

Samsung "Wind-Free™2.0", wall mounted evaporator, split system

Job Name

Purchaser

Submitted to

Unit Designation

Location

Engineer

Reference

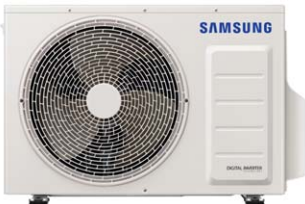
Approval

Construction

Schedule #

Specifications

|                        |   |  |                               |
|------------------------|---|--|-------------------------------|
| Model                  | US Code                                 | Indoor Unit  | RNS09ABT                      |
|                        |   | Outdoor Unit   | RXS09ABT                      |
|                        | Model Number                            | Indoor Unit  | AR09TSFABWKNCV                |
|                        |   | Outdoor Unit   | AR09TSFABWKXCV                |
| Performance            | Nominal Capacity <sup>1</sup>           | Cooling / Heating (Btu/h)  | 9,000 / 11,000                |
|                        | Capacity Range                          | Cooling (Btu/h)  | 3,000 - 13,000                |
|                        |   | Heating (Btu/h)  | 2,400 - 21,000                |
|                        | SEER / EER                              |  | 24.5 / 15.5                   |
|                        | COP                                     | Nominal Heating  | 4.40                          |
|                        | HSPF                                    |  | 12.5                          |
| Power                  | AHRI Reference Number                   |  | 205132630                     |
|                        | Voltage                                 | ø / V / Hz   | 1 / 208-230 / 60              |
|                        | Working Voltage Range (VAC)             |  | 176 - 254                     |
|                        | Operating Current (Min./Std./Max.)      | Cooling (A)  | 1.0 / 2.8 / 5.2               |
|                        |   | Heating (A)  | 1.0 / 3.4 / 9.8               |
|                        | Max. Breaker                            | Amps   | 20                            |
| Dimensions             | Min. Circuit Ampacity (A)               |  | 12                            |
|                        | W X H X D (in.)                         | Indoor Unit  | 35 X 11 3/4 X 8 7/16          |
|                        |   | Outdoor Unit   | 31 1/8 X 21 9/16 X 11 1/4     |
|                        | Weight (lbs.)                           | Indoor Unit  | 23.4                          |
|                        |   | Outdoor Unit   | 70.8                          |
|                        | Condensate Connection                   |  | 11/16" OD                     |
| Sound Pressure Level   | Indoor Unit                             | Low / High (dB)  | 22 / 38                       |
|                        | Outdoor Unit                            | High (dB)  | 45                            |
| Operating Temperatures | Outdoor                                 | Cooling  | 14° ~ 115°F (-10° ~ 46.1°C)   |
|                        |   | Heating  | -5° ~ 75°F (-20.5° ~ 23.9°C)  |
|                        | Indoor                                  | Cooling  | 61° ~ 90°F (16° ~ 32°C)       |
|                        |   | Heating  | 81°F (27°C) or less           |
| Pipe Connections       | Indoor & Outdoor                        | High side (flare)  | 1/4"                          |
|                        |   | Low side (flare)   | 3/8"                          |
|                        | Maximum / Minimum Line Set Length (ft.) |  | 66 / 9.8                      |
|                        | Maximum Vertical Separation (ft.)       |  | 49                            |
| Refrigerant            | Type                                    |  | R410A                         |
|                        | Control Method                          |  | Electronic Expansion Valve    |
|                        | Factory Charge                          | oz.  | 40.6                          |
|                        | Charged for                             |  | 25 feet                       |
| Compressor             | Additional Refrigerant                  |  | 0.16 oz. / ft. over 25 ft.    |
|                        | Manufacturer                            |  | Samsung                       |
|                        | Type                                    | BLDC Rotary  |                               |
|                        |   | 9  |                               |
| Evaporator Fan         | Type                                    | BLDC motor with cross-flow fan   |                               |
|                        | Air Volume                              | Cooling (CFM)  | 251 / 304 / 357 / 392         |
|                        | (L/M/H/Turbo)                           | Heating (CFM)  | 286 / 339 / 392 / 427         |
|                        | Consumption                             | Watts  | 27 X 1                        |
|                        | FLA                                     | Amps   | 0.12                          |
| Condenser Fan          | Motor                                   |  | BLDC motor with axial fan (1) |
|                        | Output                                  | Watts  | 40                            |
|                        | FLA                                     | Amps   | 0.18                          |
|                        | Air Volume                              | CFM (max.)   | 1,589                         |
| Safety                 | Certifications ETL (UL 1995)            |  |                               |
|                        | Devices                                 | PCB fuses, indoor unit terminal block thermal fuse, current transformer, over-voltage protection, crankcase heating, temperature limit protection logic, compressor overload sensing |                               |



