



G Ł Ó W N Y
I N S T Y T U T
G Ó R N I C T W A

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- **Registration No** 000023461 **VAT:** PL 6340126016
National Legal Registry: 0000090660

**RESEARCH CERTIFICATE
AS A TOKEN OF THE ECOLOGICAL SAFETY
No 20/2012**

of water boilers of the type V7

producent : MCE
Małopolskie Centrum Ekologiczne
Sławomir Migdałek, Piotr Kozłowski
Spółka Cywilna
Klecza Dolna 15a
34 – 124 Klecza Górna

Description	Unit of measurement	Result	limit values according to.	
			the PN-EN 12809:2002	the PN-EN 303-5
fuel: hard bituminous coal - grades - grain size distribution - calorific value - content of sulphur - content of ash - content of moisture	type - mm MJ/kg % % %	31 eco small coal 5 – 25 25 – 29 0,35 – 1,0 8,0 – 15,0 < 10		
The efficiency of the boiler (gross) according to the PN –EN 12952 - 15	%	84		
The concentration of particulate and gaseous substances : - dust - OGC - sulphur dioxide - nitrogen dioxide - carbon monoxide	mg/m ³ mg/m ³ mg/m ³ mg/m ³ mg/m ³ / mg/m ³ /%	36 0,035 1134 185 112mg/m ³ /0,009%	< 0,3%	125 100 - - 3000

Water boilers with a retort burner of the V7 type stoked with the hard bituminous eco small coal grade rated 17, 25, 28, 32, 36, 42, 50, 60, 75 kW of power have been examined in the Central Mining Institute by the Department of Energy Saving and Air Protection, the Laboratory of Work Environment and Air Protection.

Water boilers of the V7 type with an oblique feeder and a fixed retort burner, series of types of 17 – 75 kW of power have been found conformed to the requirements for the emissions of gaseous and particulate pollutants contained in

- the PN – EN 303 – 5 : 2002 Standard , (part 5: Heating boilers for solid fuels, hand and automatically fired, nominal heat output of up to 300 kW. Terminology, requirements, testing and marking.)
- the PN-EN 12809:2002 Standard. Residential independent boilers fired by solid fuel - Nominal heat output up to 50 kW - Requirements and test methods.

Water boilers of the V7 type with an oblique feeder and a fixed retort burner of the series of types of 17 – 75 kW of power have fallen within class 3 (best) of the emission values according to the PN-EN 303-5 and in class 1 (best) emission of carbon monoxide according to the PN-EN 12809: 2002.

dr inż. Eugeniusz Orszulik
Przegląd Efektywności Przemysłowej
i Gospodarki Środowiskowej
Główny Instytut Górnictwa
Certyfikacja Systemów Zarządzania
Świadectwo nr 11
in conformity with:
PN-EN ISO 9001:2009 PN-N-18001:2004
PN-EN ISO 14001:2005



Notified Body
No 1453



Katowice, 19.06.2012r.

Kierownik
Zakładu Oszczędności Energii i Ochrony Powietrza

stamp and signature of the head of the
organisational unit of the GIG

Integrated Scientific-Technological Institute
Fuels-Safety-Environment



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RESEARCH CERTIFICATE
AS A TOKEN OF THE ECOLOGICAL SAFETY
No 21/2012

of water boilers of the type V7

producent : MCE
Małopolskie Centrum Ekologiczne
Sławomir Migdalek, Piotr Kozłowski
Spółka Cywilna
Klecza Dolna 15a
34 – 124 Klecza Górna

Description	Unit of measurement	Result	limit values according to.	
			the PN-EN 12809:2002	the PN-EN 303-5
fuel:	type	lignite coal		
- grades	-	eco small coal		
- grain size distribution	mm	5 – 25		
- calorific value	MJ/kg	18 – 21		
- content of sulphur	%	0,35 – 1,03		
- content of ash	%	8,0 – 10,0		
- content of moisture	%	< 20		
The efficiency of the boiler (gross) according to the PN – EN 12952 - 15	%	83		
The concentration of particulate and gaseous substances :				
- dust	mg/m ³	42		125
- OGC	mg/m ³	0,0000		100
- sulphur dioxide	mg/m ³	1008		-
- nitrogen dioxide	mg/m ³	224		-
- carbon monoxide	mg/m ³ /%	192mg/m ³ /0,015%	< 0,3%	3000

Water boilers with a retort burner of the V7 type stoked with the lignite eco small coal grade rated 17, 25, 28, 32, 36, 42, 50, 60, 75 kW of power have been examined in the Central Mining Institute by the Department of Energy Saving and Air Protection, the Laboratory of Work Environment and Air Protection.

