

This information was generated by the HP KEYMARK database on 22 Jun 2022

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| | | | |
|---------------------|---|----------|----------------|
| Summary of | Ecodan Zubadan 14-300D AA | Reg. No. | 037-0028-20 |
| 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) | | |
| Subtype title | Ecodan Zubadan 14-300D AA | | |
| Heat Pump Type | Outdoor Air/Water | | |
| Refrigerant | R32 | | |
| Mass of Refrigerant | 1.7 kg | | |
| Certification Date | 06.10.2020 | | |
| Testing basis | HP Keymark scheme rules rev. no. 6 | | |

Model: PUD-SHWM140VAA(-BS) + E*ST30D-*M*D

| Configure model | |
|-------------------------------------|------------------------------------|
| Model name | PUD-SHWM140VAA(-BS) + E*ST30D-*M*D |
| Application | Heating + DHW + low temp |
| Units | Indoor + Outdoor |
| Climate Zone | n/a |
| Reversibility | No |
| Cooling mode application (optional) | n/a |

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

Heating

| EN 14511-2 | | |
|-------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Heat output | 12 kW | 12 kW |
| El input | 2.55 kW | 4.9 kW |
| COP | 4.7 | 2.45 |

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

Average Climate

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EN 12102-1

| | Low temperature | Medium temperature |
|---------------------------|-----------------|--------------------|
| Sound power level indoor | 41 dB(A) | 41 dB(A) |
| Sound power level outdoor | 62 dB(A) | 62 dB(A) |

EN 14825

| | Low temperature | Medium temperature |
|----------------|-----------------|--------------------|
| η_s | 179 % | 134 % |
| Prated | 14 kW | 14 kW |
| SCOP | 4.54 | 3.43 |
| Tbiv | -10 °C | -10 °C |
| TOL | -28 °C | -28 °C |
| Pdh Tj = -7°C | 12.4 kW | 12.4 kW |
| COP Tj = -7°C | 2.76 | 2.15 |
| Cdh Tj = -7 °C | 1 | 1 |
| Pdh Tj = +2°C | 7.6 kW | 7.5 kW |
| COP Tj = +2°C | 4.3 | 3.15 |
| Cdh Tj = +2 °C | 0.99 | 0.99 |
| Pdh Tj = +7°C | 5.2 kW | 6.3 kW |
| COP Tj = +7°C | 6.27 | 4.96 |
| Cdh Tj = +7 °C | 0.98 | 0.99 |

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| | | |
|---|-------------|-------------|
| Pdh Tj = 12°C | 5.4 kW | 4 kW |
| COP Tj = 12°C | 9 | 6.9 |
| Cdh Tj = +12 °C | 0.98 | 0.97 |
| Pdh Tj = Tbiv | 14 kW | 14 kW |
| COP Tj = Tbiv | 2.69 | 1.8 |
| Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh | 14 kW | 14 kW |
| COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh | 2.69 | 1.8 |
| WTOL | 60 °C | 60 °C |
| Poff | 15 W | 15 W |
| PTO | 15 W | 15 W |
| PSB | 15 W | 15 W |
| PCK | 0 W | 0 W |
| Supplementary Heater: Type of energy input | Electricity | Electricity |
| Supplementary Heater: PSUP | 0 kW | 0 kW |
| Annual energy consumption Qhe | 6367 kWh | 8421 kWh |

Domestic Hot Water (DHW)

Average Climate

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| EN 16147 | |
|---------------------------------|-------------|
| Declared load profile | XL |
| Efficiency η_{DHW} | 121 % |
| COP | 2.91 |
| Heating up time | 02:15 h:min |
| Standby power input | 42 W |
| Reference hot water temperature | 52.5 °C |
| Mixed water at 40°C | 417 l |

Model: PUD-SHWM140VAA(-BS) + E*ST30D-M*D

| Configure model | |
|-------------------------------------|-----------------------------------|
| Model name | PUD-SHWM140VAA(-BS) + E*ST30D-M*D |
| Application | Heating + DHW + low temp |
| Units | Indoor + Outdoor |
| Climate Zone | n/a |
| Reversibility | No |
| Cooling mode application (optional) | n/a |