(actual equipment appearance may vary)

General Information

- The indoor unit shall feature "Wind-Free™" mode\*. In cooling mode, as room temperature nears set temperature, the unit will close its louver and will disperse air into the space through thousands of micro-holes on the front of the indoor unit preventing cold air drafts on occupants.
- The indoor unit shall have Wi-Fi capability as standard
- Outdoor unit shall provide 208/230V power to indoor unit via 14 AWG X 3 interconnect power cable

Construction

- Indoor unit chassis shall be UL94 V0 with a galvanized steel mounting bracket
- The indoor unit shall have easy-access to wire, pipe, and drain connections via access panel on the bottom of the unit for simple installation and service
- The outdoor unit shall be galvanized steel with a baked on powder coated finish for durability

Heat Exchanger

- The heat exchangers shall be mechanically bonded fin to copper tube

Refrigerant System

- The compressor shall be hermetically sealed, inverter controlled, BLDC Rotary
- Refrigerant flow shall be controlled by an electronic expansion valve at the outdoor unit

Indoor Fan

- The indoor fan shall be a single, antibacterial cross-flow type
- Three fan speed settings and auto setting
- Automatic (motorized) vertical swing (up/down) and horizontal swing (left/right) louvers

Controls

- The system shall have a built in Wi-Fi adapter as standard to allow control and monitoring using the Samsung SmartThings app (Android, iOS)
- Dual set temperature support when connected to MWR-WG00UN Advanced Wired Controller.
- The indoor unit shall have a simple connection for overflow detection devices or any other normally closed contact for simple unit shutdown
- The indoor unit shall ship with a wireless controller, holder, and batteries
- Wired controller options available
- Samsung central control compatible (MIM-R10UN accessory required)

Convenience

- System energy consumption can be viewed using the Samsung SmartThings mobile app or on the indoor unit display using the included wireless controller\*\*
- AI (artificial intelligence) Auto Mode technology monitors factors such as indoor temperature, outdoor temperature, set temperature, and operating time to learn the patterns within your home to automatically adjust system operation to maximize occupant comfort and efficiency (Wi-Fi connection required)
- Eco Mode to reduce energy consumption during low demand operation
- Smart install mode - startup system diagnostics operation to ensure system readiness during initial operation
- Auto restart
- Auto Clean Function
- 7-segment digital display on front of unit to display temperature and unit status
- "Fast" mode to quickly reach set temperature
- Auto changeover
- Good sleep mode
- Quiet mode
- Dry mode
- Simple ON/OFF time function – Using the wireless controller specify the ON and/or OFF times
- Electro-static, washable, main filter as standard accessible from the top of unit
- Filter cleaning reminder

<sup>1</sup> Certified in accordance with the AHRI Unitary Small Air-Source Heat Pumps (USHP) Certification Program which is based on the latest edition of AHRI Standard 210/240.

Proper sizing and installation of equipment is critical to achieve optimal performance. Split system air conditioners and heat pumps (excluding ductless systems) must be matched with appropriate coil components to meet ENERGY STAR criteria. Ask your contractor for details or visit [www.energystar.gov](http://www.energystar.gov).

