

# Room Air Conditioners

Kühl® | Kühl®+

**Commercial grade durability**

with smart options to conserve energy and reduce your energy bill.



Wi-Fi  
ENABLED



**FRIEDRICH**

1883



THE EXPERTS IN ROOM AIR CONDITIONING

# Kühl® | Kühl®+

## ULTRA PREMIUM ROOM AIR CONDITIONERS

Commercial grade durability and more ways to save energy than any other room air conditioner.



Wi-Fi  
ENABLED

### Superior construction

Kühl incorporates high-end materials like heavy-gauge galvanized steel, rifled copper tubing, and high-tech aluminum fins.

Kühl also uses the most durable components to extend the life of your air conditioner, including fully-enclosed fan motors that seal out dirt, and powerful, energy-efficient compressors, which make it as tough an air conditioner as we've ever built.

### Quiet by design

Kühl has been engineered for quiet operation. Component materials have been chosen because of their sound-absorption properties and every moving part has been braced and insulated.

Extra thick rubber grommets absorb vibration and reduce noise inside, while steel inner walls and extra dense insulation block outdoor noise.

Rugged hardboard side panels help reduce noise and keep out light. The unique air path is more streamlined, drawing air through the sides, away from moving parts. Our larger discharge vents allow for smoother airflow, delivering maximum conditioned air quietly.

### Wi-Fi control

With the FriedrichLink® Wi-Fi accessory you can remotely set programs, adjust temperatures and turn units off and on.

- Control Kühl with a smartphone, tablet or computer
- Monitor and control one or multiple units remotely
- Connect Kühl\* to a Building Management System
- Kühl\* is Smart Grid capable

FriedrichLink®



\*Wireless thermostat and Building Management Systems are not compatible with Kühl SQ and EQ models.

FITS WINDOWS FROM  
22" TO 42" WIDE



SQ AND EQ MODELS

FITS WINDOWS FROM  
27 3/8" TO 42" WIDE



# Features

## Comfort & Convenience

- 2 ready-to-go 7-day energy management programs
- Create customizable, 7-day schedules with up to 4 setting changes per day (requires accessory, sold separately)
- 24-hour timer
- Up to 4 cooling and 4 fan-only speeds on select models†
- Auto fan adjusts the fan speed to maintain the set temperature
- Auto-changeover from cool to heat; heat to cool to maintain set temperature (Kühl+ models except EQ08)
- Auto restart after power interruption
- 8-way air flow control for better air distribution
- Unit displays set temperature
- Control panel lockout (ON/OFF)
- LCD panel auto dims if not in use
- Nightlight mode

## Reduced Sound Levels

- Steel inner wall and extra dense insulation materials block outdoor noise
- Vibration isolating design and components diminish traditional operating noise
- Precision engineering delivers maximum air flow and air dispersion at low sound levels



SLEEVE SIZES HAVE REMAINED UNCHANGED FOR OVER 30 YEARS

## Superior Filtration

- Superior fresh air intake and stale air exhaust vent (Q chassis stale air exhaust only)
- Washable, antimicrobial air filter
- Check filter reminder
- Optional premium filter when used in conjunction with standard filter provides superior air filtration with ratings as high as MERV 6, while also adsorbing odors and reducing ozone and VOCs
- Hinged door allows easy filter access for easier maintenance

## Durable

- Robust 20 gauge steel cabinet
- Solid-sleeve top keeps out falling debris\*
- Solid-steel blower housing offers enhanced protection
- Totally enclosed commercial grade fan motor runs at a lower temperature to prevent overheating and is double-mounted for added stability and reduced wear
- Durable base pan and steel inner walls
- Aluminum end plates will not contribute to rust-stained building exteriors
- Scratch-resistant cabinet
- High-tech aluminum fins with rifled copper tubing are more efficient and less prone to corrosion
- Product packaging meets ISTA standards to withstand rough handling in transportation



### ULTRA PREMIUM LCD REMOTE

Select MODE, FAN SPEED, MONEY SAVER®, AUTO AIR SWEEP\*, adjust TEMPERATURE and set the TIMER.

## Installation

- Install in a window or thru-the-wall
- Slideout chassis for more permanent installation and easier access for maintenance
- Includes heavy duty window installation hardware (optional accessory on Kühl+ models sold separately)
- Rugged hardboard side panels for a more permanent installation (heavy duty side curtains on SQ and EQ models)
- Power cord can run either left or right
- Firm grip handles for easier chassis installation and removal
- Front cover attaches easily and securely. Nut driver included\*\*.

