

| Summary of | Ecodan Eco Inverter 4 | Reg. No. | 037-0048-20 |
|----------------------------|---|----------|----------------|
| Certificate Holder | Certificate Holder | | |
| Name | Mitsubishi Electric Air Conditioning Systems Europe LTD | | |
| Address | Nettlehill Road, Houston Industrial Estate | Zip | EH54 5EQ |
| City | Livingston | Country | United Kingdom |
| Certification Body | SZU - Strojirensky zkusebni ustav (Engineering Test Institute, Public Enterprise) | | |
| Name of testing laboratory | RISE Research Institute of Sweden | | |
| Subtype title | Ecodan Eco Inverter 4 | | |
| Heat Pump Type | Outdoor Air/Water | | |
| Refrigerant | R410a | | |
| Mass Of Refrigerant | 1.3 kg | | |
| Certification Date | 09.04.2020 | | |
| Testing basis | HP Keymark scheme rules rev. no. 7 | | |



Model: SUHZ-SW45VA(H) + EHST20D-M*C

| General Data | |
|--------------|-------------|
| Power supply | 1x230V 50Hz |

Heating

| EN 14511-2 | | |
|------------------------|--------------------|--|
| | Medium temperature | |
| Heat output | 4.70 kW | |
| El input | 1.74 kW | |
| СОР | 2.70 | |
| Indoor water flow rate | 0.51 m³/h | |

| EN 14511-4 | | |
|--|--------|--|
| Shutting off the heat transfer medium flow | passed | |
| Complete power supply failure | passed | |
| Defrost test | passed | |
| Starting and operating test | passed | |



| EN 12102-1 | |
|---------------------------|--------------------|
| | Medium temperature |
| Sound power level indoor | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) |

| EN 14825 | |
|-------------------------|--------------------|
| | Medium temperature |
| η_{s} | 126 % |
| Prated | 4.60 kW |
| SCOP | 3.22 |
| Tbiv | -7 °C |
| TOL | -15 °C |
| Pdh Tj = -7°C | 4.10 kW |
| COP Tj = -7°C | 1.78 |
| Cdh | 0.97 |
| Pdh Tj = $+2$ °C | 2.50 kW |
| COP Tj = +2°C | 3.29 |
| Cdh | 0.97 |
| Pdh Tj = $+7^{\circ}$ C | 3.10 kW |
| $COPTj = +7^{\circ}C$ | 4.40 |
| Cdh | 0.97 |





| Pdh Tj = 12°C | 2.80 kW |
|--|-------------|
| COP Tj = 12°C | 6.71 |
| Cdh | 0.97 |
| Pdh Tj = Tbiv | 4.10 kW |
| COP Tj = Tbiv | 1.78 |
| Pdh Tj = TOL | 2.70 kW |
| COP Tj = TOL | 1.27 |
| WTOL | 55 °C |
| Poff | 10 W |
| РТО | 10 W |
| PSB | 10 W |
| PCK | 0 W |
| Supplementary Heater: Type of energy input | electricity |
| Supplementary Heater: PSUP | 1.00 kW |
| Annual energy consumption Qhe | 2886 kWh |
| | |

Domestic Hot Water (DHW)





| EN 16147 | | |
|---------------------------------|------------|--|
| Declared load profile | L | |
| Efficiency ηDHW | 115 % | |
| СОР | 2.72 | |
| Heating up time | 2:38 h:min | |
| Standby power input | 36.0 W | |
| Reference hot water temperature | 51.8 °C | |
| Mixed water at 40°C | 278 | |



Model: SUHZ-SW45VA(H) + EHST20D-VM*C

| General Data | |
|--------------|-------------|
| Power supply | 1x230V 50Hz |

Heating

| EN 14511-2 | | |
|------------------------|--------------------|--|
| | Medium temperature | |
| Heat output | 4.70 kW | |
| El input | 1.74 kW | |
| СОР | 2.70 | |
| Indoor water flow rate | 0.51 m³/h | |

| EN 14511-4 | | |
|--|--------|--|
| Shutting off the heat transfer medium flow | passed | |
| Complete power supply failure | passed | |
| Defrost test | passed | |
| Starting and operating test | passed | |



| EN 12102-1 | |
|---------------------------|--------------------|
| | Medium temperature |
| Sound power level indoor | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) |

