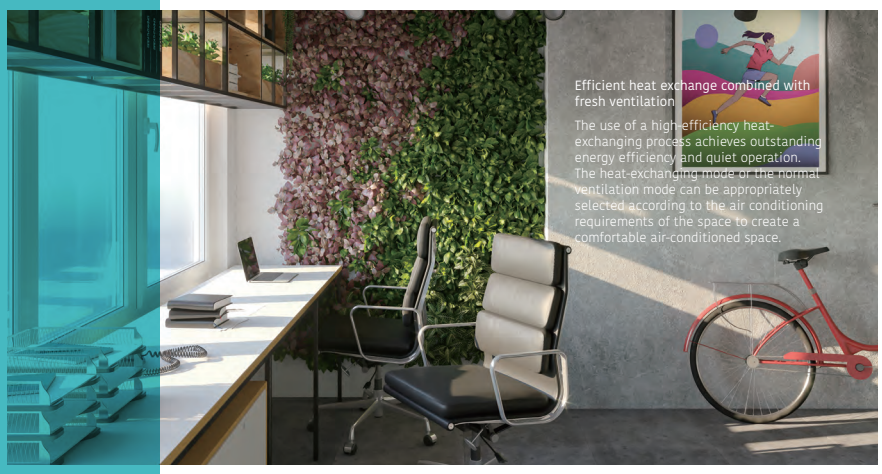
Библиотека СОК



Residential, Commercial & Light Commercial

VENTILATION

VENTILATION Lineup

Vn-002 Energy Recovery Ventilator
Vn-004 DX kit for Air Handling Applications
• for VRF Outdoor unit
Vn-006 DX kit for Air Handling Applications
• for Single Split Outdoor Units

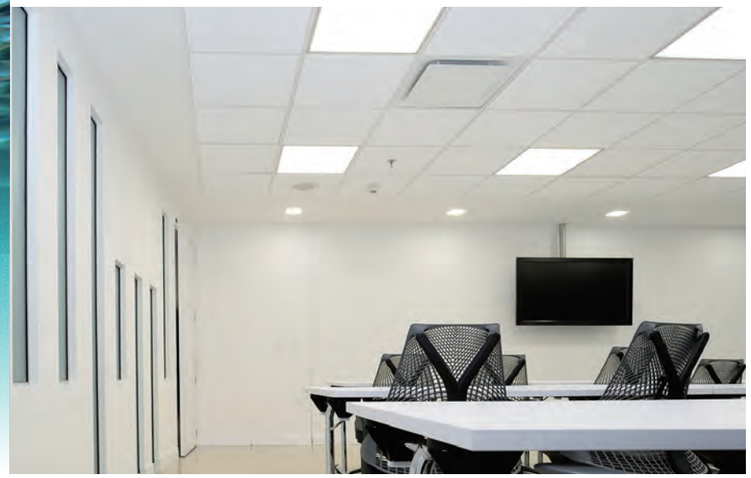
Lineup

Airflow rate (m^3/h)	250	350	500	800	1000
Energy Recovery Ventilator	 UTZ-BD025C	 UTZ-BD035C	 UTZ-BD050C	 UTZ-BD080C	 UTZ-BD100C

Connectable capacity class (kW)	5.0	6.3	8.0	10.0	12.5	14.0	20.0	25.0	40.0	50.0
DX kit for Air Handling Applications for VRF Outdoor unit	 EEV unit UTP-VX30B	 Control unit UTY-VDGXZ3		 EEV unit UTP-VX60B	 Control unit UTY-VDGXZ3		 EEV unit UTP-VX90B	 Control unit UTY-VDGXZ3	 EEV unit UTP-VX90B×2	 Control unit UTY-VDGXZ3

Connectable capacity class (kW)	2.5 - 22.0
DX kit for Air Handling Applications for Single Split Outdoor Units	 UTY-XDZX

Energy Recovery Ventilator

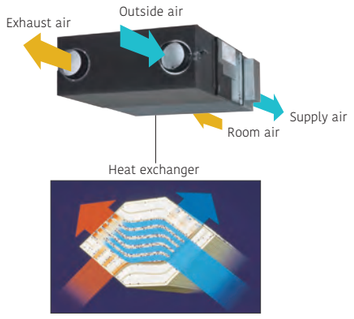


The energy recovery ventilator unit provides energy efficiency for comfort and improved savings.