## Earth Friendly

- Smart Grid capable
- Auto Fan mode saves money by only running the fan when the compressor is running
- ENERGY STAR® qualified models, including heat pumps
- Environmentally-friendly R-410A refrigerant used in all models
- Recyclable packaging
- RoHS compliant

## Safety & Security

- EntryGuard™ anti-intrusion protection-steel retaining wire secures the chassis to the sleeve to deter 'kick-in' intrusion
- Powercord leakage current protected
- Insect barrier\*
- Aluminum rear grille protects the outdoor coil from damaging debris and vandalism

\* Feature not available on Kühl SQ and EQ models. \*\*Nut driver not required for Kühl SQ and EQ models.

† Kühl SQ and SL models have 3 fan speeds. Kühl+ models have 3 fan speeds cooling and heating.



# Accessories

## FriedrichLink® Wi-Fi Adapter

Connects to unit to allow for remote wireless access and programming from a computer, tablet or mobile device.

Model	Kit No.
N Series	KWIFI



## Premium Carbon Filters

Remove odors and VOCs (volatile organic compounds). Achieve up to a MERV 6 rating when used with standard filter. 3 pack



Model	Kit No.
SQ and EQ	KWCFQ
SS, ES and YS	KWCF5
SM, EM and YM	KWCFM
SL, EL and YL	KWCFL

## Window Mounting Kits: Kühl+

Heavy duty kits required for installation of these Kühl+ models in a window.

Heat/Cool Models	Kit No.
EQ08N11B*	KWIKQ
ES12N33B, ES16N33, YS10N10B and YS12N33B.	KWIKSA
EM18N34 and YM18N34B.	KWIKMA
EL24N35, EL36N35B and YL24N35B.	KWIKLA

\*EQ08N11B window kit KWIKQ does not include window brackets.



KWIKQ



KWIKSA, KWIKMA, KWIKLA

## Wireless Thermostat- KWW\*

One thermostat can control up to 8 Kühl units. Additional units require 1 KCM communication module per unit. KWW Thermostat ships with 1 KCM Communication Module.



## Communication Module- KCM\*

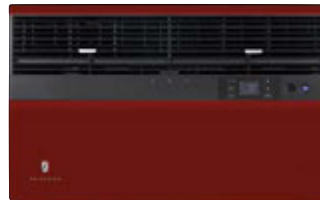
Communicates with KWW thermostat or building management system.

\*Not compatible with Kühl SQ and EQ models.



## Colored Front Covers

Colored front cover kits available. Neutral Gray is standard.



Deep Red shown

Model	C O L O R S					
	Deep Red	Cobalt Blue	Classic Beige	Designer White	Black Onyx	Pink Diamond
SQ and EQ	KWREDQA	KWBLUQA	KWBGEQA	KWWHTQA	KWBLKQA	KWPNKQA
SS, ES and YS	KWREDSA	KWBLSA	KWBGESA	KWWHTSA	KWBLKSA	KWPNKSA
SM, EM and YM	KWREDMA	KWBLSMA	KWBGESMA	KWWHTMA	KWBLKMA	KWPNKMA
SL, EL and YL	KWREDLA	KWBLSLA	KWBGESLA	KWWHTLA	KWBLKLA	KWPNKLA

## Drain Kit

Drain tube field installed to the bottom on the base pan.

Model	Kit No.
All Kühl Series Models	DC2



# INSTALLATION INFORMATION





Sleeve	Height INCHES	Width INCHES	Depth with Front	Shell Depth	Minimum Extension Into Room*	Minimum Extension Outside * INCHES	Window Width INCHES		In-wall Installation Finished Hole INCHES			Carton Dimensions INCHES		
			A	B			Minimum**	Maximum	Height	Width	Max. Depth C	Height	Width	Depth
Q	14 1/4"	19 3/4"	21 3/8"	8 1/2"	5 1/2"	10 3/4"	22"	42"	14 1/2"	20"	8 1/2"	18 1/4"	24 3/8"	26 1/2"
S	15 15/16"	25 15/16"	29"	8 3/4"	5 3/4"	16 15/16"	27 3/8"	42"	16 3/16"	26 3/16"	7 3/8"	19"	29"	34 1/2"
M	17 15/16"	25 15/16"	29"	8 3/4"	5 3/4"	16 15/16"	27 3/8"	42"	18 3/16"	26 3/16"	7 3/8"	21"	29"	34 1/2"
L	20 3/16"	28"	35 1/2"	16 1/2"	5 3/8"	18 15/16"	29 7/8"	42"	20 3/8"	28 1/4"	15 1/8"	24 1/2"	38 7/8"	31 5/8"

\* Minimum extensions when mounted in a window.