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

Heating

| EN 14511-2 | | |
|-------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Heat output | 12 kW | 12 kW |
| El input | 2.55 kW | 4.9 kW |
| COP | 4.7 | 2.45 |

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

Average Climate

EN 12102-1

| | Low temperature | Medium temperature |
|---------------------------|-----------------|--------------------|
| Sound power level indoor | 41 dB(A) | 41 dB(A) |
| Sound power level outdoor | 62 dB(A) | 62 dB(A) |

EN 14825

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|----------------|-----------------|--------------------|
| η_s | 179 % | 134 % |
| Prated | 14 kW | 14 kW |
| SCOP | 4.54 | 3.43 |
| Tbiv | -10 °C | -10 °C |
| TOL | -28 °C | -28 °C |
| Pdh Tj = -7°C | 12.4 kW | 12.4 kW |
| COP Tj = -7°C | 2.76 | 2.15 |
| Cdh Tj = -7 °C | 1 | 1 |
| Pdh Tj = +2°C | 7.6 kW | 7.5 kW |
| COP Tj = +2°C | 4.3 | 3.15 |
| Cdh Tj = +2 °C | 0.99 | 0.99 |
| Pdh Tj = +7°C | 5.2 kW | 6.3 kW |
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| WTOL | 60 °C | 60 °C |
| Poff | 15 W | 15 W |
| PTO | 15 W | 15 W |
| PSB | 15 W | 15 W |
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| Supplementary Heater: Type of energy input | Electricity | Electricity |
| Supplementary Heater: PSUP | 0 kW | 0 kW |
| Annual energy consumption Qhe | 6367 kWh | 8421 kWh |

Domestic Hot Water (DHW)

Average Climate

| EN 16147 | |
|---------------------------------|-------------|
| Declared load profile | XL |
| Efficiency η_{DHW} | 121 % |
| COP | 2.91 |
| Heating up time | 02:15 h:min |
| Standby power input | 42 W |
| Reference hot water temperature | 52.5 °C |
| Mixed water at 40°C | 417 l |

Model: PUD-SHWM140YAA(-BS) + E*ST30D-*M*D

| Configure model | |
|-------------------------------------|------------------------------------|
| Model name | PUD-SHWM140YAA(-BS) + E*ST30D-*M*D |
| Application | Heating + DHW + low temp |
| Units | Indoor + Outdoor |
| Climate Zone | n/a |
| Reversibility | No |
| Cooling mode application (optional) | n/a |

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

Heating

| EN 14511-2 | | |
|-------------|-----------------|--------------------|
| | Low temperature | Medium temperature |
| Heat output | 12 kW | 12 kW |
| El input | 2.55 kW | 4.9 kW |
| COP | 4.7 | 2.45 |

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

Average Climate

EN 12102-1

| | Low temperature | Medium temperature |
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| Sound power level indoor | 41 dB(A) | 41 dB(A) |
| Sound power level outdoor | 62 dB(A) | 62 dB(A) |

EN 14825

| | Low temperature | Medium temperature |
|----------------|-----------------|--------------------|
| η_s | 177 % | 134 % |
| Prated | 14 kW | 14 kW |
| SCOP | 4.51 | 3.42 |
| Tbiv | -10 °C | -10 °C |
| TOL | -28 °C | -28 °C |
| Pdh Tj = -7°C | 12.4 kW | 12.4 kW |
| COP Tj = -7°C | 2.76 | 2.15 |
| Cdh Tj = -7 °C | 1 | 1 |
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| WTOL | 60 °C | 60 °C |
| Poff | 22 W | 22 W |
| PTO | 22 W | 22 W |
| PSB | 22 W | 22 W |
| PCK | 0 W | 0 W |
| Supplementary Heater: Type of energy input | Electricity | Electricity |
| Supplementary Heater: PSUP | 0 kW | 0 kW |
| Annual energy consumption Qhe | 6416 kWh | 8455 kWh |

Domestic Hot Water (DHW)

Average Climate

| EN 16147 | |
|---------------------------------|-------------|
| Declared load profile | XL |
| Efficiency η_{DHW} | 121 % |
| COP | 2.91 |
| Heating up time | 02:15 h:min |
| Standby power input | 42 W |
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| Climate Zone | n/a |
| Reversibility | No |
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| General Data | |
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| Power supply | 3x400V 50Hz |

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