



# Air handling terminal units cassette type fan coil unit



*Perfect integration :*  
these units adapt to *aesthetic,*  
*financial* and *material constraints*



## USE

The MELODY cassette type fan coil units are non-independent air conditioning terminal units installed in false ceiling ; they combine the installation and exploitation economical advantages of a hot and chilled water centralized production and allow an individual temperature adjustment in each room.

The MELODY cassette type fan coil units are fitted with a 5-speed motor, meeting all the sound level requirements acceptable in the various rooms to be air conditioned.

## RANGE

The range of 5 units, each available in three versions, covers flow rates from 290 to 1690 m<sup>3</sup>/h.

● **MELODY 61 - 62 - 63 - 122 - 123 2TFC**

- 2-pipe system,

Hot or cold operation

● **MELODY 61 - 62 - 63 - 122 - 123 2TFC-E**

- 2-pipe + 2-wire system,

Cooling operation and electric heater

● **MELODY 62 - 63 - 122 - 123 4TFC**

- 2-pipe system,

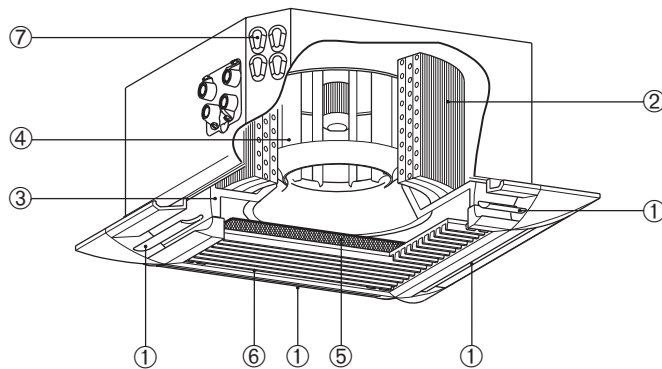
Heating or cooling operation

## DESCRIPTION

The fan(s) suck(s) the air through a grille located inside the room. Filtered in order to be purified, dehumidified, heated or cooled through an exchange coil supplied with hot or chilled

water, this air is discharged into the room to be air conditioned through 4 steerable jet deflectors.

### QUALITY DESCRIPTION



- ① Orientable deflectors
- ② Exchanger coil
- ③ Condensate drain pan
- ④ Fan motor unit
- ⑤ Removable air filter
- ⑥ Grille
- ⑦ Electrical box

#### Exchange coil

Aluminium exchange coil with independent fins and copper tubes.

Hot water temperature : 70°C maxi. (2 tubes)

Working pressure : 16 bar maxi (tested at 21 bar)

This coil is designed in order to facilitate the condensed water draining.

On all models, air vent and partial draining are accessible through the side of the cassette on the collector manifold.

#### Recovery tray

Condensates recovery tray in injected polystyrene, covered with a polystyrene coating, fitted with a condensates draining pump and a safety float

#### Fan motor assembly

Centrifugal balanced propeller in polymere.

Sealed motor Class F, automatic normally closed overload protection, permanent capacitor, multi-speed, 5 speeds connected on a terminal box, resilient mounts.

Voltage : 230V - 1 ph. - 50 Hz

#### Air filter

Cleanable media in polyester fibers

#### Class UL 94-V2 (self extinguishable)

65% efficiency - gravimetric (EU1)

Efficient and cleanable air filter for dry particles

Mounted on a removable grille. Easy to withdraw without dismantling. Positioned at the fan motor assembly air intake, in conformity with norm E. 36102.

The fire classification conforms to para. 1 of Article CH 38 of the Fire Safety Regulations for public buildings.

#### Recovery/Discharge grille

White RAL 9010 colour

Aesthetic, the apparent grille permits a discrete integration in all surroundings. The manual deflectors are adjustable (3 positions), allowing an homogeneous air distribution throughout the room. Possibility of closing one or two discharge deflectors (with the grille)

#### Casings

Made of galvanized anti-corrosion sheet metal, assembled by aluminium rivets.

The internal and external surfaces are thermally and acoustically insulated with foam.

Pre-stamped lateral holes for connection to a fresh air intake and to a discharge duct for treating an adjacent room.

#### Electrical box

Connection with pin type connector

Separate electrical supply

**Note** : Refer to installation brochure for more details.

### ACCESSORIES (SEE FOLLOWING PAGES)

Smooth panelled sleeve, Ø 100 mm, for treated fresh air inlet and Ø 200 for air discharge in an adjacent room.

Smooth panelled sleeve, Ø 100 mm with self-adjusting module for fresh air inlet.

### CONTROL DEVICES

Electromechanical wall-mounted thermostat range  
V20 electronic controller range.