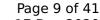
| EN 14825 | |
|-------------|--------------------|
| | Medium temperature |
| S | 126 % |
| ated | 4.60 kW |
| ОР | 3.22 |
| V | -7 °C |
|)L | -15 °C |
| h Tj = -7°C | 4.10 kW |
| P Tj = -7°C | 1.78 |
| n | 0.97 |
| n Tj = +2°C | 2.50 kW |
| P Tj = +2°C | 3.29 |
| h | 0.97 |
| h Tj = +7°C | 3.10 kW |
| P Tj = +7°C | 4.40 |
| h | 0.97 |





| Pdh Tj = 12°C | 2.80 kW |
|--|-------------|
| COP Tj = 12°C | 6.71 |
| Cdh | 0.97 |
| Pdh Tj = Tbiv | 4.10 kW |
| COP Tj = Tbiv | 1.78 |
| Pdh Tj = TOL | 2.70 kW |
| COP Tj = TOL | 1.27 |
| WTOL | 55 °C |
| Poff | 10 W |
| РТО | 10 W |
| PSB | 10 W |
| PCK | 0 W |
| Supplementary Heater: Type of energy input | electricity |
| Supplementary Heater: PSUP | 1.00 kW |
| Annual energy consumption Qhe | 2886 kWh |
| | |

Domestic Hot Water (DHW)





| EN 16147 | |
|---------------------------------|------------|
| Declared load profile | L |
| Efficiency ηDHW | 115 % |
| СОР | 2.72 |
| Heating up time | 2:38 h:min |
| Standby power input | 36.0 W |
| Reference hot water temperature | 51.8 °C |
| Mixed water at 40°C | 278 |



Model: SUHZ-SW45VA(H) + EHST20D-YM*C

| General Data | |
|--------------|-------------|
| Power supply | 3x400V 50Hz |

Heating

| EN 14511-2 | |
|------------------------|--------------------|
| | Medium temperature |
| Heat output | 4.70 kW |
| El input | 1.74 kW |
| СОР | 2.70 |
| Indoor water flow rate | 0.51 m³/h |

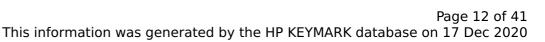
| EN 14511-4 | |
|--|--------|
| Shutting off the heat transfer medium flow | passed |
| Complete power supply failure | passed |
| Defrost test | passed |
| Starting and operating test | passed |



 $$\operatorname{Page}\ 11$$ of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| EN 12102-1 | |
|---------------------------|--------------------|
| | Medium temperature |
| Sound power level indoor | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) |

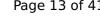
| EN 14825 | |
|---------------|--------------------|
| | Medium temperature |
| η_{s} | 126 % |
| Prated | 4.60 kW |
| SCOP | 3.22 |
| Tbiv | -7 °C |
| TOL | -15 °C |
| Pdh Tj = -7°C | 4.10 kW |
| COP Tj = -7°C | 1.78 |
| Cdh | 0.97 |
| Pdh Tj = +2°C | 2.50 kW |
| COP Tj = +2°C | 3.29 |
| Cdh | 0.97 |
| Pdh Tj = +7°C | 3.10 kW |
| COP Tj = +7°C | 4.40 |
| Cdh | 0.97 |



| p |
|---|
| |

| Pdh Tj = 12°C | 2.80 kW |
|--|-------------|
| COP Tj = 12°C | 6.71 |
| Cdh | 0.97 |
| Pdh Tj = Tbiv | 4.10 kW |
| COP Tj = Tbiv | 1.78 |
| Pdh Tj = TOL | 2.70 kW |
| COP Tj = TOL | 1.27 |
| WTOL | 55 °C |
| Poff | 10 W |
| РТО | 10 W |
| PSB | 10 W |
| PCK | 0 W |
| Supplementary Heater: Type of energy input | electricity |
| Supplementary Heater: PSUP | 1.00 kW |
| Annual energy consumption Qhe | 2886 kWh |
| | |

