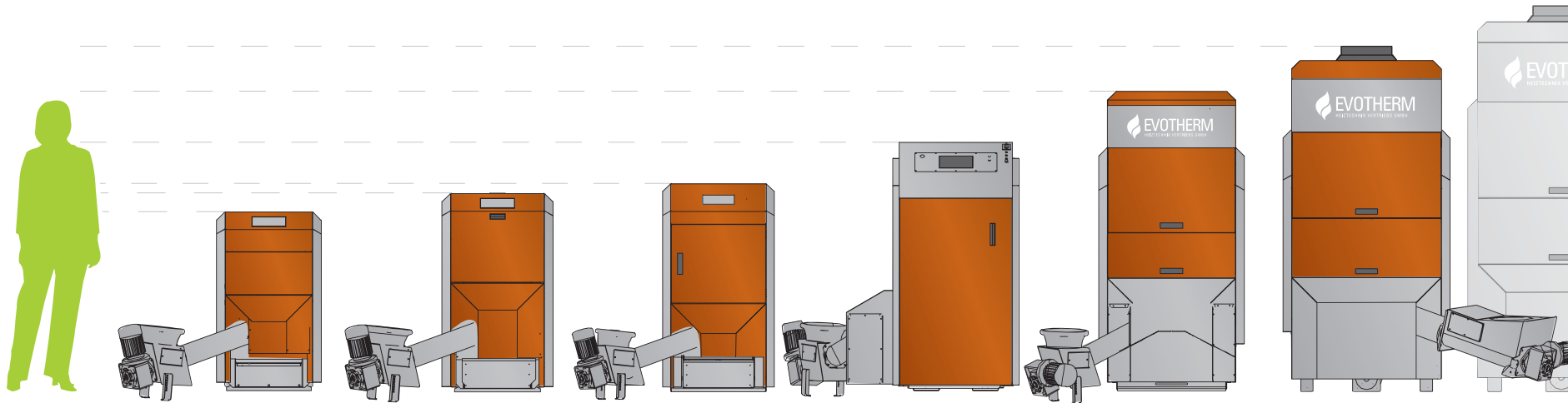
PRODUCT OVERVIEW WOOD CHIP INSTALLATIONS

HS 200 H 196 CM / W 89 CM

HS 100 H 177 CM / W 76 CM

HS 50 H 147 CM / W 66 CM

HS 35 ECO H 121 CM / W 65 CM
 HS 25 ECO H 116 CM / W 65 CM
 HS 15 ECO H 105 CM / W 62 CM



DESCRIPTION	HS 15 ECO	HS 25 ECO	HS 35 ECO	HS 50	HS 100 ECO	HS 200 ECO	HS 500 ECO
RANGE OF PERFORMANCE	4-18 KW	8-25 KW	10-35 KW	15-50 KW	30-100 KW	60-200 KW	
DEGREE OF EFFICIENCY	94 %	93,9 %	95,3 %	92,4 %	94,2 %	92,8 %	
BOILER WEIGHT	250 KG	320 KG	450 KG	570 KG	1.050 KG	1.350 KG	
WATER CONTENT	28 L	39 L	55 L	145 L	150 L	225 L	
WATER CONNECTION	1 ¼ INCH	1 ¼ INCH	1 ¼ INCH	1 ¼ INCH	1 ½ INCH	2 INCH	
BOILER TEMPERATURE	68-85 °C	68-85 °C	68-85 °C	68-85 °C	68-85 °C	68-85 °C	
MIN. TEMPERATURE OF LINE OF RETURN	55 °C	55 °C	55 °C	55 °C	55 °C	55 °C	
BOILER TUBE DIAMETER	130 MM	150 MM	150 MM	200 MM	200 MM	250/300 MM	
POWER CONSUMPTION FULLOAD IN % OF NOMINAL LOAD	0,5 %	0,5 %	0,5 %	0,4 %	0,4 %	0,3 %	
POWER CONSUMPTION PARTIAL LOAD IN % OF PARTIAL LOAD	0,2 %	0,2 %	0,2 %	0,3 %	0,2 %	0,1 %	
STANDBY PERFORMANCE	5 W	5 W	5 W	5 W	5 W	6 W	
EFFECTIVE OUTPUT OF CO / PARTIAL LOAD	50 / 74 MG/M ³	24 / 31 MG/M ³	63 / 33 MG/M ³	11 / 35 MG/M ³	60 / 216 MG/M ³	53 / 73 MG/M ³	
EFFECTIVE OUTPUT OF NO _x / PARTIAL LOAD	142 / 118 MG/M ³	144 / 105 MG/M ³	159 / 136 MG/M ³	103 / N.G. MG/M ³	137 / 112 MG/M ³	127 / 107 MG/M ³	
EFFECTIVE OUTPUT OF OGC / PARTIAL LOAD	2 / 2 MG/M ³	1 / 1 MG/M ³	2 / 1 MG/M ³	1 / 1 MG/M ³	2 / 4 MG/M ³	1 / 1 MG/M ³	
EFFECTIVE OUTPUT OF DUST / PARTIAL LOAD	6 / 11 MG/M ³	12 / 10 MG/M ³	14 / 10 MG/M ³	21 / N.G. MG/M ³	13 / 20 MG/M ³	39 / 5 MG/M ³	