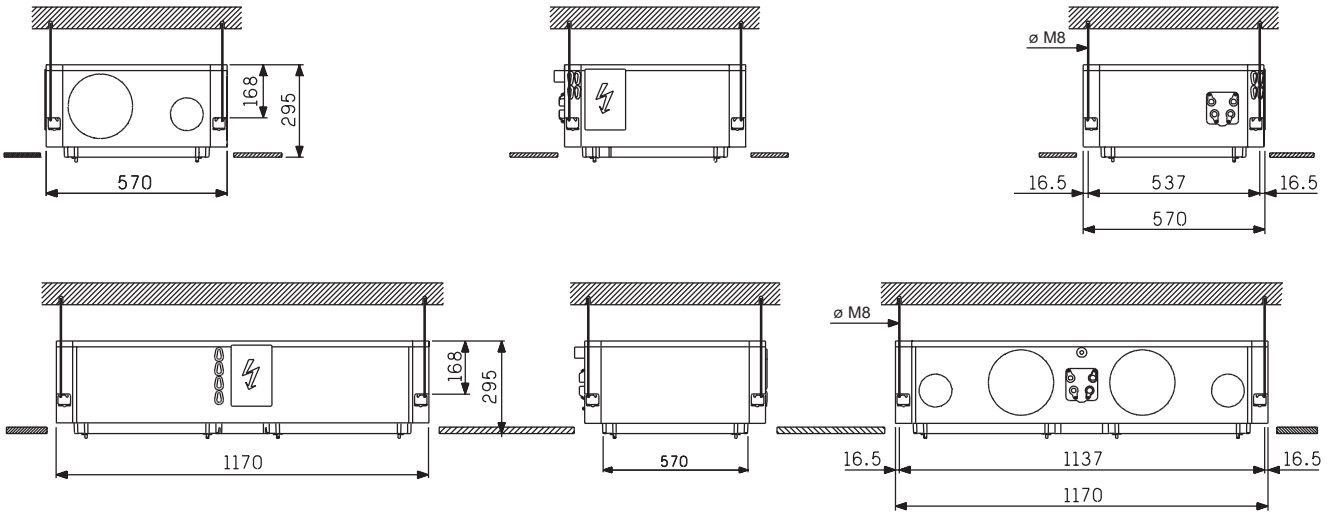
V200 electronic controller range.  
V2000® communicating electronic controller range.



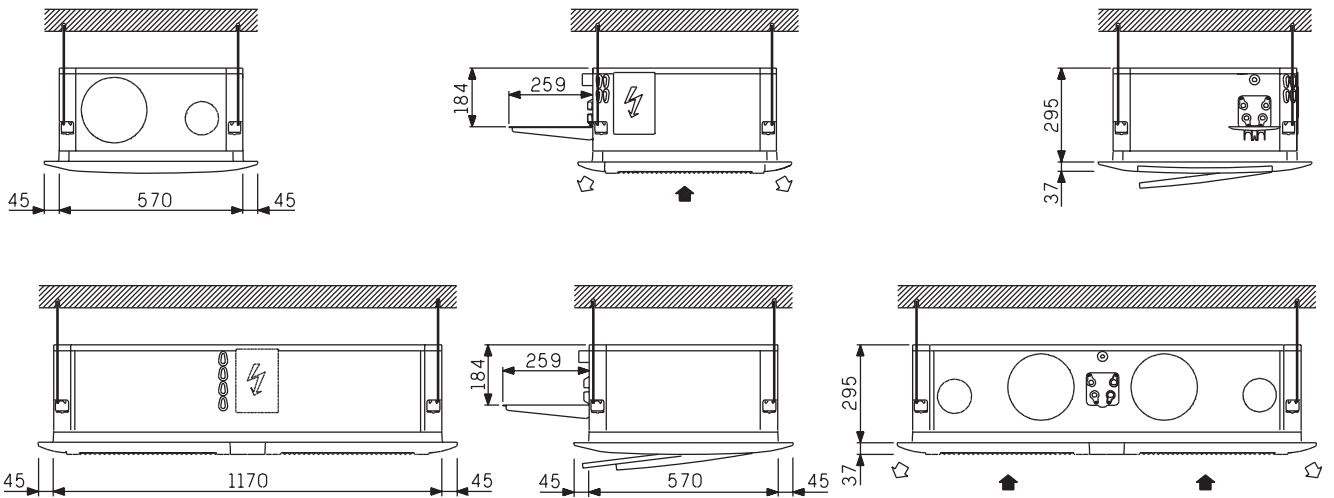
# Air handling terminal units cassette type fan coil unit