Heat Exchange Ventilation and Normal Ventilation

Heat exchange ventilation
When a room is cooled or heated, the exhausted cooling or heating energy is recovered by heat exchange ventilation.

Normal ventilation
Used when the indoor space does not require cooling or heating, i.e., when there is little temperature difference between the indoor and outdoor environments.



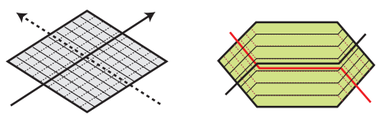
A high-efficiency counter-flow heat-exchanging element is used in the setup.

Energy Efficiency and Ecology

The use of a counter-flow heat-exchanging element, designed to recover up to 77% of heat from the outgoing air, significantly reduces energy consumption. The air conditioning load is reduced by approximately 20%, which results in substantial savings in energy cost.

Comparison of Heat-Exchanging Elements

Air flows in a straight line through a crossflow element. In contrast, air flows for a longer time (a longer distance) through a counter-flow element to achieve more consistent heat-exchanging performance.



Other element (Cross-flow element)

General element (Counter-flow element)

Quiet Operation

Significantly lower noise levels are achieved by reducing pressure loss.

25.5dB
(UTZ-BD035C)

Extended Range of External Static Pressure

The use of a powerful fan motor improves the external static pressure. This allows it to be installed in a variety of buildings.

Slim Design for Easier Installation

The use of a counter-flow heat-exchanging element made it possible to design a quieter, slimmer unit.

Height 270 mm
UTZ-BD025C



Height 388 mm
UTZ-BD080C/BD100C

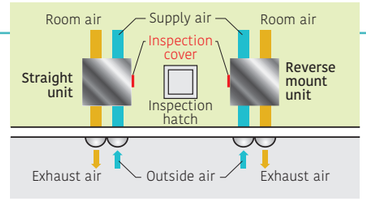


Height 317 mm
UTZ-BD035C/BD050C



Reverse-Mountable Direct Air Supply and Exhaust System

Simplifies the duct design, due to its straight ducts for air supply and exhaust. Since each unit can be mounted facing opposite directions, only one inspection hole is needed for two units. This makes duct work easier and more flexible.



Simple Remote Operation

Easy operation with connected liquid crystal switch

- Power On/Off
- On/Off Timer
- Air volume High/Low
- Clean filter display
- Heat exchange ventilation and normal ventilation