\*The Wind-Free™ unit delivers an air current that is under 0.15 m/s while in Wind-Free™ mode. Air velocity that is below 0.15 m/s is considered "still air" as defined by ASHRAE (American Society of Heating, Refrigerating, and Air-Conditioning Engineers).

Samsung HVAC maintains a policy of ongoing development, specifications are subject to change without notice. Refer to [www.AHRIdirectory.org](http://www.AHRIdirectory.org) for current reference numbers.



Optional Accessories

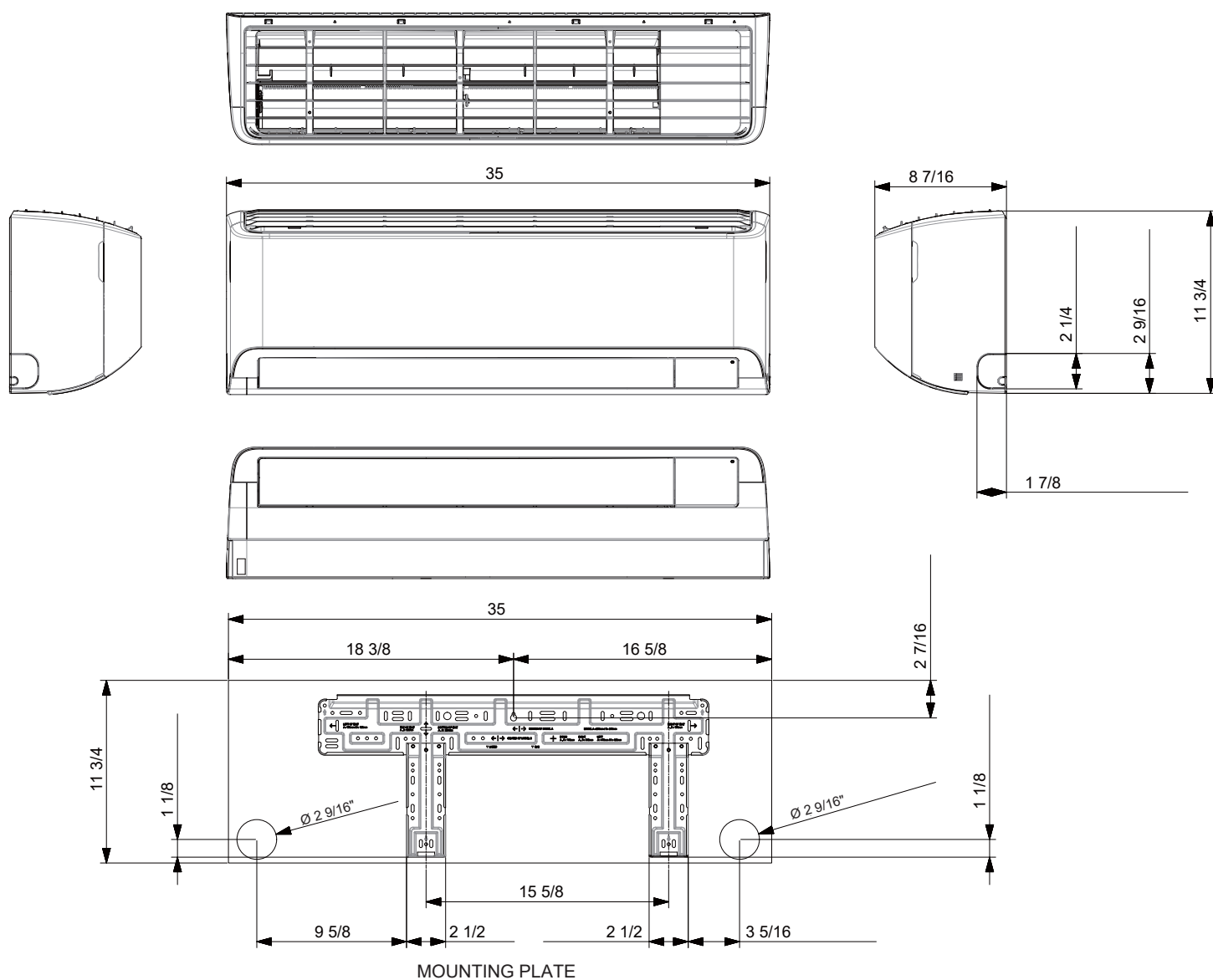
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|--|-------------------|---------------------|
| Condensate pump  | Aspen Mini Orange | ASP-MO-UNIV 110-250 |
|  | Blue Diamond      | BD-BLUE-230         |
| Wired controller <sup>1</sup>                                  | Advanced          | MWR-WG00UN          |
|  | Simple Touch      | MWR-SH11UN          |
| Wired controller sub-PCB                                       |                   | MIM-A00UN           |
| External temperature sensor                                    |                   | MRW-TA              |
| Central control interface module                               |                   | MIM-R10UN           |
| External contact control interface module <sup>2</sup>         |                   | MIM-B14             |
| Line sets - insulated and flared, interconnect cables included | 25' - ILS2506     |                     |
|  | 50' - ILS5006     |                     |
| Wall bracket (for outdoor unit)                                |                   | CKN-250             |

