# **Dometic**

EN	vehicles Installation manual
FR	Toilettes à cassette pour véhicules de loisirs Notice de montage
ES	Inodoros de cassette para vehículos de tiempo libre Instrucciones de montaje
РТ	Sanitário de cassete para veículos de recreio Instruções de montagem 60



CT4110, CTS4110

# **D** Dometic

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Dometic Group supplies a wide range of workshop equipment for service and maintenance of built-in air conditioners. Dometic Group also provides specially designed refrigerators for hotel rooms, offices, wine storage and transport and storage of medical products.

Our products are sold in almost 100 countries and are produced mainly in wholly-owned production facilities around the world.

# **D** Dometic

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# **Dometic**

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3



# 1.0 General

# 1.1 Guide to these installation instructions

Before installing the toilet read and understand the contents of this manual.

These instructions provide you with the necessary guidance for the proper installation of the toilet. **Observe the safety instructions in particular.** Observing the instructions and handling recommendations is important for dealing with the toilet safely and for protecting you from injury and the toilet from damage. You must understand what you have read before you carry out a task.

# 1.2 Copyright protection

The information, texts and illustrations in these instructions are copyright protected and are subject to industrial property rights. No part of these instructions may be reproduced, copied or utilised in any other way without written authorisation by Dometic GmbH, Siegen.

# 1.3 Explanation of symbols used in this manual

# **Warning notices**

Warning notices are identified by symbols. A supplementary text gives you an explanation of the degree of danger.

Observe these warning notices rigorously. You will thus protect yourself and other people from injury, and the sanitation system from damage.



# **CAUTION!**

CAUTION indicates a potentially hazardous situation which may result in minor or moderate injury if the given instructions are not adhered to.

## NOTICE!

NOTICE (used without the safety alert symbol) indicates a potentially hazardous situation which may result in damage to the appliance if the given instructions are not adhered to.

#### Information



INFORMATION gives you supplementary and useful guidance.

## **Environmental tip**



Environmental tip gives you useful guidance for saving energy and disposal of the appliance.

# 1.4 Limitation of liability

All information and guidance in these operating instructions were prepared after taking into consideration the applicable standards and regulations as well as the current state of the art. **Dometic** reserves the right to make changes at any time which are deemed to be in the interest of improving the product and safety.

**Dometic** will assume no liability for damage in the case of:

- non-observation of the installation instructions
- non-observation of the operating instructions
- application not in accordance with the regulations or provisions
- use of non-original spare parts
- modifications and interferences to the appliance

# 1.5 Warranty

Warranty arrangements are in accordance with the normal conditions applicable for the country concerned. For warranty or other maintenance, please contact our customer services department. Any damage due to improper use is not covered by the warranty. The warranty does not cover any modifications to the appliance or the use of **non-original Dometic** parts. The warranty does not apply if the installation and operating instructions are not adhered to and no liability shall be entertained.

# 1.6 Environmental notices



## Use of sanitary additives

In order to ensure that the recyclable packaging materials are re-used, they should be sent to the customary local collection system.

# 2.0 Safety instructions

# 2.1 Intended use

This toilet is designed for installation in recreation vehicles such as caravans or motorhomes.

## 2.2 Installation notes

The toilet must be in principle installed so that it is accessible for maintenance work, can be easily installed and dismantled and removed from the vehicle without great effort.

## **NOTICE!**

The toilet must be installed by trained staff only.

# 2.3 Standards and regulations

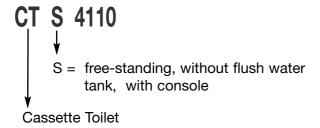
Installation and connection of the sanitation system must comply with the latest technical regulations, as follows:

- The electrical installation must comply with national and local regulations.
- Electrical wiring regulations

# 3.0 Description of model

# 3.1 Model identification

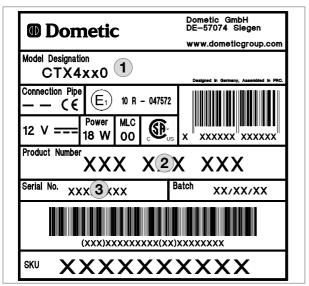
Example:



The CTx 4110 cassette toilet consists of a toilet which is installed fixed in the vehicle and a removable, mobile cassette as a blackwater tank. The cassette can be accessed from the outside through a door. The toilet receives the flush water from a fresh water tank installed in the vehicle.