## DIMENSIONS

Cassette only

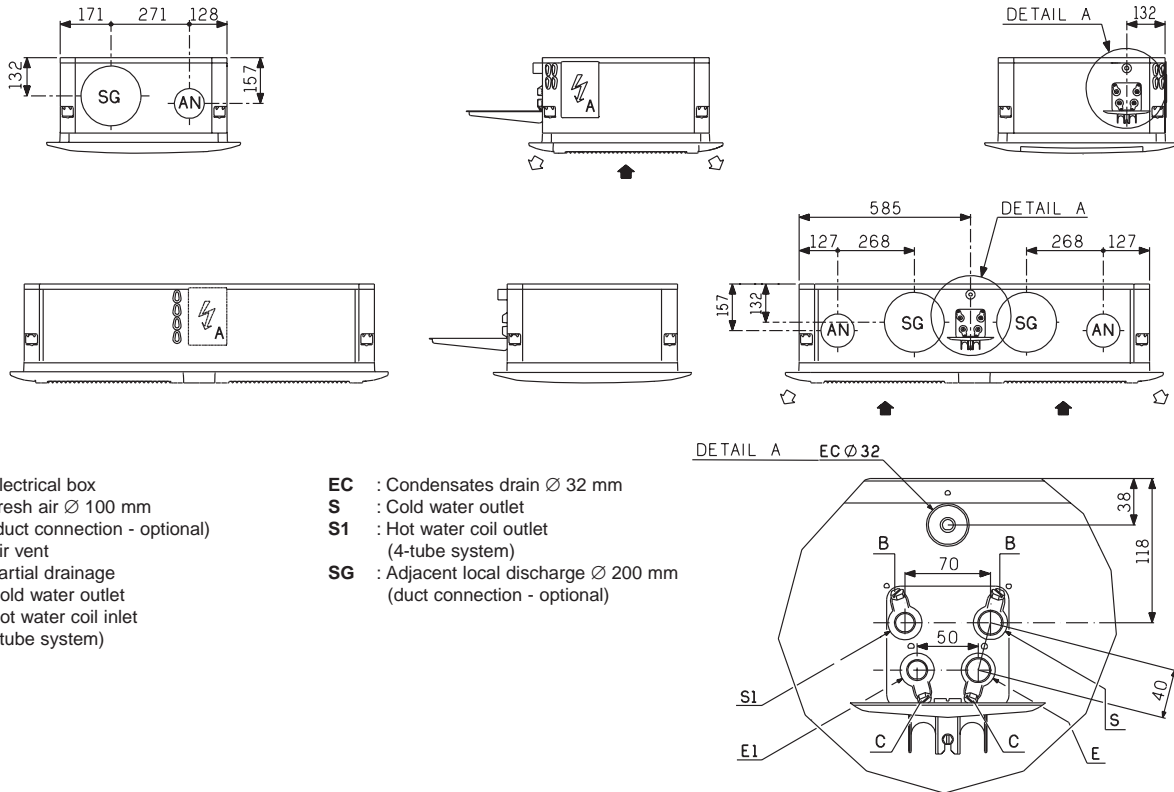


Cassette with grille / diffuser



### DIMENSIONS

Connections supply piping, fresh air and discharge ducts

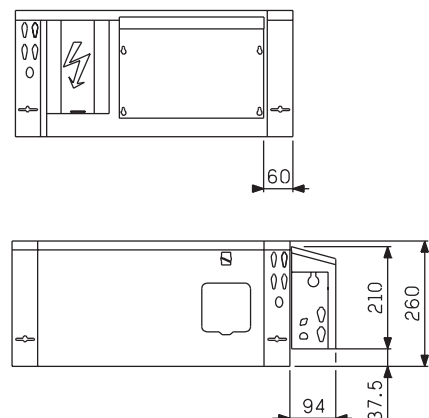
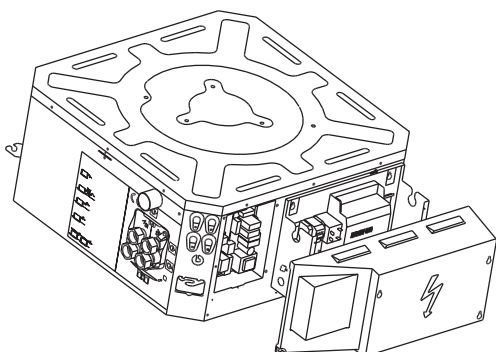


| MELODY | Module  |         | Grille | Total   |         |
|--------|---------|---------|--------|---------|---------|
|        | 2-pipes | 4-pipes |        | 2-pipes | 4-pipes |
| 61     | 18.5    | 20.5    | 2.8    | 21.3    | 23.3    |
| 62     | 20      | 20.5    | 2.8    | 22.8    | 23.3    |
| 63     | 21.54   | 22      | 2.8    | 24.3    | 24.8    |
| 122    | 42      | 43      | 5.2    | 47.2    | 48.2    |
| 123    | 45      | 46      | 5.2    | 50.2    | 51.2    |