<sup>1</sup> Sub-PCB model MIM-A00UN is required when connecting optional wired controllers

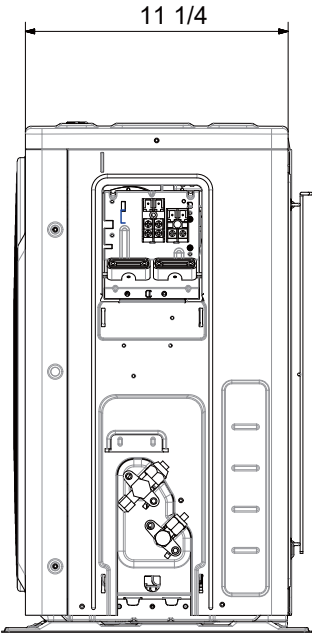
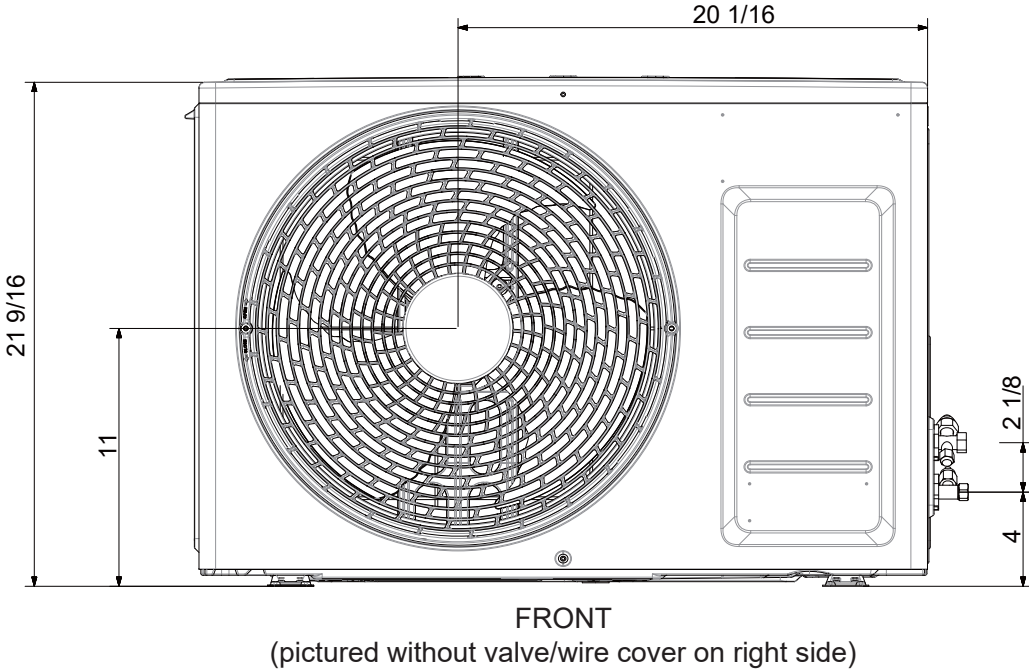
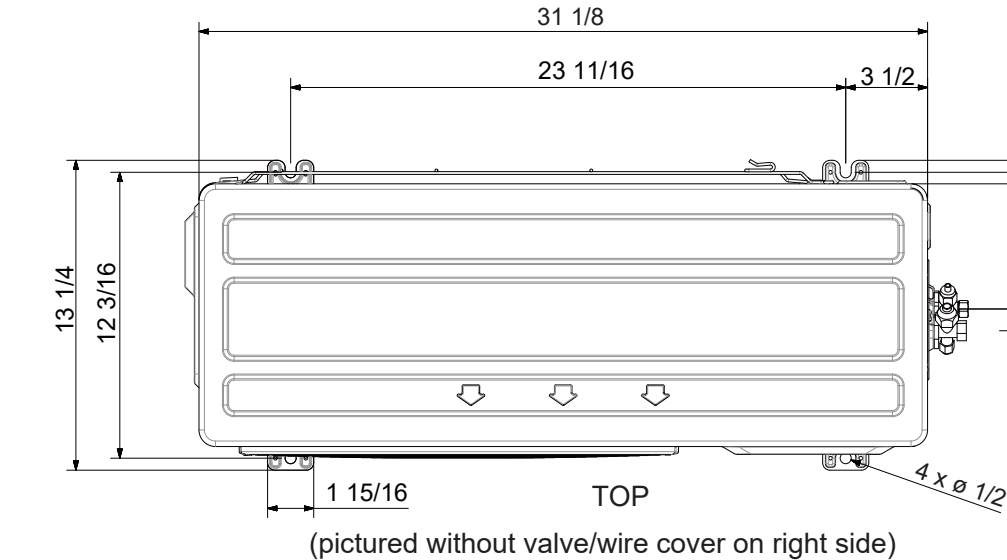
<sup>2</sup> When applying MIM-B14 external contact control interface module, MIM-A00UN wired controller sub-PCB is required.