# 3.2 Toilet identification label

The identification label contains all important details. You can read off from this the model identification, the product number and the serial number. You will find the identification label within the cassette housing after removing the cassette.



Example

Fig. 1

- 1 = Model number
- 2 = Product number
- 3 = Serial number

# 3.3 Technical data

Supply voltage: 12 V DC

Current consumption: max. 5 A with external

pump.

Dimensions: s. details on page 15

**Operating temperature:** 

0 °C up to +50 °C (32 °F up to +122 °F)

Required pump output: minimum 7 I/min

(1.85 US.gal./min)

# Inspection/Certification





(E<sub>1</sub>) 10 R - 047317

### **Explanation of** 3.4 components

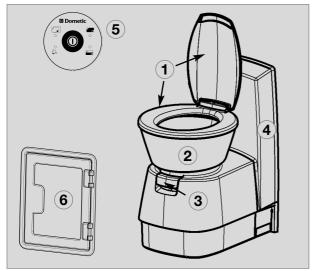


Fig. 2

- 1 = Removable cover and seat
- 2 = Toilet bowl
- 3 = Emptying blade for the toilet bowl
- 4 = Console
- 5 = Level indicator / control panel (flush)
- 6 = Service door

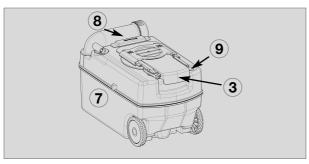


Fig. 3

- 3 = Emptying blade for the toilet bowl
- 7 = Cassette tank (capacity 19 I / 5.02 US.gal.)
- 8 = Pour out spout
- 9 = Vent button for emptying

#### Installing the toilet 4.0

#### 4.1 Installing the service door

The description for the installation of the service door can be found in the document supplied Dometic Seitz SK4, SK5 (optional/ depending on model).

#### 4.2 **Create wall apertures**

#### 4.2.1 Wall aperture service door

Make an aperture in the wall for the cassette with the following dimensions:

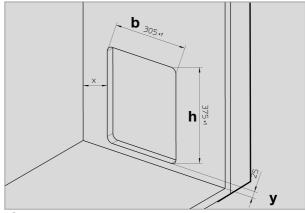
## for service door SK4

y = 25 mm (0.98 "); b = 305 mm (12.01 ") andh = 375 mm (14.76 "),

### for service door SK5

 $y^{min} = 12.5 \text{ mm } (0.49 \text{ "}) \text{ and } y^{max} = 28 \text{ mm } (1.1 \text{ "});$ b = 310 mm (12.2 ") and h = 360 mm (14.17 ").

The x value results from the toilet installation.



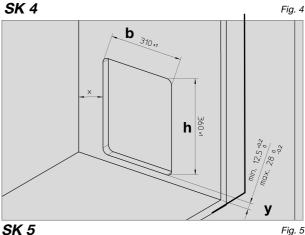


Fig. 5

# 4.3 Installing the toilet

## NOTICE!

All components of the system must be installed in frost-protected areas. In minus temperatures there is a risk of damage due to frost.

Allow sufficient space so as not to limit the operation of the emptying valve.

Install the toilet against an upright wall only.

When installing the toilet in a wet room, we recommend connecting the toilet with the shower tub. The toilet pedestal is fitted with a projecting flange in order to cover the top rim of the shower tub.

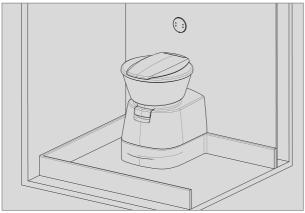


Fig. 6

# 4.3.1 Installing the CT 4110 toilet

The free-standing CT 4110 model has no integrated water tank. Install this model so that the wall behind it can absorb the control panel of the toilet, the electric connections and the water tank, if applicable. It is ideal to set a box in front of the room wall, as illustrated in Fig. 7. Install the control and operator panel in immediate proximity to the toilet (see Section 4.3.1.2).



Fig. 7

Note that the cassette projects 120 mm (4.72 ") (a) out of the cassette housing (Fig. 8). The pedestal height (b) ranges from 50 to 110 mm (1.97 " to 4.33 "), depending on the model.