Cassette type for coil with regulation V200 - V2000®

Separate box supplied as an accessory, to be mounted on site

- 1 - Fit the box with 2 Parker screws
- 2 - Fit the cover



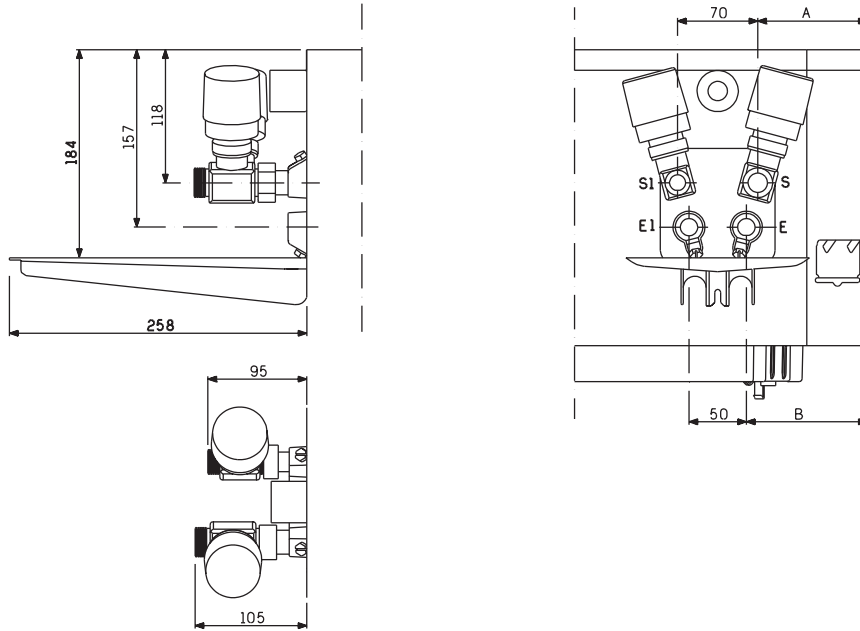


# Air handling terminal units cassette type fan coil unit

2-way valve kit assembly (option delivered separately)

The kit includes :

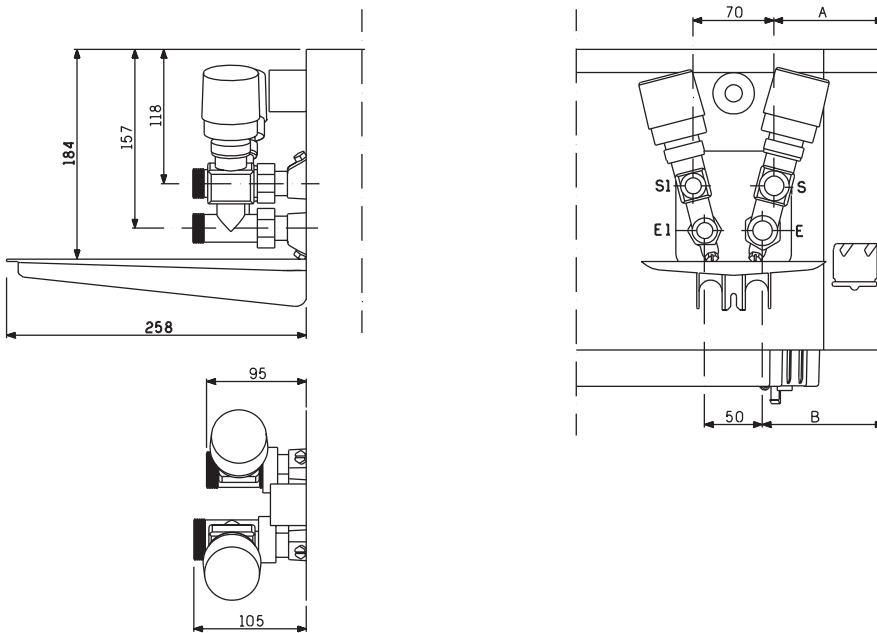
- 1 2-way valve all or nothing
- 1 male/female boss



4-way valve kit assembly (option delivered separately)

The kit includes :

- 1 4-way valve all or nothing
- 1 male/female boss



| MELODY    | A   | B   | Heating coil | Cooling coil |
|-----------|-----|-----|--------------|--------------|
| 61 - 62   | 95  | 105 | Ø 1/2"       | Ø 1/2"       |
| 63        | 95  | 105 | Ø 3/4"       | Ø 1/2"       |
| 122 - 123 | 550 | 560 | Ø 3/4"       | Ø 1/2"       |



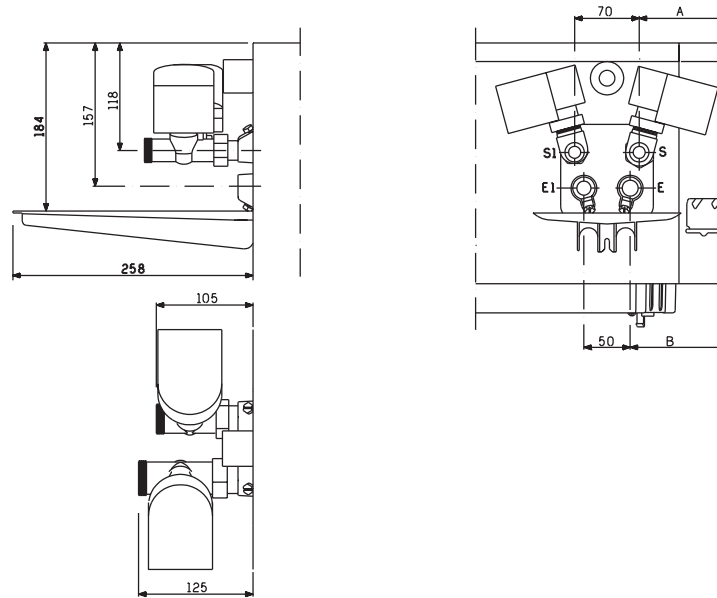
# Air handling terminal units cassette type fan coil unit