Domestic Hot Water (DHW)





 $$\operatorname{Page}\ 13$$ of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| EN 16147 | |
|---------------------------------|------------|
| Declared load profile | L |
| Efficiency ηDHW | 115 % |
| СОР | 2.72 |
| Heating up time | 2:38 h:min |
| Standby power input | 36.0 W |
| Reference hot water temperature | 51.8 °C |
| Mixed water at 40°C | 278 |



Model: SUHZ-SW45VA(H) + EHSD-M*C

| General Data | |
|--------------|-------------|
| Power supply | 1x230V 50Hz |

Heating

| EN 14511-2 | | |
|------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Heat output | 4.10 kW | 4.70 kW |
| El input | 0.80 kW | 1.74 kW |
| СОР | 5.10 | 2.70 |
| Indoor water flow rate | 0.71 m³/h | 0.51 m³/h |

| EN 14511-4 | |
|--|--------|
| Shutting off the heat transfer medium flow | passed |
| Complete power supply failure | passed |
| Defrost test | passed |
| Starting and operating test | passed |



 $$\operatorname{\textit{Page}}\ 15$$ of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| | EN 12102-1 | |
|---------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Sound power level indoor | 40 dB(A) | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) | 61 dB(A) |

| EN 14825 | | |
|---------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| η_{s} | 170 % | 126 % |
| Prated | 5.00 kW | 4.60 kW |
| SCOP | 4.33 | 3.22 |
| Tbiv | -7 °C | -7 °C |
| TOL | -15 °C | -15 °C |
| Pdh Tj = -7°C | 4.40 kW | 4.10 kW |
| COP Tj = -7°C | 2.82 | 1.78 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +2°C | 2.70 kW | 2.50 kW |
| COP Tj = +2°C | 4.41 | 3.29 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +7°C | 3.30 kW | 3.10 kW |
| COP Tj = +7°C | 5.48 | 4.40 |
| Cdh | 0.97 | 0.97 |



 $$\operatorname{\textit{Page}}\ 16$$ of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| Pdh Tj = 12°C | 2.50 kW | 2.80 kW |
|--|-------------|-------------|
| COP Tj = 12°C | 8.60 | 6.71 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = Tbiv | 4.40 kW | 4.10 kW |
| COP Tj = Tbiv | 2.82 | 1.78 |
| Pdh Tj = TOL | 2.70 kW | 2.70 kW |
| COP Tj = TOL | 1.21 | 1.27 |
| WTOL | 55 °C | 55 °C |
| Poff | 10 W | 10 W |
| РТО | 10 W | 10 W |
| PSB | 10 W | 10 W |
| PCK | 0 W | o w |
| Supplementary Heater: Type of energy input | electricity | electricity |
| Supplementary Heater: PSUP | 1.20 kW | 1.00 kW |
| Annual energy consumption Qhe | 2284 kWh | 2886 kWh |



Model: SUHZ-SW45VA(H) + EHSD-VM*C

| General Data | |
|--------------|-------------|
| Power supply | 1x230V 50Hz |

Heating

| EN 14511-2 | | |
|------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Heat output | 4.10 kW | 4.70 kW |
| El input | 0.80 kW | 1.74 kW |
| СОР | 5.10 | 2.70 |
| Indoor water flow rate | 0.71 m³/h | 0.51 m³/h |

| EN 14511-4 | |
|--|--------|
| Shutting off the heat transfer medium flow | passed |
| Complete power supply failure | passed |
| Defrost test | passed |
| Starting and operating test | passed |



| | EN 12102-1 | |
|---------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Sound power level indoor | 40 dB(A) | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) | 61 dB(A) |

| EN 14825 | | |
|---------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| η_{s} | 170 % | 126 % |
| Prated | 5.00 kW | 4.60 kW |
| SCOP | 4.33 | 3.22 |
| Tbiv | -7 °C | -7 °C |
| TOL | -15 °C | -15 °C |
| Pdh Tj = -7°C | 4.40 kW | 4.10 kW |
| COP Tj = -7°C | 2.82 | 1.78 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +2°C | 2.70 kW | 2.50 kW |
| COP Tj = +2°C | 4.41 | 3.29 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +7°C | 3.30 kW | 3.10 kW |
| COP Tj = +7°C | 5.48 | 4.40 |
| Cdh | 0.97 | 0.97 |