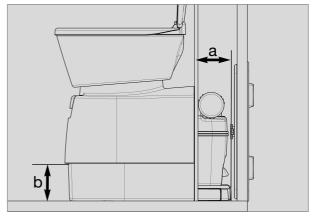


Fig. 8

## 4.3.1.1 Fitting the CT 4110 toilet

Once the toilet is installed in the desired position, bolt down the floor plate with the six screws (enclosed) (Fig. 9).

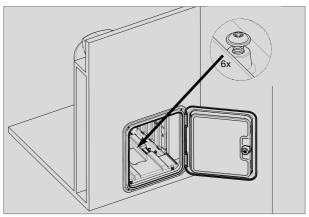


Fig. 9

Then attach the toilet housing (with no more than 7 screws, **not enclosed**) to the wall (Fig. 10, 11).

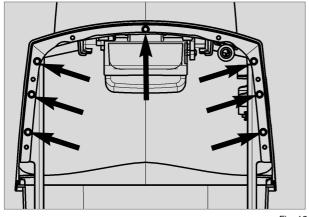


Fig. 10

Screws  $\emptyset = 4.2 \text{ mm } (0.165 \text{ "})$ 

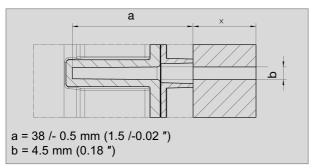


Fig. 11

# 4.3.1.2 Installing the control and operator panel of the CT 4110 toilet

Install the control and operator panel for the CT 4110 toilet in an easily accessible position on the wall. First cut the aperture in the wall (Fig. 12, 13). Use **true-to-scale template (1)** to make the wall aperture (see Item 4.9).

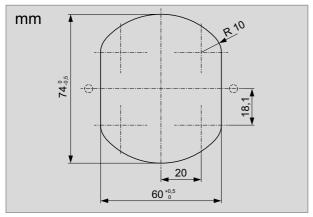


Fig. 12

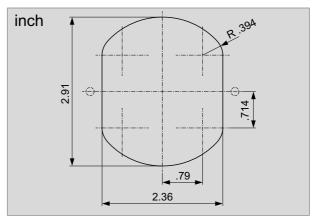


Fig. 13

In order to insert the control panel in the wall aperture, press the holding springs (1) of the control and operator panel back.

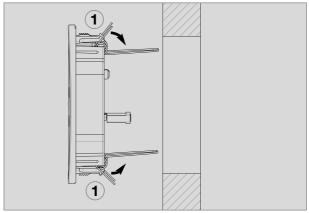


Fig. 14

Connect the electric cables on the couplers to install the control and operator panel (are supplied separately).

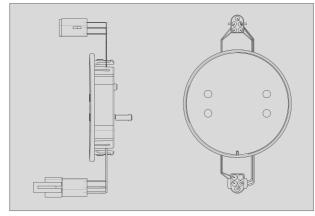


Fig. 15



# 4.3.2 Placing the CTS 4110 toilet

The CTS 4110 model has no integrated water tank

The control and operator panel is integrated in the housing with this model.

This toilet can be installed directly against the room wall (see Fig. below). To fit the toilet and the console, a previously installed wall holder is used (see Section 4.3.2.1).

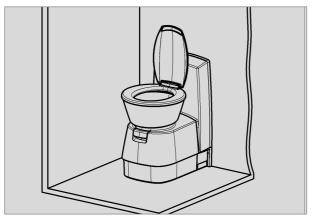


Fig. 16

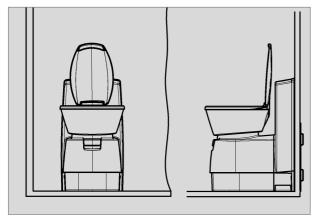
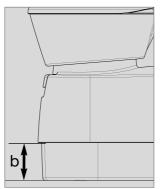


Fig. 17



The pedestal height (b) amounts 110 mm (4.33 ").