## MELODY

V2000® 2-way valve kit assembly (option delivered separately)

The kit includes :

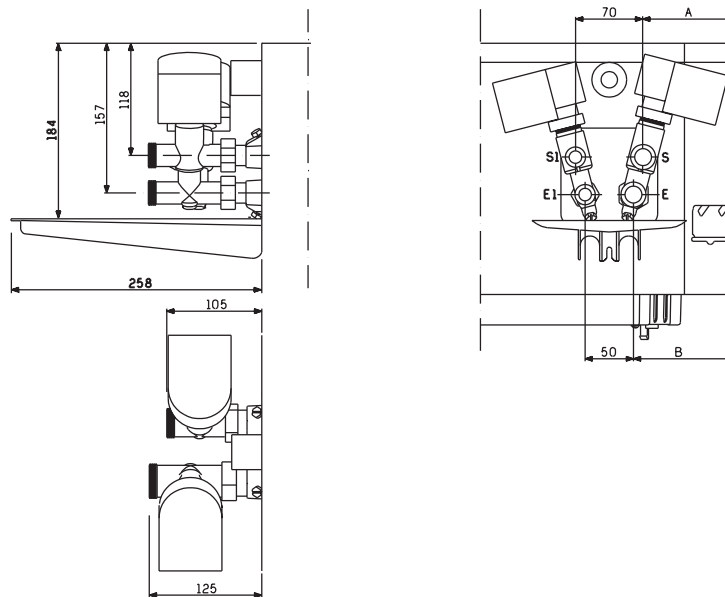
- 1 controller in a separate electrical box
- 1 progressive 2-way valve (24V)
- 1 user's terminal



V2000® 4-way valve kit assembly (option delivered separately)

The kit includes :

- 1 controller in a separate electrical box
- 1 progressive 4-way valve (24V)
- 1 user's terminal



| MELODY    | A   | B   | Heating coil<br>Valve inlet E / outlet S | Cooling coil<br>Valve inlet E1 / outlet S1 |
|-----------|-----|-----|--|--|
| 61 - 62   | 95  | 105 | Ø 1/2"                                   | Ø 1/2"                                     |
| 63        | 95  | 105 | Ø 3/4"                                   | Ø 1/2"                                     |
| 122 - 123 | 550 | 560 | Ø 3/4"                                   | Ø 1/2"                                     |



# Air handling terminal units cassette type fan coil unit

## MODEL PERFORMANCES

| MELODY | Motor ref. | Air flow m <sup>3</sup> /h | Heating capacity 2-pipe system W | Cooling capacity W |           | Heating capacity 4-pipe system W | Comfort level ISO or NR | Air temperature mean rise in D Auxiliary electric heater 230/1/50 |        |
|--------|------------|----------------------------|----------------------------------|--------------------|-----------|----------------------------------|-------------------------|---|--------|
|        |            |                            |                                  | Total              | Sensitive |                                  |                         | 1500 W  | 3000 W |
| 61     | R1         | 740                        | 9830                             | 2820               | 2360      | -                                | 39                      | 6   | -      |
|        | R2         | 600                        | 8540                             | 2440               | 2020      | -                                | 32                      | 7.4   | -      |
|        | R3         | 500                        | 7460                             | 2130               | 1760      | -                                | 26                      | 8.8   | -      |
|        | R4         | 360                        | 6210                             | 1810               | 1460      | -                                | 20                      | 12.3  | -      |
|        | R5         | 290                        | 5210                             | 1530               | 1220      | -                                | 16                      | 15.2  | -      |
| 62     | R1         | 860                        | 15500                            | 4790               | 3550      | 4450                             | 42                      | 5.1   | -      |
|        | R2         | 670                        | 13100                            | 4140               | 3040      | 3710                             | 36                      | 6.6   | -      |
|        | R3         | 550                        | 11400                            | 3640               | 2660      | 3690                             | 30                      | 8.0   | -      |
|        | R4         | 430                        | 9300                             | 3100               | 2160      | 2760                             | 24                      | 10.3  | -      |
|        | R5         | 330                        | 7310                             | 2530               | 1680      | 2290                             | 20                      | 13.4  | -      |
| 63     | R1         | 890                        | 19400                            | 6390               | 4260      | 6600                             | 44                      | 5.0   | -      |
|        | R2         | 730                        | 16200                            | 5500               | 3580      | 5980                             | 39                      | 6.0   | -      |
|        | R3         | 590                        | 13200                            | 4660               | 2980      | 5140                             | 34                      | 7.5   | -      |
|        | R4         | 460                        | 10300                            | 3690               | 2340      | 4340                             | 27                      | 9.6   | -      |
|        | R5         | 370                        | 8350                             | 3020               | 1920      | 3740                             | 23                      | 11.9  | -      |
| 122    | R1         | 1640                       | 29000                            | 9560               | 7110      | 9570                             | 45                      | -   | 5.4    |
|        | R2         | 1320                       | 25000                            | 8260               | 6130      | 8710                             | 40                      | -   | 6.7    |
|        | R3         | 1075                       | 21900                            | 7280               | 5300      | 7920                             | 35                      | -   | 8.2    |
|        | R4         | 820                        | 17500                            | 6110               | 4280      | 6150                             | 29                      | -   | 10.8   |
|        | R5         | 640                        | 14000                            | 5070               | 3330      | 4850                             | 25                      | -   | 13.8   |
| 123    | R1         | 1690                       | 36900                            | 12800              | 8540      | 12200                            | 47                      | -   | 5.2    |
|        | R2         | 1390                       | 30800                            | 11000              | 7260      | 11100                            | 42                      | -   | 6.3    |
|        | R3         | 1140                       | 25400                            | 9280               | 5970      | 9750                             | 38                      | -   | 7.7    |
|        | R4         | 870                        | 19600                            | 7330               | 4670      | 8230                             | 32                      | -   | 10.1   |
|        | R5         | 690                        | 15700                            | 5960               | 3820      | 7080                             | 27                      | -   | 12.8   |