 $$\operatorname{\textit{Page}}\ 19$ of 41$$ This information was generated by the HP KEYMARK database on 17 Dec 2020

| Pdh Tj = 12°C | 2.50 kW | 2.80 kW |
|--|-------------|-------------|
| COP Tj = 12°C | 8.60 | 6.71 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = Tbiv | 4.40 kW | 4.10 kW |
| COP Tj = Tbiv | 2.82 | 1.78 |
| Pdh Tj = TOL | 2.70 kW | 2.70 kW |
| COP Tj = TOL | 1.21 | 1.27 |
| WTOL | 55 °C | 55 °C |
| Poff | 10 W | 10 W |
| РТО | 10 W | 10 W |
| PSB | 10 W | 10 W |
| PCK | 0 W | o w |
| Supplementary Heater: Type of energy input | electricity | electricity |
| Supplementary Heater: PSUP | 1.20 kW | 1.00 kW |
| Annual energy consumption Qhe | 2284 kWh | 2886 kWh |



Model: SUHZ-SW45VA(H) + EHSD-YM*C

| General Data | |
|--------------|-------------|
| Power supply | 3x400V 50Hz |

Heating

| EN 14511-2 | | | |
|------------------------|-----------------|--------------------|--|
| | Low temperature | Medium temperature | |
| Heat output | 4.10 kW | 4.70 kW | |
| El input | 0.80 kW | 1.74 kW | |
| СОР | 5.10 | 2.70 | |
| Indoor water flow rate | 0.71 m³/h | 0.51 m³/h | |

| EN 14511-4 | | |
|--|--------|--|
| Shutting off the heat transfer medium flow | passed | |
| Complete power supply failure | passed | |
| Defrost test | passed | |
| Starting and operating test | passed | |



 $$\operatorname{\textit{Page}}\xspace$ 21 of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| EN 12102-1 | | |
|---------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Sound power level indoor | 40 dB(A) | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) | 61 dB(A) |

| EN 14825 | | |
|---------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| η_{s} | 170 % | 126 % |
| Prated | 5.00 kW | 4.60 kW |
| SCOP | 4.33 | 3.22 |
| Tbiv | -7 °C | -7 °C |
| TOL | -15 °C | -15 °C |
| Pdh Tj = -7°C | 4.40 kW | 4.10 kW |
| COP Tj = -7°C | 2.82 | 1.78 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +2°C | 2.70 kW | 2.50 kW |
| COP Tj = +2°C | 4.41 | 3.29 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +7°C | 3.30 kW | 3.10 kW |
| COP Tj = +7°C | 5.48 | 4.40 |
| Cdh | 0.97 | 0.97 |



 $$\operatorname{\textit{Page}}\xspace$ 22 of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| Pdh Tj = 12°C | 2.50 kW | 2.80 kW |
|--|-------------|-------------|
| COP Tj = 12°C | 8.60 | 6.71 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = Tbiv | 4.40 kW | 4.10 kW |
| COP Tj = Tbiv | 2.82 | 1.78 |
| Pdh Tj = TOL | 2.70 kW | 2.70 kW |
| COP Tj = TOL | 1.21 | 1.27 |
| WTOL | 55 °C | 55 °C |
| Poff | 10 W | 10 W |
| РТО | 10 W | 10 W |
| PSB | 10 W | 10 W |
| PCK | 0 W | o w |
| Supplementary Heater: Type of energy input | electricity | electricity |
| Supplementary Heater: PSUP | 1.20 kW | 1.00 kW |
| Annual energy consumption Qhe | 2284 kWh | 2886 kWh |



Model: SUHZ-SW45VA(H) + EHST20D-VM*C2

| General Data | | |
|--------------|-------------|--|
| Power supply | 1x230V 50Hz | |

Heating

| EN 14511-2 | | |
|------------------------|--------------------|--|
| | Medium temperature | |
| Heat output | 4.70 kW | |
| El input | 1.74 kW | |
| СОР | 2.70 | |
| Indoor water flow rate | 0.51 m³/h | |