Model: UTZ-BD025C/UTZ-BD035C/UTZ-BD050C/UTZ-BD080C/UTZ-BD100C



UTZ-BD025C | UTZ-BD035C | UTZ-BD050C | UTZ-BD080C | UTZ-BD100C

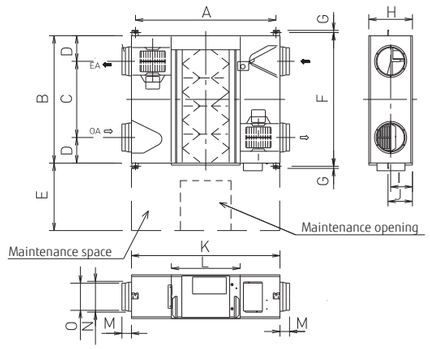
Specifications

Rated flow rate				250 m^3/h	350 m^3/h	500 m^3/h	800 m^3/h	1000 m^3/h
Model name				UTZ-BD025C	UTZ-BD035C	UTZ-BD050C	UTZ-BD080C	UTZ-BD100C
Power source				Single phase, ~220 to 240 V, 50 Hz				
Heat Exchange Ventilation	Input power	(Extra high)/High/Low	W	128/123/96	190/185/168	289/225/185	418/378/295	464/432/311
	Airflow rate	(Extra high)/High/Low	m^3/h	250/25/190	350/350/240	500/500/440	800/800/630	1,000/1,000/700
	External static pressure	(Extra high)/High/Low	Pa	105/95/45	140/60/45	120/60/35	140/110/55	105/80/75
	Temperature exchange efficiency	(Extra high)/High/Low	%	75/75/77	75/75/78	75/75/76	75/75/76	75/75/79
	Energy exchange efficiency cooling	(Extra high)/High/Low	%	63/63/65	66/66/71	62/62/64	65/65/68	65/65/70
	Energy exchange efficiency heat pump	(Extra high)/High/Low	%	70/70/72	69/69/73	67/67/69	71/71/74	71/71/ 76
	Sound pressure level	(Extra high)/High/Low	dB*	31.5/30.5/26.5	33.0/31.0/25.5	37.5/35.5/32.5	37.5/37.0/34.5	38.5/37.5/34.5
Normal Ventilation	Input power	(Extra high)/High/Low	W	128/123/96	190/185/168	289/225/185	418/378/295	464/432/311
	Airflow rate	(Extra high)/High/Low	m^3/h	250/25/190	350/350/240	500/500/440	800/800/630	1,000/1,000/700
	External static pressure	(Extra high)/High/Low	Pa	105/95/45	140/60/45	120/60/35	140/110/55	105/80/75
	Sound pressure level	(Extra high)/High/Low	dB*	31.5/30.5/26.5	33.0/31.0/25.5	38.5/38.0/32.5	37.5/37.0/34.5	40.5/39.5/36.5
Dimensions		W × D × H	mm	882 × 599 × 270	1,050 × 804 × 317	1,090 × 904 × 317	1,322 × 884 × 388	1,322 × 1,134 × 388
Weight			kg	29	49	57	71	83
Outlet duct diameter			mm	150	150	200	250	250
Operating range			°C	-10 to 40	-10 to 40	-10 to 40	-10 to 40	-10 to 40
Maximum humidity			%	85	85	85	85	85

* Noise level measured 1.5 m below the center of the unit

Dimensions

(Unit: mm)



	UTZ-BD025C	UTZ-BD035C	UTZ-BD050C	UTZ-BD080C	UTZ-BD100C
A	810	978	1,018	1,250	1,250
B	599	804	904	884	1,134
C	315	580	640	428	678
D	142	112	132	228	228
E	600	600	600	600	600
F	655	860	960	940	1,190
G	19	19	19	19	19
H	270	317	317	388	388
I	135	159	159	194	194
J	159	182	182	218	218
K	882	1,050	1,090	1,322	1,322
L	414	470	470	612	612
M	95	70	70	85	85
N	Ø164	Ø164	Ø210	Ø258	Ø258
O	Ø144	Ø144	Ø194	Ø242	Ø242

DX kit

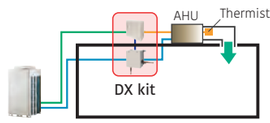
for Air Handling Applications

for VRF Outdoor unit

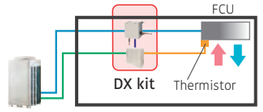


With these kits, air handling units (AHUs) and fan coil units (FCUs) from other manufacturers can be incorporated into General VRF systems, or one AHU can be connected to one General VRF dedicated outdoor unit to control outdoor ventilation and room temperatures.

Multiple Temperature Sensors Optimally Control an Air Handling Unit and a Fan Coil Unit

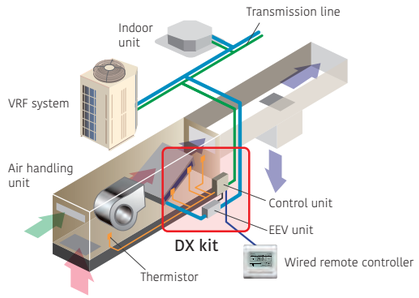


When connected to an Air handling unit, the temperature of supply air is controlled by a discharge air sensor.



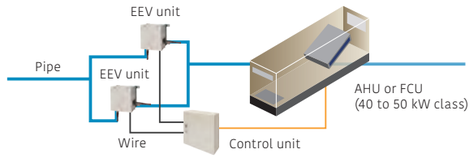
When connected to a fan coil unit, the room temperature is controlled by the Suction air sensor.