AVAILABLE FROM FALL 2009

OPERATIONAL SAFETY

// PROTECTION FROM OVERLOADING

of the drive motor through reversal of the turning direction

// TEMPERATURE MONITORING

of the combustion feeder through temperature sensors at the Stoker canal

// VACUUM MEASUREMENT (PCS – PRESSURE CONTROL SYSTEM)

for a superior quality of the combustion in the combustion chamber

// SAFETY TEMPERATURE LIMITERS

prevent excess temperature

// RAPID CONTROLABILITY

owing to a low water content

// EMBER BED SENSORS

guarantee a minimal filling level of the combustion chamber and a secure firing

// LAMBDA REGULATION

commands the oxygen supply in the combustion chamber



EXTRACTION TECHNOLOGY

// EXTRACTION CANAL

The solidly built screw canal entails a reliable transportation of the material from the storage chamber. The canal's special profile and the partial coverage prevent ascension of the conveyor screw.

// CONVEYOR SCREW

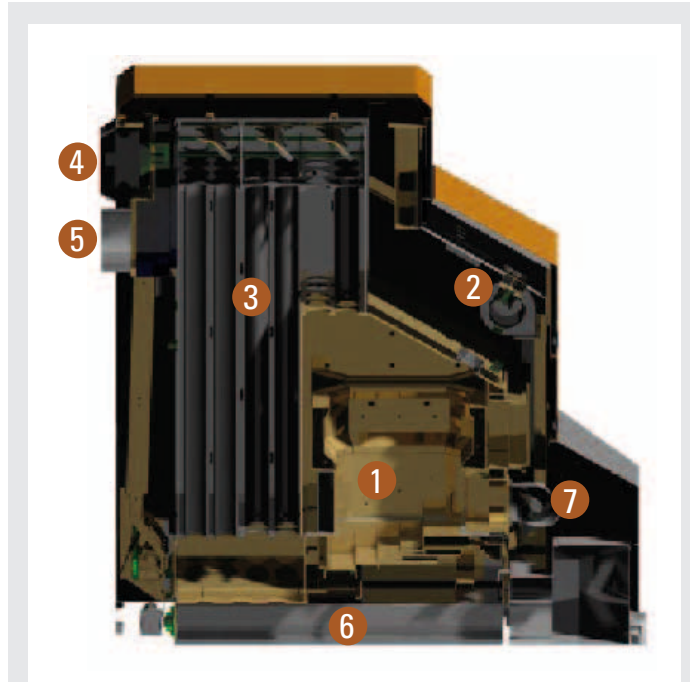
A claw coupling prevents damages at the gear and extraction system. The progressive ascension of the conveyor screw prevents an overfilling of the screw canal in the closed area.

// STOKER

The angular Stoker canal allows for a particularly space-saving solution for all installations. Depending on the heating room situation, the Stoker can be connected at the left and right hand side. A labyrinth-coverage protects the driving side from dust.



CONSTRUCTION AND TECHNOLOGY



- 1 Combustion chamber with patent-registered step grate (HS 100 ECO/ HS 200 ECO): HS 15 ECO, HS 25 ECO, HS 35 ECO and HS 50 dispose of an automatic dumping grate
- 2 Primary and secondary ventilator
- 3 Patent-registered tripple traction heat exchanger with automatic cleaning (turbulators)
- 4 Exhaust fumes ventilator
- 5 Boiler tube connection
- 6 Automatic ember screw (HS 100 ECO/ HS 200 ECO)
- 7 Combustion feeder (frontal insertion)

WOOD CHIP HEATING TECHNOLOGY NOT ONLY STANDS FOR COMFORT AND EFFICIENCY ... BUT ALSO FOR ENVIRONMENTAL AWARENESS AND SUSTAINABILITY!

WOOD GROWS AGAIN ...