Fig. 18

# 4.3.2.1 Fitting the wall holder

Fit the wall holder (Fig. 19) in the designated position (see table, Fig. 20, 21)

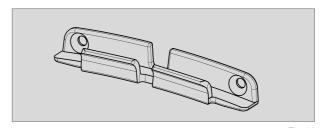


Fig. 19

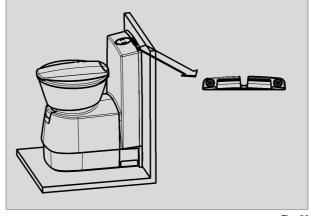


Fig. 20

# Fitting height of the wall holder:

Model	а	b
CTS 4xxx	90 mm (3.54 ")	651.5 mm (25.65 ")

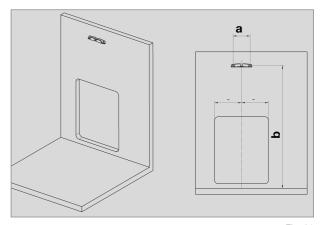


Fig. 21

# 4.3.2.2 Fitting the CTS 4110 toilet

Place the entire toilet module in the desired position in front of the wall holder. Lift the toilet. Then place the toilet so that the part on the side of the wall of the housing hooks into the the wall holder (Fig. 23).

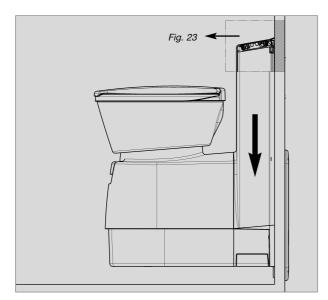


Fig. 22

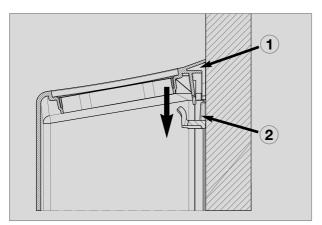


Fig. 23

- 1 = Wall connection console
- 2 = Wall holder

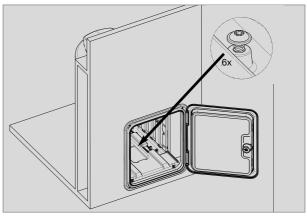


Fig. 24

If the toilet is installed in the desired position, bolt down the floor plate with the four screws.

To allow better cleaning of the cassette housing the base plate is additional equipped with two covers (1) for the fixing screws (models CTx 4110 only).

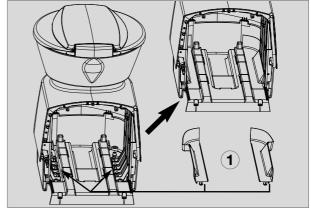


Fig. 25

Finally insert the mobile tank cassette.

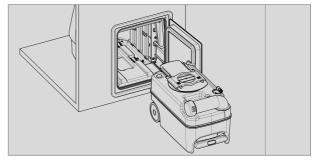


Fig. 26

# 4.4 Water connection

The water supply is connected via an eletric solenoid valve (1), which is fitted in the toilet housing. Fit the fresh water supply pipe to the water inlet (2) with a 1/2 " NPT fitting.

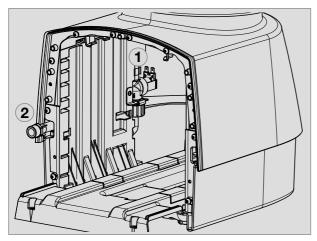


Fig. 27

Then check the leak tightness.

# NOTICE!

The operating pressure range (waterpressure) of the electric solenoid valve (1) must not exceed 6 bar (87 PSI).

The electric solenoid valve will be damaged by excessive pressure.

### 4.5 Ventilation

### 4.5.1 Ventilation with SK 5

Open the duct (a) for the ventilation hose in the top area of the door frame (press out spraying varnish on the outside, drill through on the inside).

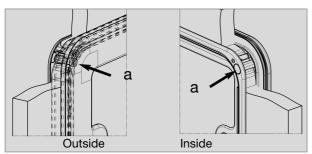
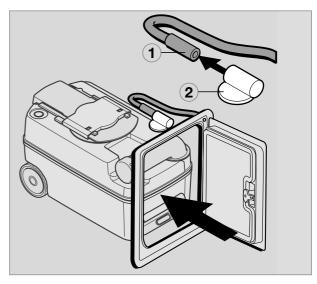


Fig. 28

Place the ventilation hose on the integrated ventilation aperture of the service door as illustrated.

