### SAP Product Characteristics Database (PCDB) – Optional EN14825:2016 test data declaration form

To submit heat pump data to the SAP Product Characteristics Database (PCDB), test data produced in accordance with the engineering standard EN14825:2016 (or 2013) are required<sup>1</sup>. Such test data should be submitted within a test report as defined by the standard.

Test reports need not be provided by a third-party test laboratory, i.e. they can be produced inhouse by the manufacturer, subject to their test laboratory satisfying the requirements of EN ISO/IEC 17025 - *General requirements for the competence of testing and calibration laboratories,* or MCS 011 - *Product Certification Scheme Requirements: Acceptance Criteria for Testing Required for Product Certification*<sup>2</sup> or an equivalent scheme. This may be provided on a declaration basis or via independent assessment.

Independent assessment generally means accreditation to EN ISO/IEC 17025 by a member of the European co-operation for Accreditation (EA) or International Accreditation Forum (IAF) Multilateral Recognition Agreement (MLA).

For test laboratories that are not accredited, independent assessment means confirmation from a certification body, accredited for MCS 011 by a member of the European co-operation for Accreditation (EA) or International Accreditation Forum (IAF) Multilateral Recognition Agreement (MLA), that they have conducted an assessment of the test laboratory in accordance with MCS 011 (or equivalent) and consider the test laboratory to meet the relevant conditions of MCS 011 (or equivalent).

In some cases, manufacturers may be unable to provide test reports. In such cases, when the following conditions are met, this <u>optional</u> declaration form may be used as an alternative means of providing the required test data. The conditions are:

- The heat pump must be Microgeneration Certification Scheme (MCS) certificated
- The test laboratory must be independently assessed (as defined above) and found to meet the requirements of EN ISO/IEC 17025 or MCS 011 (or equivalent).

If this approach is applicable, please complete all fields (marked grey) in the tables below as indicated and submit to the PCDB application portal<sup>3</sup> in conjunction with all other required evidence, as specified by the portal (but excluding an EN14825 test report).

NOTE: Heat pump products submitted to the PCDB without test reports (using this form) may be subject to greater scrutiny within Technical Audit programmes. Therefore, test reports should be submitted wherever possible.

<sup>&</sup>lt;sup>1</sup> See: <u>http://www.ncm-pcdb.org.uk/sap/page.jsp?id=24</u>, Test data arising from this test standard is also used for demonstrating compliance with Ecodesign regulation No. 811/2013 and 813/2013.

<sup>&</sup>lt;sup>2</sup> See: <u>http://www.microgenerationcertification.org/mcs-standards/product-standards</u>

<sup>&</sup>lt;sup>3</sup> <u>http://www-apply.ncm-pcdb.org.uk/</u>

#### HEAT PUMP IDENTIFICATION

Heat pump manufacturer	
Heat pump brand name (NCM (SAP) Identifier)	
Heat pump model name (NCM (SAP) Identifier)	
Heat pump model qualifier (NCM (SAP) Identifier)	
MCS Certificate number	

#### HEAT PUMP TYPE (DEFINITIONS PROVIDED BY EN14825:2016)

Heat pump source type (delete as appropriate)	Ground (brine) / Air / Exhaust-air				
Low temperature heat pump? (delete as appropriate)	Yes / No				
Combination heat pump? (delete as appropriate)	Yes / No				
Capacity control? (delete as appropriate)	Variable / Fixed				

#### DETAILS OF TESTS UNDERTAKEN TO EN14825:2016 (OR 2013)

Name of test laboratory	
Address of test laboratory	
Responsible person within laboratory	
Date of test	
Microgeneration Certification Scheme – Evidence of compliance	
with the requirements of EN ISO/IEC 17025 or MCS 011 (e.g.	
name of accreditation or certification body + details of	
independent assessment.)	

## TEST DATA DECLARATION

Name of company making application to SAP Product	
Characteristics Database (PCDB)	
Address of company	
Person responsible for submitting this document on behalf of	
manufacturer and with authority from test laboratory	
I confirm that I have the necessary authority to act on behalf of	
the company named above in regards to this declaration - Signed	

	EN14825 - AVERAGE CLIMATE CONDITIONS – LOW TEMPERATURE APPLICATION											
Standard rating condition capacity (EN14511, in kW)												
Rated air or brine flow rate (m³/hr)												
Condition	Part load ratio (%)	Source te dry (wet)	urce temperature during test – Wa / (wet) bulb (°C) (°C ap		Water outlet temperature during test (°C) [delete column as appropriate]		Capacity (kW)	Coefficient of Performance	Degradation coefficient (Cdh) <b>[if unknown,</b>			
		Air- source heat pump	Ground- source heat pump	Exhaust- air heat pump	Fixed	Variable			enter 0.9]			
А	88	-7 (-8)	0	20 (12)	35	34						
В	54	2 (1)	0	20 (12)	35	30						
С	35	7 (6)	0	20 (12)	35	27						
D	15	12 (11)	0	20 (12)	35	24						
E			0	20 (12)	35							
F			0	20 (12)	35							