*// DID YOU KNOW THAT ALMOST 50% OF AUSTRIA'S
SURFACE AREA CONSISTS OF FORESTS?*

*// AND THAT FAR LESS WOOD IS CUT DOWN THAN
THE AMOUNT OF TREES THAT GROW AGAIN?*

*// SIMILARLY, IN GERMANY ABOUT 35% OF THE
SURFACE AREA IS COVERED WITH WOODS.*

*// HEATING SYSTEMS BASED ON WOOD BECOME
MODERN AGAIN.*

As the first source of energy of mankind, log-fire warmed human beings already hundreds of thousands years ago. Similar to many other domains, it is today's technology that renders this kind of traditional heating system interesting, comfortable, and independent.

As renewing raw material of sheer unlimited resource, wood is more than just a combustible material: through its CO₂ neutrality during its combustion, wood is one of the most environmentally friendly heating materials. The same amount of carbon dioxide that the tree absorbed and retained during its growth is released at the combustion of the wood – which is also the same amount that would be released during the natural rotting process of the wood! Thus, the heating is environmentally friendly and CO₂-neutral!

The regional availability of wood guarantees that the economic value added remains in the country. You no longer have to deal with call out charges and are independent from the (monopolistic) supplier. Wood always gives you a choice! A few years ago, heating systems based on oil and gas represented the standard

option in private households. It is true that the actual time of the exsiccation of oil resources is constantly being recalculated. Whether it is 20 or 30 years from now, the availability of oil as the most important raw material for all industrial nations is going to be limited. Even from today's perspective it is possible to foresee the end of its resources. For the consumer this means a rapid increase of prices, shortage or artificially caused scarcity, which are all effects of certain political and economic interests. Natural gas is strongly related to the oil market since this fossil combustion material is also of limited availability. In many cases, the reservoirs of oil and natural gas coincide. Eventually, the use of wood is also a question of comfort and the conscience of an environmentally friendly heating system. The fact that heating with wood is very cost-efficient contributes to the status of wood as one of the most efficient sources of energy!

EVOTHERM HS 15 ECO

"INDEPENDENCE WITH THE WORLD'S SMALLEST SYSTEM"

EVOTHERM HS 25 ECO

"THE ENVIRONMENTALLY FRIENDLY AND RELIABLE HEATING PROVIDOR FOR YOUR BIG HOME"

EVOTHERM HS 35 ECO

"THE BUNDLE OF ENERGY FOR THE AGRICULTURIST, ENTREPRENEUR, AND COMPANIES OPERATING MULTIPLE HOMES"

EVOTHERM HS 50

"THE ALLROUND TALENT FOR EVERYONE"

EVOTHERM HS 100 ECO

"THE BUNDEL OF ENERGY FOR LARGE-SCALE OPERATIONS"

EVOTHERM HS 200 ECO

"PURE ENERGY FOR LARGE-SCALE PROJECTS"

EVOTHERM HS 500 ECO

"PURE ENERGY FOR LARGE-SCALE PROJECTS"

10 ADVANTAGES

- // A DEGREE OF EFFICIENCY BY 95,3%
- // FLEXIBLE AND FLAT CHAMBER EXTRACTION
- // VACUUM MEASUREMENT
- // MEASUREMENT OF RESIDUAL OXYGEN WITH LAMBDA SENSOR
- // AUTOMATIC CLEANING THROUGH TURBULATORS AND DUMPING GRATE/ STEP GRATE
- // REMOTE CONTROL VIA MOBILE PHONE OR COMPUTER
- // EVOTHERM COMPACT CONSTRUCTION
- // RAPID CONTROLABILITY THROUGH FIRECLAY-FREE CONSTRUCTION
- // RANGE OF PERFORMANCE FROM 4 TO 200 KW (FROM FALL 2009 UP TO 500 KW)
- // AVAILABILITY OF SPONSORSHIP BY FEDERAL STATE (UZ 37) AND LAND



„ATTAINING MAXIMAL ENERGY OUTPUT WITH MINIMAL INVESTMENT OF COMBUSTIBLE MATERIAL AND SMALLEST INSTALLATION SIZE AT A LOW LEVEL OF EMISSIONS AND RAPID CONTROLABILITY.“

WWW.EVOTHERM.AT

EVOTHERM HEIZTECHNIK VERTRIEBS GMBH
ELLING 40, A-5141 MOOSDORF

T +43 (0) 7748 / 32 473
F +43 (0) 7748 / 32 473-67

OFFICE@EVOTHERM.AT
WWW.EVOTHERM.AT

DEALER'S STAMP