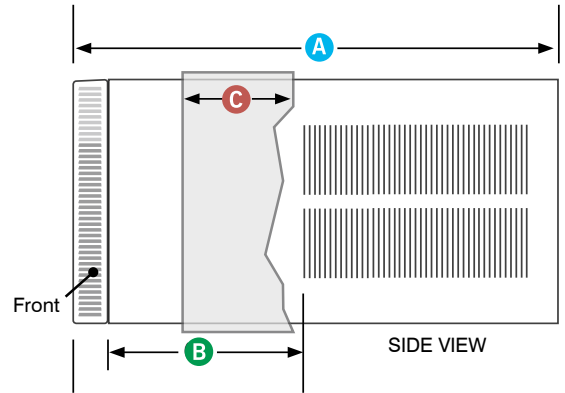
\*\* Minimum widths achieved using one side curtain assembly as opposed to both in a standard installation.

NOTE: S, M and L sleeves may be installed in window with no side kits if properly installed.

## CIRCUIT RATING/ BREAKER

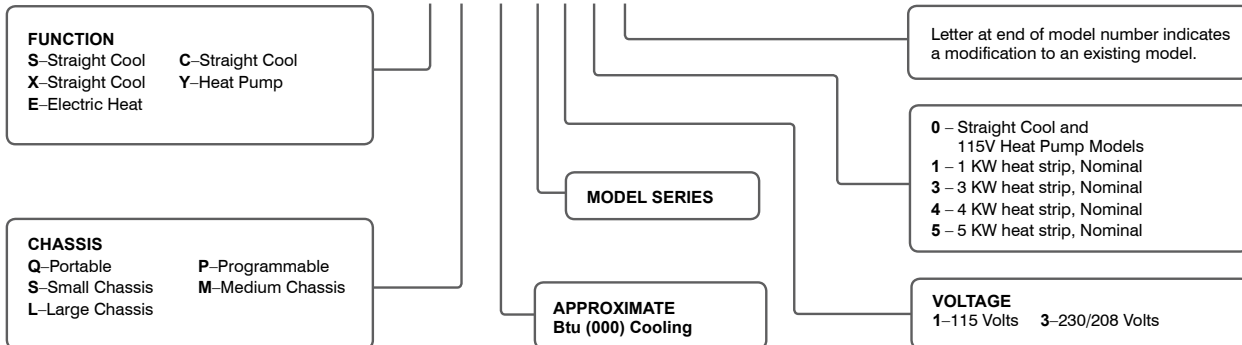
Model	Circuit Rating Breaker or T-D Fuse	Plug Face (NEMA#)	Power Cord Length (ft.)	Wall Outlet Appearance
All SQ MODELS. EQ08N11B. SS08N10B, SS10N10B, SS12N10B and SS14N10B. YS10N10B. SM15N10B.	125V - 15A	5 - 5P	6	
SS12N30B and SS16N30A. SM18N30A and SM21N30B.	250V - 15A	6 - 15P	6	
SM24N30A. SL24N30B and SL28N30B. ES12N33B and ES16N33A. YS12N33B.	250V - 20A	6 - 20P	6	
SL36N30B. EM18N34A. EL24N35 and EL36N35B. YM18N34B and YL24N35B.	250V - 30A	6 - 30P	6	