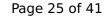
| EN 14511-4 | | |
|--|--------|--|
| Shutting off the heat transfer medium flow | passed | |
| Complete power supply failure | passed | |
| Defrost test | passed | |
| Starting and operating test | passed | |



 $$\operatorname{\textit{Page}}\xspace$ 24 of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| EN 12102-1 | | |
|---------------------------|--------------------|--|
| | Medium temperature | |
| Sound power level indoor | 40 dB(A) | |
| Sound power level outdoor | 61 dB(A) | |

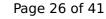
| | EN 14825 |
|---------------|--------------------|
| | Medium temperature |
| η_{s} | 126 % |
| Prated | 4.60 kW |
| SCOP | 3.22 |
| biv | -7 °C |
| ГОЬ | -15 °C |
| Pdh Tj = -7°C | 4.10 kW |
| COP Tj = -7°C | 1.78 |
| dh | 0.97 |
| dh Tj = +2°C | 2.50 kW |
| COP Tj = +2°C | 3.29 |
| Cdh | 0.97 |
| rdh Tj = +7°C | 3.10 kW |
| COP Tj = +7°C | 4.40 |
| Cdh | 0.97 |





| This information was generated by the Fire KETMANK database on 17 Dec 202 | | | |
|---|-------------|--|--|
| Pdh Tj = 12°C | 2.80 kW | | |
| COP Tj = 12°C | 6.71 | | |
| Cdh | 0.97 | | |
| Pdh Tj = Tbiv | 4.10 kW | | |
| COP Tj = Tbiv | 1.78 | | |
| Pdh Tj = TOL | 2.70 kW | | |
| COP Tj = TOL | 1.27 | | |
| WTOL | 55 °C | | |
| Poff | 10 W | | |
| РТО | 10 W | | |
| PSB | 10 W | | |
| PCK | 0 W | | |
| Supplementary Heater: Type of energy input | electricity | | |
| Supplementary Heater: PSUP | 1.00 kW | | |
| Annual energy consumption Qhe | 2886 kWh | | |
| | | | |

Domestic Hot Water (DHW)





| EN 16147 | | |
|---------------------------------|------------|--|
| Declared load profile | L | |
| Efficiency ηDHW | 159 % | |
| СОР | 3.78 | |
| Heating up time | 2:34 h:min | |
| Reference hot water temperature | 52.5 °C | |
| Mixed water at 40°C | 281 I | |
| Standby power input | 23.0 W | |



Model: SUHZ-SW45VA(H) + ERSD-VM*C

| General Data | | |
|--------------|-------------|--|
| Power supply | 1x230V 50Hz | |

Heating

| EN 14511-2 | | |
|------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Heat output | 4.10 kW | 4.70 kW |
| El input | 0.80 kW | 1.74 kW |
| СОР | 5.10 | 2.70 |
| Indoor water flow rate | 0.71 m³/h | 0.51 m³/h |

| EN 14511-4 | | |
|--|--------|--|
| Shutting off the heat transfer medium flow | passed | |
| Complete power supply failure | passed | |
| Defrost test | passed | |
| Starting and operating test | passed | |



| EN 12102-1 | | |
|---------------------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Sound power level indoor | 40 dB(A) | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) | 61 dB(A) |

| EN 14825 | | |
|---------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| η_{s} | 174 % | 128 % |
| Prated | 5.00 kW | 4.60 kW |
| SCOP | 4.43 | 3.28 |
| Tbiv | -7 °C | -7 °C |
| TOL | -15 °C | -15 °C |
| Pdh Tj = -7°C | 4.40 kW | 4.10 kW |
| COP Tj = -7°C | 2.82 | 1.78 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +2°C | 2.70 kW | 2.50 kW |
| COP Tj = +2°C | 4.41 | 3.29 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = +7°C | 3.30 kW | 3.10 kW |
| COP Tj = +7°C | 5.48 | 4.40 |
| Cdh | 0.97 | 0.97 |



 $$\operatorname{\textit{Page}}\xspace$ 29 of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| Pdh Tj = 12°C | 2.50 kW | 2.80 kW |
|--|-------------|-------------|
| COP Tj = 12°C | 8.60 | 6.71 |
| Cdh | 0.97 | 0.97 |
| Pdh Tj = Tbiv | 4.40 kW | 4.10 kW |
| COP Tj = Tbiv | 2.82 | 1.78 |
| Pdh Tj = TOL | 2.70 kW | 2.70 kW |
| COP Tj = TOL | 1.21 | 1.27 |
| WTOL | 55 °C | 55 °C |
| Poff | 10 W | 10 W |
| РТО | 10 W | 10 W |
| PSB | 10 W | 10 W |
| PCK | o w | o w |
| Supplementary Heater: Type of energy input | electricity | electricity |
| Supplementary Heater: PSUP | 1.20 kW | 1.00 kW |
| Annual energy consumption Qhe | 2284 kWh | 2886 kWh |