EN14825 - AVERAGE CLIMATE CONDITIONS – MEDIUM TEMPERATURE APPLICATION															
Standard rating condition capacity (EN14511, in kW)															
Rated air or brine flow rate (m <sup>3</sup> /hr)															
Condition	Part load ratio (%)	Source te dry (wet)	(wet) bulb (°C)		Source temperature during test –       Water outlet         dry (wet) bulb (°C)       temperature during test         (°C) [delete column as       appropriate]		<ul> <li>Water outlet temperature during test (°C) [delete column as appropriate]</li> </ul>		Water outlet temperature during test (°C) [delete column as appropriate]		ng test – Water outlet temperature during test (°C) [delete column as appropriate]		Capacity (kW)	Coefficient of Performance	Degradation coefficient (Cdh) <b>[if unknown,</b>
		Air- source heat pump	Ground- source heat pump	Exhaust- air heat pump	Fixed	Variable			enter 0.9]						
А	88	-7 (-8)	0	20 (12)	55	52									
В	54	2 (1)	0	20 (12)	55	42									
С	35	7 (6)	0	20 (12)	55	36									
D	15	12 (11)	0	20 (12)	55	30									
E			0	20 (12)	55										
F			0	20 (12)	55										

	ADDITIONAL PARAMETERS	
Power consumption in modes other than	Off mode (P <sub>OFF</sub> ) – watts Thermostat-off mode (P <sub>TO</sub> ) – watts	
active mode	Standby mode (P <sub>SB</sub> ) – watts	
	Crankcase heater mode (Pck) - watts	

Note: If an Exhaust-air heat pump, the relevant test data must be submitted at two or three airflow rates, requiring that two or three EN14825 tests are conducted (at low and/or medium temperature applications). Therefore, additional test data reporting tables are required – See Annex A.

# ANNEX A – Additional reporting tables for Exhaust-air heat pumps:

	EN14825 - AVERAGE CLIMATE CONDITIONS – LOW TEMPERATURE APPLICATION											
Rated air or brine flow rate (m <sup>3</sup> /hr)												
Condition	Part load ratio (%)	Source temperature during test – dry (wet) bulb (°C)		during test – Water outlet temperature during tes (°C) [delete column as appropriate]		et re during test <b>e column as</b> f <b>e]</b>	Capacity (kW)	Coefficient of Performance	Degradation coefficient (Cdh) <b>[if unknown,</b>			
		Air- source heat pump	Ground- source heat pump	Exhaust- air heat pump	Fixed	Variable			enter 0.9]			
А	88	-7 (-8)	0	20 (12)	35	34						
В	54	2 (1)	0	20 (12)	35	30						
С	35	7 (6)	0	20 (12)	35	27						
D	15	12 (11)	0	20 (12)	35	24						
E			0	20 (12)	35							
F			0	20 (12)	35							

	EN14825 - AVERAGE CLIMATE CONDITIONS – MEDIUM TEMPERATURE APPLICATION											
Rated air or brine flow rate (m <sup>3</sup> /hr)												
Condition	Part load ratio (%)	Source te dry (wet)	mperature d bulb (°C)	uring test –	ring test – Water outlet temperature duri (°C) [delete colun appropriate]		Capacity (kW)	Coefficient of Performance	Degradation coefficient (Cdh) <b>[if unknown,</b>			
		Air- source heat pump	Ground- source heat pump	Exhaust- air heat pump	Fixed	Variable			enter 0.9]			
А	88	-7 (-8)	0	20 (12)	55	52						
В	54	2 (1)	0	20 (12)	55	42						
С	35	7 (6)	0	20 (12)	55	36						
D	15	12 (11)	0	20 (12)	55	30						
E			0	20 (12)	55							
F			0	20 (12)	55							

	EN14825 - AVERAGE CLIMATE CONDITIONS – LOW TEMPERATURE APPLICATION												
Standard rating condition capacity (EN14511, in kW)													
Rated air or brine flow rate (m <sup>3</sup> /hr)													
Condition	Part load ratio (%)	Source temperature during test – dry (wet) bulb (°C)		g test – Water outlet temperature during test (°C) [delete column as appropriate]		Capacity (kW)	Coefficient of Performance	Degradation coefficient (Cdh) <i>[if unknown,</i>					
		Air- source heat pump	Ground- source heat pump	Exhaust- air heat pump	Fixed	Variable			enter 0.9]				
А	88	-7 (-8)	0	20 (12)	35	34							
В	54	2 (1)	0	20 (12)	35	30							
С	35	7 (6)	0	20 (12)	35	27							
D	15	12 (11)	0	20 (12)	35	24							
E			0	20 (12)	35								
F			0	20 (12)	35								

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		EN14825	ATURE APP	LICATION					
Rated air or brine flow rate (m <sup>3</sup> /hr)									
Condition	Part load ratio (%)	d Source temperature during test – ) dry (wet) bulb (°C)		Water outlet temperature during test (°C) [delete column as appropriate]		Capacity (kW)	Coefficient of Performance	Degradation coefficient (Cdh) <b>[if unknown,</b>	
		Air- source heat pump	Ground- source heat pump	Exhaust- air heat pump	Fixed	Variable			enter 0.9]
А	88	-7 (-8)	0	20 (12)	55	52			
В	54	2 (1)	0	20 (12)	55	42			
С	35	7 (6)	0	20 (12)	55	36			
D	15	12 (11)	0	20 (12)	55	30			
E			0	20 (12)	55				
F			0	20 (12)	55				