Sleeve Dimensions Drawing



## ROOM AIR CONDITIONER MODEL IDENTIFICATION GUIDE

### SL28N30B



# SPECIFICATIONS

★ ENERGY STAR® models

Model	Cooling Btu	Heating Btu	Volts Rated	Cooling Amps	Cooling Watts	Heating Amps	Heating Watts	Energy Efficiency Ratio EER	CEER	Estimated Yearly Energy Cost	COP	Moisture Removal-Pints/HR	CFM	Sleeve	Net Wt. lbs.	Ship Wt. lbs.
Kühl®																
★ SQ05N10B	5200	-	115	4.7	464	-	-	11.2	11.0	\$42	-	1.5	190	Q	72	76
★ SQ06N10B	5700	-	115	4.7	509	-	-	11.2	11.0	\$46	-	1.5	190	Q	72	76
★ SQ08N10C	7900	-	115	6.4	705	-	-	11.2	11.2	\$63	-	1.9	200	Q	72	76
★ SS08N10B	8000	-	115	6.2	696	-	-	11.5	11.2	\$63	-	1.9	255	S	99	121
★ SS10N10B	9700	-	115	7.8	858	-	-	11.3	11.2	\$77	-	2.5	300	S	106	128
★ SS12N10B	12000	-	115	9.7	1062	-	-	11.3	11.2	\$96	-	3.0	300	S	112	134
SS14N10B	13500	-	115	12.0	1239	-	-	10.9	10.9	\$112	-	4.0	275	S	116	138
★ SS12N30B	12000/12000	-	230/208	4.9/5.2	1062/1062	-	-	11.3/11.3	11.2/11.2	\$96	-	3.4	325	S	112	134
SS16N30A	15500/15200	-	230/208	6.5/7.1	1449/1421	-	-	10.7/10.7	10.7/10.7	\$130	-	4.8	350	S	116	136
★ SM15N10B	15000	-	115	12.0	1339	-	-	11.2	11.1	\$121	-	3.5	360	M	141	154
SM18N30A	17500/17200	-	230/208	7.4/8.0	1635/1607	-	-	10.7/10.7	10.7/10.7	\$147	-	4.6	350	M	141	154
★ SM21N30B	20500/20000	-	230/208	9.3/10.2	2092/2062	-	-	9.8/9.8	9.8/9.8	\$188	-	6.0	425	M	132	153
SM24N30A*	23500/23200	-	230/208	12.7/13.6	2765/2730	-	-	8.5/8.5	*	\$249	-	7.1	430	M	152	173
★ SL24N30B	24000/23800	-	230/208	10.8/11.4	2449/2429	-	-	9.8/9.8	9.8/9.8	\$220	-	7.0	640	L	191	212
★ SL28N30B	28000/27600	-	230/208	13.0/14.0	2857/2875	-	-	9.8/9.8	9.8/9.8	\$257	-	8.5	640	L	193	214
SL36N30B	36000/35500	-	230/208	17.5/19.2	4000/3944	-	-	9.0/9.0	9.0/9.0	\$360	-	12.0	725	L	212	248
Kühl+® (Heat Pump)																
★ YS10N10B**	9500	8000	115	8.2	913	7.3	870	10.4	10.3	\$82	2.7	2.0	300	S	109	131
★ YS12N33B	11500/11300	9400/9000	230/208	5.0/5.4	1106/1087	4.6/5.0	1132/1139	10.4/10.4	10.3/10.3	\$100	2.4/2.3	3.0	375	S	115	136
★ YM18N34B	17500/17200	15500/15500	230/208	7.5/8.0	1683/1654	8.0/8.4	1824/1765	10.4/10.4	10.3/10.3	\$151	2.5/2.5	5.4	370	M	141	154
★ YL24N35B	24000/24000	22000/22000	230/208	10.8/11.6	2449/2449	10.7/11.4	2391/2391	9.8/9.8	9.8/9.8	\$220	2.6/2.6	7.0	600	L	197	211
Kühl+® (Electric Heat)																
EQ08N11B	7500	4000	115	6.1	682	11.2	1290	11.0	11.0	\$61	-	1.9	200	Q	72	76
ES12N33B	12000/12000	10700/8900	230/208	4.9/5.2	1062/1062	16.0/14.7	3500/2900	11.3/11.3	11.2/11.2	\$96	-	3.4	325	S	113	128
ES16N33A	15500/15200	10700/8900	230/208	6.5/7.1	1449/1421	16.0/14.7	3500/2900	10.7/10.7	10.7/10.7	\$130	-	4.8	350	S	117	133
EM18N34A	17500/17200	13000/10600	230/208	7.4/8.0	1635/1607	19.5/17.0	4200/3500	10.7/10.7	10.7/10.7	\$147	-	4.6	350	M	141	154
EL24N35	24000/23800	17300/14300	230/208	10.8/11.4	2449/2429	24.0/22.4	5500/4650	9.8/9.8	9.7/9.7	\$220	-	7.0	640	L	197	211
EL36N35B	36000/35500	17300/14300	230/208	17.5/19.2	4000/3944	24.0/22.4	5500/4650	9.0/9.0	9.0/9.0	\$360	-	12.0	725	L	213	246

\*Limited availability. Manufactured prior to 6-01-2014.

\*\* YS10N10B heat pump operates on 115 volt and IS NOT equipped with supplemental heat. Will not provide heat at temperatures below 40°F. Friedrich room air conditioners are designed to operate in outdoor temperatures from 60° F to 115° F.

Kühl+ Heat Pump heating information (shown in red) indicates heat pump performance. Kühl+ Electric Heat heating information (shown in red) indicates electric heat strip performance. For Kühl+ Heat Pump electric heating performance refer to corresponding Kühl+ Electric Heat model.

As an ENERGY STAR® partner, Friedrich Air Conditioning Co. has determined that the selected ENERGY STAR® models meet the ENERGY STAR® guidelines for energy efficiency.

The consumer- through the AHAM Room Air Conditioner Certification Program- can be certain that the AHAM Certification Seal accurately states the unit's cooling and heating capacity rating, the amperes and the energy efficiency ratio.

Your operating costs will depend on your utility rates and use. The estimated operating cost is based on a electricity cost of \$ .12 per kWh. For more information, visit [www.ftc.gov/energy](http://www.ftc.gov/energy).

Due to continuing research in new energy-saving technology, specifications are subject to change without notice.



Friedrich Air Conditioning Co. | 10001 Reunion Place, Suite 500 | San Antonio, TX 78216 | 877.599.5665 [www.friedrich.com](http://www.friedrich.com)