Model: SUHZ-SW45VA(H) + ERST20D-M*C

| General Data | | |
|--------------|-------------|--|
| Power supply | 1x230V 50Hz | |

Heating

| EN 14511-2 | | |
|------------------------|--------------------|--|
| | Medium temperature | |
| Heat output | 4.70 kW | |
| El input | 1.74 kW | |
| СОР | 2.70 | |
| Indoor water flow rate | 0.51 m³/h | |

| EN 14511-4 | | |
|--|--------|--|
| Shutting off the heat transfer medium flow | passed | |
| Complete power supply failure | passed | |
| Defrost test | passed | |
| Starting and operating test | passed | |



 $$\operatorname{\textit{Page}}\ 31$$ of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| EN 12102-1 | |
|---------------------------|--------------------|
| | Medium temperature |
| Sound power level indoor | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) |

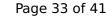
| EN 14825 | |
|------------------------|--------------------|
| | Medium temperature |
| η_{s} | 128 % |
| Prated | 4.60 kW |
| SCOP | 3.28 |
| Tbiv | -7 °C |
| TOL | -15 °C |
| Pdh Tj = -7°C | 4.10 kW |
| COP Tj = -7°C | 1.78 |
| Cdh | 0.97 |
| Pdh Tj = +2°C | 2.50 kW |
| COP Tj = +2°C | 3.29 |
| Cdh | 0.97 |
| Pdh Tj = +7°C | 3.10 kW |
| $COP Tj = +7^{\circ}C$ | 4.40 |
| Cdh | 0.97 |
| | |



| The information was generated by the | |
|--|-------------|
| Pdh Tj = 12°C | 2.80 kW |
| COP Tj = 12°C | 6.71 |
| Cdh | 0.97 |
| Pdh Tj = Tbiv | 4.10 kW |
| COP Tj = Tbiv | 1.78 |
| Pdh Tj = TOL | 2.70 kW |
| COP Tj = TOL | 1.27 |
| WTOL | 55 °C |
| Poff | 10 W |
| РТО | 10 W |
| PSB | 10 W |
| PCK | o w |
| Supplementary Heater: Type of energy input | electricity |
| Supplementary Heater: PSUP | 1.00 kW |
| Annual energy consumption Qhe | 2886 kWh |

Domestic Hot Water (DHW)

CEN heat pump KEYMARK





| EN 16147 | |
|---------------------------------|------------|
| Declared load profile | L |
| Efficiency ηDHW | 115 % |
| СОР | 2.72 |
| Heating up time | 2:38 h:min |
| Standby power input | 36.0 W |
| Reference hot water temperature | 51.8 °C |
| Mixed water at 40°C | 278 |



Model: SUHZ-SW45VA(H) + ERST20D-VM*C

| General Data | |
|--------------|-------------|
| Power supply | 1x230V 50Hz |

Heating

| EN 14511-2 | |
|------------------------|--------------------|
| | Medium temperature |
| Heat output | 4.70 kW |
| El input | 1.74 kW |
| СОР | 2.70 |
| Indoor water flow rate | 0.51 m³/h |

| EN 14511-4 | |
|--|--------|
| Shutting off the heat transfer medium flow | passed |
| Complete power supply failure | passed |
| Defrost test | passed |
| Starting and operating test | passed |



| EN 12102-1 | |
|---------------------------|--------------------|
| | Medium temperature |
| Sound power level indoor | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) |