Water boilers of the V7 type with an oblique feeder and a fixed retort burner, series of types of 17 – 75 kW of power have been found conformed to the requirements for the emissions of gaseous and particulate pollutants contained in

- the PN – EN 303 – 5 : 2002 Standard , (part 5: Heating boilers for solid fuels, hand and automatically fired, nominal heat output of up to 300 kW. Terminology, requirements, testing and marking.)
- the PN-EN 12809:2002 Standard. Residential independent boilers fired by solid fuel - Nominal heat output up to 50 kW - Requirements and test methods.

Water boilers of the V7 type with an oblique feeder and a fixed retort burner of the series of types of 17 – 75 kW of power have fallen within class 3 (best) of the emission values according to the PN-EN 303-5 and in class 1 (best) emission of carbon monoxide according to the PN-EN 12809: 2002.

dr inż. Eugeniusz Orszulik
Przegląd Efektywności Przemysłowej
i Ochrony Środowiska

Certyfikacja i Zarządzanie Systemami
Środowiskowymi

PN-EN ISO 9001:2009 PN-ISO 14001:2004
PN-EN ISO 14001:2005



Notified Body
No 1453



Kierownik
Zakładu Oszczędności Energii i Ochrony Powietrza

prof. dr hab. inż. Krzysztof Stańczyk

stamp and signature of the head of the
organisational unit of the CMI
Fuel Safety Environment
Katowice, 19.06.2012r.



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RESEARCH CERTIFICATE
AS A TOKEN OF THE ECOLOGICAL SAFETY
No 22/2012

of water boilers of the type V7

producent : MCE
Małopolskie Centrum Ekologiczne
Sławomir Migdałek, Piotr Kozłowski
Spółka Cywilna
Klecza Dolna 15a
34 – 124 Klecza Górna

Description	Unit of measurement	Result	limit values according to	
			the PN-EN 12809:2002	the PN-EN 303-5
fuel:	type	Fire - wood		
- grades	-	briquet		
- grain size distribution	mm	10 – 20		
- calorific value	MJ/kg	15 – 18		
- content of sulphur	%	< 0,10		
- content of ash	%	< 0,3		
- content of moisture	%	< 10		
The efficiency of the boiler (gross) according to the PN –EN 12952 - 15	%	94		
The concentration of particulate and gaseous substances :				
- dust	mg/m ³	44		125
- OGC	mg/m ³	p.o.		100
- sulphur dioxide	mg/m ³	117		-
- nitrogen dioxide	mg/m ³	218		-
- carbon monoxide	mg/m ³ %	381mg/m ³ /0,0305%	< 0,3%	3000

Water boilers with a retort burner of the V7 type stoked with the fire – wood briquet grade rated 17, 25, 28, 32, 36, 42, 50, 60, 75 kW of power have been examined in the Central Mining Institute by the Department of Energy Saving and Air Protection, the Laboratory of Work Environment and Air Protection.

Water boilers of the V7 type with an oblique feeder and a fixed retort burner, series of types of 17 – 75 kW of power have been found conformed to the requirements for the emissions of gaseous and particulate pollutants contained in

- the PN – EN 303 – 5 : 2002 Standard , (part 5: Heating boilers for solid fuels, hand and automatically fired, nominal heat output of up to 300 kW. Terminology, requirements, testing and marking.)
- the PN-EN 12809:2002 Standard. Residential independent boilers fired by solid fuel - Nominal heat output up to 50 kW - Requirements and test methods.

Water boilers of the V7 type with an oblique feeder and a fixed retort burner of the series of types of 17 – 75 kW of power have fallen within class 3 (best) of the emission values according to the PN-EN 303-5 and in class 1 (best) emission of carbon monoxide according to the PN-EN 12809: 2002.

dr inż. Eugeniusz Orszulik
Przegląd Efektywności Przemysłowej
i Ochrony Środowiska
Uprawnienia Kierownika
świadczymy na:
in compliance with:
PN-EN ISO 9001:2009 PN-N-18001:2004
PN-EN ISO 14001:2005



Notified Body
No 1453



Katowice, 19.06.2012r.

Integrated Scientific-Technological Institute
Fuels-Safety-Environment

Kierownik
Zadania Oszczędności Energii i Ochrony Powietrza

stamp and signature of the head of the
organisational unit of the GIG
prof. dr hab. inż. Krzysztof Stanczyk