Samsung "Wind-Free™2.0", wall mounted evaporator, split system  
Indoor unit dimensional drawing

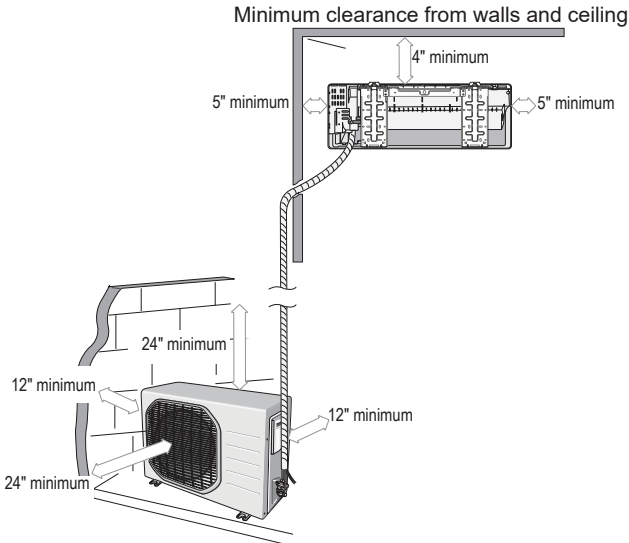
Unit: inches



Unit: inches



For reference only. Always refer to installation manual for complete details.



Basic power and communication wiring between indoor and outdoor units