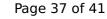
| EN 14825 | |
|--------------|--------------------|
| | Medium temperature |
| ls | 128 % |
| rated | 4.60 kW |
| СОР | 3.28 |
| piv | -7 °C |
| DL | -15 °C |
| dh Tj = -7°C | 4.10 kW |
| OP Tj = -7°C | 1.78 |
| lh | 0.97 |
| n Tj = +2°C | 2.50 kW |
| P Tj = +2°C | 3.29 |
| h | 0.97 |
| h Tj = +7°C | 3.10 kW |
| P Tj = +7°C | 4.40 |
| h | 0.97 |





| Pdh Tj = 12°C | 2.80 kW |
|--|-------------|
| COP Tj = 12°C | 6.71 |
| Cdh | 0.97 |
| Pdh Tj = Tbiv | 4.10 kW |
| COP Tj = Tbiv | 1.78 |
| Pdh Tj = TOL | 2.70 kW |
| COP Tj = TOL | 1.27 |
| WTOL | 55 °C |
| Poff | 10 W |
| РТО | 10 W |
| PSB | 10 W |
| PCK | o w |
| Supplementary Heater: Type of energy input | electricity |
| Supplementary Heater: PSUP | 1.00 kW |
| Annual energy consumption Qhe | 2886 kWh |

Domestic Hot Water (DHW)





| EN 16147 | |
|---------------------------------|------------|
| Declared load profile | L |
| Efficiency ηDHW | 115 % |
| СОР | 2.72 |
| Heating up time | 2:38 h:min |
| Standby power input | 36.0 W |
| Reference hot water temperature | 51.8 °C |
| Mixed water at 40°C | 278 |



Model: SUHZ-SW45VA(H) + ERST20D-VM*C2

| General Data | |
|--------------------------|--|
| Power supply 1x230V 50Hz | |

Heating

| EN 14511-2 | |
|------------------------|--------------------|
| | Medium temperature |
| Heat output | 4.70 kW |
| El input | 1.74 kW |
| СОР | 2.70 |
| Indoor water flow rate | 0.51 m³/h |

| EN 14511-4 | |
|--|--------|
| Shutting off the heat transfer medium flow | passed |
| Complete power supply failure | passed |
| Defrost test | passed |
| Starting and operating test | passed |



| EN 12102-1 | |
|---------------------------|--------------------|
| | Medium temperature |
| Sound power level indoor | 40 dB(A) |
| Sound power level outdoor | 61 dB(A) |

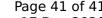
| EN 14825 | | |
|------------------------|--------------------|--|
| | Medium temperature | |
| s | 128 % | |
| rated | 4.60 kW | |
| СОР | 3.28 | |
| biv | -7 °C | |
| OL | -15 °C | |
| dh Tj = -7°C | 4.10 kW | |
| COP Tj = -7°C | 1.78 | |
| Cdh | 0.97 | |
| dh Tj = +2°C | 2.50 kW | |
| COP Tj = +2°C | 3.29 | |
| Cdh | 0.97 | |
| dh Tj = +7°C | 3.10 kW | |
| $COP Tj = +7^{\circ}C$ | 4.40 | |
| Cdh | 0.97 | |
| un | 0.9 | |





| This information has generated by the | |
|--|-------------|
| Pdh Tj = 12°C | 2.80 kW |
| COP Tj = 12°C | 6.71 |
| Cdh | 0.97 |
| Pdh Tj = Tbiv | 4.10 kW |
| COP Tj = Tbiv | 1.78 |
| Pdh Tj = TOL | 2.70 kW |
| COP Tj = TOL | 1.27 |
| WTOL | 55 °C |
| Poff | 10 W |
| РТО | 10 W |
| PSB | 10 W |
| PCK | o w |
| Supplementary Heater: Type of energy input | electricity |
| Supplementary Heater: PSUP | 1.00 kW |
| Annual energy consumption Qhe | 2886 kWh |

Domestic Hot Water (DHW)





$$\operatorname{Page}\ 41$$ of 41 This information was generated by the HP KEYMARK database on 17 Dec 2020

| EN 16147 | | |
|---------------------------------|------------|--|
| Declared load profile | L | |
| Efficiency ηDHW | 159 % | |
| СОР | 3.78 | |
| Heating up time | 2:34 h:min | |
| Standby power input | 23.0 W | |
| Reference hot water temperature | 52.5 °C | |
| Mixed water at 40°C | 281 I | |