Factory wiring.

Hot water temp.: 90 / 70 C, winter air temp.: 19 C - Cold water temp.: 7 / 12 C, summer air temp.: 27 C 50% RH

Comfort level: attenuation level of room and installation: 12 dB



CIAT takes part in the EUROVENT fan coil unit certification program. The list of products and certified characteristics is given in the EUROVENT directory and on the web site [www.eurovent-certification.com](http://www.eurovent-certification.com)

### Fresh air intake and air discharge into an adjacent room

On one side of the cassette, pre-stamped openings enable a separate fresh air duct and a discharge duct connection into an adjacent room.

| MELODY                          |                   | 61  | 62  | 63  | 122  | 123  |
|---------------------------------|-------------------|-----|-----|-----|------|------|
| Nominal flow (high speed)       | m <sup>3</sup> /h | 740 | 860 | 890 | 1640 | 1690 |
| (1) Fresh air flow              | m <sup>3</sup> /h | 74  | 86  | 89  | 164  | 169  |
| (2) Air flow into adjacent room | m <sup>3</sup> /h | 110 | 130 | 134 | 250  | 254  |

(1) The fresh air flow may not exceed 20% of the nominal flow.

(2) Air flow given for a 5 m duct with a 90° elbow and one flap closed on the duct outlet. Decompression with a return air grille should be provided in the adjacent room.



# Air handling terminal units cassette type fan coil unit

## MELODY

### TECHNICAL AND ELECTRICAL CHARACTERISTICS

#### Coil capacity (liters)

| MELODY                 |         | 61  | 62  | 63  | 122 | 123 |
|------------------------|---------|-----|-----|-----|-----|-----|
| Standard 2-pipe system |         | 0,5 | 1,0 | 1,5 | 2,3 | 3,3 |
| 4-pipe system          | Cooling | -   | 0,7 | 1,3 | 1,9 | 3,1 |
|                        | Heating | -   | 0,1 | 0,3 | 0,3 | 0,6 |

#### Supply pipe diameter (tapped connector)

| MELODY                  |         | 61 - 62 | 63 - 122 - 123 |
|-------------------------|---------|---------|----------------|
| Standard 2-pipe system" |         | G 3/8   | G 1/2          |
| 4-pipe system           | Cooling | G 3/8   | G 1/2          |
|                         | Heating | G 3/8   | G 3/8          |

#### Electrical characteristics (230 V - 1 ph - 50 Hz) - Fan

| MELODY           |    | 61   | 62   | 63   | 122  | 123  |
|------------------|----|------|------|------|------|------|
| Power input in W | R1 | 87   | 89   | 93   | 179  | 185  |
|                  | R2 | 69   | 70   | 74   | 140  | 147  |
|                  | R3 | 54   | 56   | 59   | 111  | 118  |
|                  | R4 | 39   | 40   | 42   | 81   | 84   |
|                  | R5 | 30   | 31   | 32   | 61   | 63   |
| Blower speed     | R1 | 0.39 | 0.38 | 0.39 | 0.74 | 0.77 |
|                  | R2 | 0.30 | 0.30 | 0.31 | 0.59 | 0.61 |
|                  | R3 | 0.24 | 0.24 | 0.25 | 0.48 | 0.50 |
|                  | R4 | 0.18 | 0.18 | 0.18 | 0.35 | 0.36 |
|                  | R5 | 0.14 | 0.14 | 0.14 | 0.27 | 0.28 |