Application as part of a VRF system



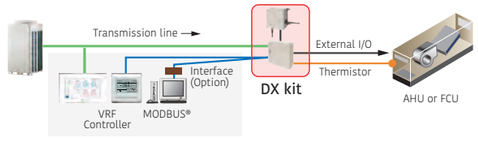
Supports a Wide Range of Capacity Classes

- Two EEV units can be connected in parallel to large-capacity units of up to 20 HP (50 kW). (UTP-LX180A separation tube required)
- Connectable capacity range: 5 kW to 50 kW

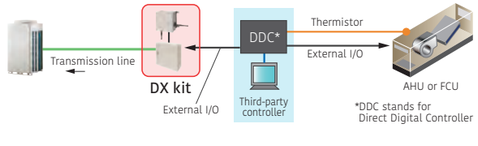


A Variety of Control Options that Meet Application Requirements

Central control enabled by our VRF controllers or central management controllers



Central control from external controllers



Summary of Functions

Inputs

- On/Off
- Setting temperature
- Capacity demand
- Heating/Cooling operation modes
- Fault information

Outputs

- On/Off indication
- Fan On/Off indication
- Thermostat On/Off indication
- Defrost indication
- Fault indication
- Low airflow alarm

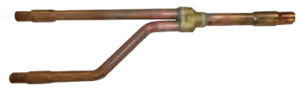
MODBUS® Control

Can be controlled via a MODBUS®-enabled BMS using an optional interface.

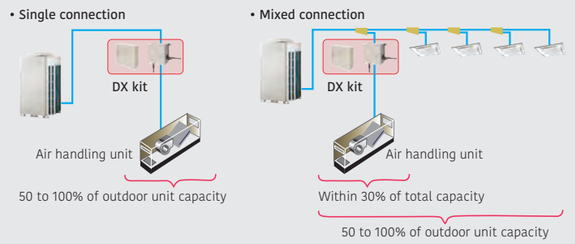
Installation Requirements

- Connectable VRF series: All VRF series
- Capacity range of connectable DX kit systems with outdoor units: 50 to 100% of capacity
- Capacity range of connectable DX kit systems with indoor units: 30% or less of capacity
- Max. wire length from a control unit: 10 m
- Max. pipe length between EEV unit and indoor unit: 5 m
- A control unit (IP54 class) and an EEV unit can be installed outdoors.

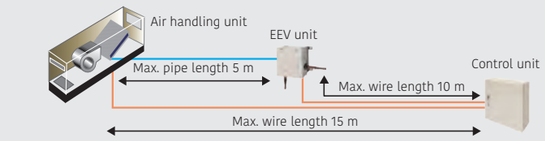
Optional separation tube to connect two EEV units: UTP-LX180A



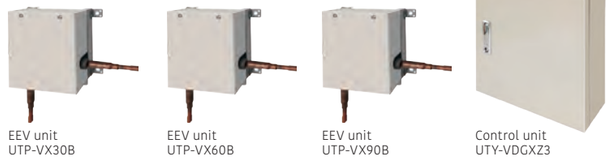
Connectable capacity



Pipe and wire length



Control unit: UTY-VDGXZ3
EEV unit: UTP-VX30B/UTP-VX60B/UTP-VX90B



Specifications

Connectable capacity class			5.0 kW	6.3 kW	8.0 kW	10.0 kW	12.5 kW	14.0 kW	20.0 kW	25.0 kW	40.0 kW	50.0 kW
Capacity	Cooling	kW	5.6	6.3	8.0	10.0	12.5	14.0	22.4	25.0	40.0	50.4
	Heating		6.3	7.1	9.0	11.2	14.0	16.0	25.0	28.0	45.0	56.5

Control unit		UTY-VDGXZ3
Power source	V/Ø/Hz	230/1/50
Dimensions (H × W × D)	mm	400 × 400 × 120

EEV unit		UTP-VX30B	UTP-VX60B	UTP-VX90B	UTP-VX90B × 2
Connection pipe diameter (Liquid)	mm	Ø6.35	Ø9.52	Ø9.52	Ø9.52	Ø12.70
Dimensions (H × W × D)		160 × 220 × 90			

Note: Specifications are based on the following conditions.
Cooling: Indoor temperature of 27°CDB/19°CWB, and outdoor temperature of 35°CDB/24°CWB.
Heating: Indoor temperature of 20°CDB/(15°CWB), and outdoor temperature of 7°CDB/6°CWB.
Pipe length: 7.5 m Voltage: 230 [V].