#### Electrical characteristics (230 V - 1 ph - 50 Hz) - Electric elements

| MELODY                            |                 | 61 - 62 - 63 | 122 - 123 |
|-----------------------------------|-----------------|--------------|-----------|
| Number of elements                |                 | 1            | 2         |
| Intensity                         | A               | 6,5          | 13        |
| Automatic reset safety thermostat |                 | 2            |           |
| Supply wires                      | mm <sup>2</sup> | 3 G 1,5      | 3 G 1,5   |
| Fuse (type GL)                    | A               | 8            | 16        |

### ACOUSTIC PERFORMANCE DB (A)

| MELODY       | 61    |                            | 62    |                            | 63    |                            | 122   |                            | 123   |                            |    |
|--------------|-------|----------------------------|-------|----------------------------|-------|----------------------------|-------|----------------------------|-------|----------------------------|----|
|              | dB(A) | Comfort level ISO or NR(1) | dB(A) | Comfort level ISO or NR(1) | dB(A) | Comfort level ISO or NR(1) | dB(A) | Comfort level ISO or NR(1) | dB(A) | Comfort level ISO or NR(1) |    |
| Blower speed | R1    | 44                         | 39    | 46                         | 42    | 48                         | 44    | 50                         | 45    | 52                         | 47 |
|              | R2    | 38                         | 32    | 41                         | 36    | 44                         | 39    | 45                         | 40    | 48                         | 42 |
|              | R3    | 32                         | 26    | 36                         | 30    | 39                         | 34    | 40                         | 35    | 43                         | 38 |
|              | R4    | 26                         | 20    | 29                         | 24    | 33                         | 27    | 35                         | 29    | 38                         | 32 |
|              | R5    | 21                         | 16    | 25                         | 20    | 28                         | 23    | 31                         | 25    | 33                         | 27 |

Sound pressure level : 2 m, 1,5 m from the ground, Local 70 m<sup>3</sup>, directivity 2

(1) Determined acoustic pressure when the cassette type fan coil is installed in a standard office.





# Air handling terminal units cassette type fan coil unit

Cooling or heating 2-pipe cassette type fan coil unit

| Coil   |      | 2-pipes cooling or heating |            |            |             |             |
|--|------|----------------------------|------------|------------|-------------|-------------|
| MELODY   |      | 61<br>2TFC                 | 62<br>2TFC | 63<br>2TFC | 122<br>2TFC | 123<br>2TFC |
| Air handling section<br>+ External auxiliary drain pan | Code | 3912092                    | 3912095    | 3912098    | 3912104     | 3912107     |
| Diffusion grille                                       | Code | 3943292                    |            |            | 3943294     |             |
| <b>Total price</b>                                     | Code | C063754                    | C063762    | C063800    | C063886     | C063894     |

All-or-nothing control device

| CONTROL ON AIR   |                 |
|--|-----------------|
| Thermostat RTR 7015 - On / Off<br>3 speeds - manual - <b>manual</b> heating /<br>cooling | Code<br>5201023 |

| CONTROL ON WATER                                |   |                              |
|---|---|------------------------------|
| 2-way<br>valve kit                              | Composition<br>Thermostat RTR 7012 - On / Off<br>3 speeds - manual -<br><b>manual</b> heating / cooling | Code<br>5201024              |
|   | 2-way valves  | Code<br>3940073      3940074 |
|   | <b>Complete kit</b> (thermostat, valve)   | Code<br>C064688      C064696 |
| 4-way<br>valve kit<br>WITHOUT<br>change<br>over | Composition<br>Thermostat RTR 7012 - On / Off<br>3 speeds - manual -<br><b>manual</b> heating / cooling | Code<br>5201024              |
|   | 4-way valve 230 V   | Code<br>3940077      3940078 |
|   | <b>Complete kit</b> (thermostat, valve)   | Code<br>C064718      C064726 |
| 4-way<br>valve kit<br>WITH<br>change<br>over    | Composition<br>Thermostat RTR 7203 - On / Off<br>3 speeds - <b>Automatic</b> heating /<br>cooling       | Code<br>5201021              |
|   | 4-way valve 230 V   | Code<br>3940077      3940078 |
|   | Change over on piping   | Code<br>3944162      3944162 |
|   | <b>Complete kit</b> (thermostat, valve)   | Code<br>C064734      C064742 |



# Air handling terminal units cassette type fan coil unit

**MELODY**

Cooling or heating 4-pipe cassette type fan coil unit

| Coil   |      | 4-pipe cooling or heating |            |             |             |
|--|------|---------------------------|------------|-------------|-------------|
| MELODY   |      | 62<br>4TFC                | 63<br>4TFC | 122<br>4TFC | 123<br>4TFC |
| Air handling section<br>+ External auxiliary drain pan | Code | 3912096                   | 3912099    | 3912105     | 3912108     |
| Diffusion grille                                       | Code | 3943292                   |            | 3943294     |             |
| <b>Total price</b>                                     | Code | C063827                   | C063835    | C063908     | C063916     |
|  |      | ●                         | ●          | ●           | ●           |

All-or-nothing control device

| CONTROL ON AIR  |      |         |
|---|------|---------|
| Thermostat RTR 7015 - On / Off<br>3 speeds - manual - manual heating /<br>cooling | Code | 5201023 |
|   | ●    | ●       |

| CONTROL ON WATER                                |             |   |      |         |         |
|---|-------------|---|------|---------|---------|
| 2-way<br>valve kit                              | Composition | Thermostat RTR 7012 - On / Off<br>3 speeds - manual -<br>manual heating / cooling | Code | 5201024 |         |
|   |             |   | ●    | ●       |         |
|   |             | 2-way valve 230 v   | Code | C064750 | C064769 |
|   | ●           | ●   | ●    | ●       |         |
|   |             | Complete kit (thermostat, valve)  | Code | C064793 | C064807 |
|   |             |   | ●    | ●       | ●       |
| 2-way<br>valve kit                              | Composition | Thermostat RTR 7203 - On / Off<br>3 speeds - Automatic heating /<br>cooling       | Code | 5201021 |         |
|   |             |   | ●    | ●       |         |
|   |             | 2-way valve 230 v   | Code | C064750 | C064769 |
|   | ●           | ●   | ●    | ●       |         |
|   |             | Complete kit (thermostat, valve)  | Code | C064815 | C064823 |
|   |             |   | ●    | ●       | ●       |
| 4-way<br>valve kit<br>WITHOUT<br>change<br>over | Composition | Thermostat RTR 7012 - On / Off<br>3 speeds - manual -<br>manual heating / cooling | Code | 5201024 |         |
|   |             |   | ●    | ●       |         |
|   |             | 4-way valve 230 v   | Code | C064777 | C064785 |
|   | ●           | ●   | ●    | ●       |         |
|   |             | Kit complet (Thermostat + vanne)  | Code | C064831 | C064858 |
|   |             |   | ●    | ●       | ●       |
| 4-way<br>valve kit<br>WITHOUT<br>change<br>over | Composition | Thermostat RTR 7203 - On / Off<br>3 speeds - Automatic heating /<br>cooling       | Code | 5201021 |         |
|   |             |   | ●    | ●       |         |
|   |             | 4-way valve 230 v   | Code | C064777 | C064785 |
|   | ●           | ●   | ●    | ●       |         |
|   |             | Complete kit (thermostat, valve)  | Code | C064866 | C064874 |
|   |             |   | ●    | ●       | ●       |



# Air handling terminal units cassette type fan coil unit

Cooling 2-pipe coil + electric heater cassette type fan coil unit

| Coil   |      | 2-pipe cooling + electric heater |              |              |               |               |
|--|------|----------------------------------|--------------|--------------|---------------|---------------|
| Heater   |      | 1500 W                           |              |              | 3000 W        |               |
| MELODY   |      | 61<br>2TFC-E                     | 62<br>2TFC-E | 63<br>2TFC-E | 122<br>2TFC-E | 123<br>2TFC-E |
| Air handling section<br>+ External auxiliary drain pan | Code | 3912094                          | 3912097      | 3912100      | 3912106       | 3912109       |
| Diffusion grille                                       | Code | 3943292                          |              |              | 3943294       |               |
| <b>Total price</b>                                     | Code | C063843                          | C063851      | C063878      | C063924       | C083932       |

All-or-nothing control device

| CONTROL ON WATER                                |             |   |      |         |  |         |
|---|-------------|---|------|---------|--|---------|
| 2-way<br>valve kit                              | Composition | Thermostat RTR 7012 - On / Off<br>3 speeds - manual -<br>manual heating / cooling | Code | 5201024 |  |         |
|   |             | 2-way valve 230 V   | Code | 3940073 |  | 3940074 |
|   |             | <b>Complete kit</b> (thermostat, valve)   | Code | C064688 |  | C064696 |
| 2-way<br>valve kit                              | Composition | Thermostat RTR 7203 - On / Off<br>3 speeds - Automatic heating /<br>cooling       | Code | 5201021 |  |         |
|   |             | 2-way valve 230 V   | Code | 3940073 |  | 3940074 |
|   |             | <b>Complete kit</b> (thermostat, valve)   | Code | C064882 |  | C064890 |
| 4-way<br>valve kit<br>WITHOUT<br>change<br>over | Composition | Thermostat RTR 7012 - On / Off<br>3 speeds - manual -<br>manual heating / cooling | Code | 5201024 |  |         |
|   |             | 4-way valve 230 V   | Code | 3940077 |  | 3940078 |
|   |             | Change-over on piping   | Code | C064718 |  | C064726 |
| 4-way<br>valve kit<br>WITHOUT<br>change<br>over | Composition | Thermostat RTR 7203 - On / Off<br>3 speeds - Automatic heating /<br>cooling       | Code | 5201021 |  |         |
|   |             | 4-way valve 230 V   | Code | 3940077 |  | 3940078 |
|   |             | <b>Complete kit</b> (thermostat, valve)   | Code | C064998 |  | C063819 |