DX kit

for Air Handling Applications

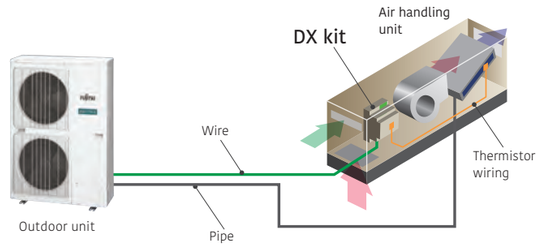
for Single Split Outdoor Units



With this kit, other manufacturers' Air handling units (AHUs) and fan coil units (FCUs) can be incorporated into General Split outdoor units.

Flexible Connectivity

This kit allows connections to third-party equipment. This control unit can also be used in conjunction with General single-split outdoor units, providing a perfect solution when a stand-alone Air handling unit is needed.



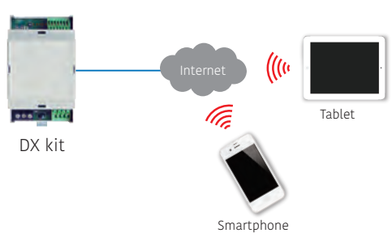
Supports a Wide Range of Capacity Classes

Capable of connecting large capacities in the range of 2.5 kW to 22.0 kW (Nominal)



Mobile Devices Allow for Operation from Anywhere

Can be operated and managed remotely using your smartphone or tablet.



Summary of Functions

Inputs

- On/Off
- Heating/Cooling operation modes
- Capacity demand (analogue 0 to 10 V)
- Heat exchanger temperature

Outputs

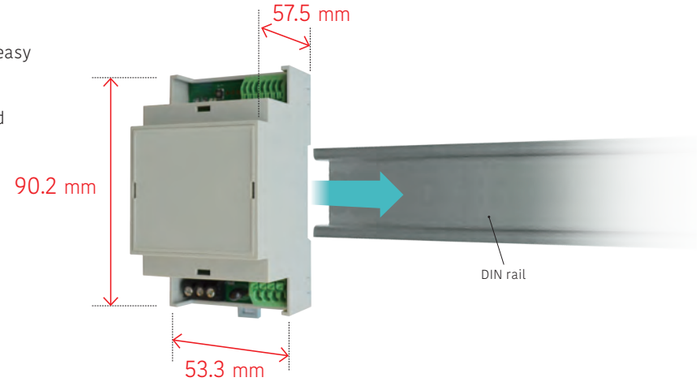
- Status of Compressor, Defrost, and Errors (Potential free relays)
- Status indicator with LED

Wireless LAN Control

Wireless LAN control through cloud connectivity enables secure remote monitoring and control from anywhere.

Easy Installation

- Compact DIN rail mountable enclosure for easy installation
- No expansion devise required
- No separate external power supply required



Model: UTY-XDZX



Specifications

R410A models

BTU			12	14	18	24	30	36	45	54	60	72	90
Capacity (Nominal)	Cooling	kW	3.5	4.3	5.2	6.8	8.5	9.4	12.1	13.3	15.0	19.0	22.0
	Heating		4.1	5.0	6.0	7.8	10.0	10.8	13.3	15.8	18.0	22.4	27.0

R32 models

BTU			09	12	14	18	22	24	30	36	45	54
Capacity (Nominal)	Cooling	kW	2.5	3.5	4.3	5.2	6.0	6.8	8.5	9.4	12.1	13.3
	Heating		3.2	4.1	5.0	6.0	7.0	7.5	10.0	10.8	13.3	15.8

Model name		UTY-XDZX
Power source	V/Ø/Hz	230/1/50
Dimensions (H × W × D)	mm	90.2 × 53.3 × 57.5
Weight	g	110

Note: Specifications are based on the following conditions.
Cooling: Indoor temperature of 27°CDB/19°CWB, and outdoor temperature of 35°CDB/24°CWB.
Heating: Indoor temperature of 20°CDB/(15°CWB), and outdoor temperature of 7°CDB/6°CWB.
Pipe length: 5.0 m Voltage: 230 [V].