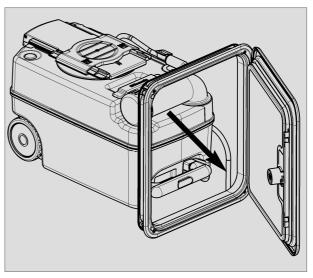


Ventilation at SK5

Fig. 29

### 4.5.2 Ventilation with SK 4

Create an aperture in the floor (diameter approx. 12 mm (0.47 ")). Insert the ventilation hose into this aperture.



Ventilation at SK4

Fig. 30



The SK4 service door is optionally available.

# 4.6 Electric connection

# 4.6.1 System diagrams

# 4.6.1.1 General system diagram



# CAUTION!

Electric connection must be carried out by trained staff.

Note the following instructions before installation of the cassette toilet:

- Connect the toilet to a suitable power supply via the main connection block of the vehicle (Fig. 31).
- The toilet must not be directly connected in parallel to other electrical circuits, otherwise malfunctions or damage to the toilet controller can occur (Fig. 32).
- A line fuse is not necessary as the toilet is fused internally.

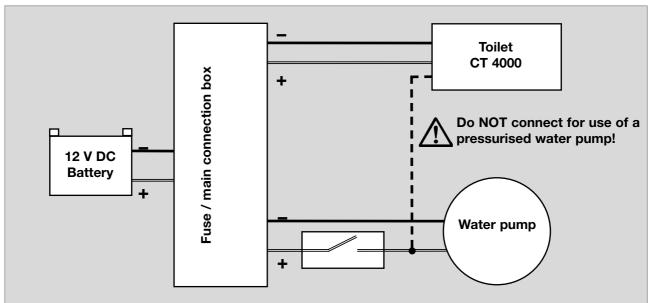


Fig. 31

# NOTICE!

Do not connect toilet to the power supply directly in parallel with other electrical circuits.

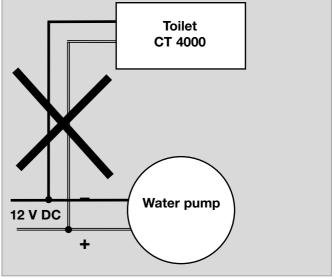
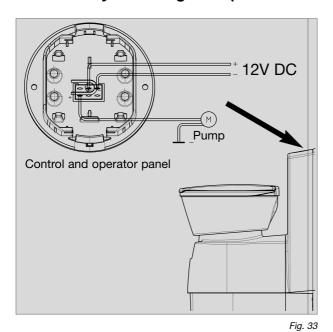


Fig. 32



# 4.6.1.2 System diagrams (CTS 4110 models with external water pump)



Supply voltage: 12 V DC

12V connection cable profile : min. 1.5 mm<sup>2</sup>

**Toilet control fuse**: 7.5 A (integrated automobile fuse)

Current consumption of the pump: max. 5A

# NOTICE!

The external water pump must not exceed a nominal power of 60 W (12V/5A).



The external water pump is not included in the scope of delivery.

# 4.7 Circuit diagram (external water tank)

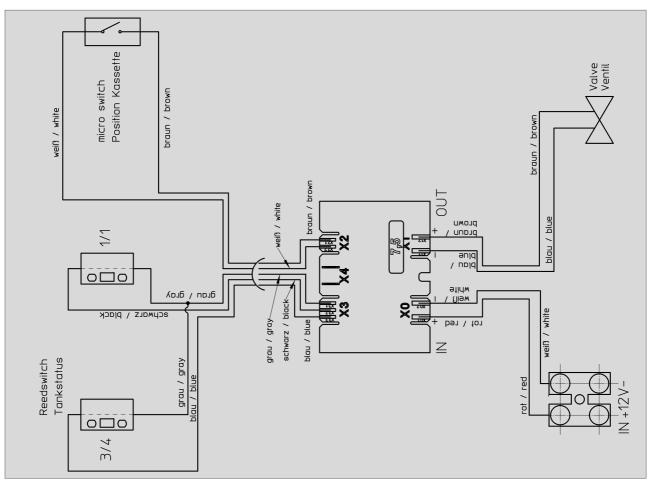
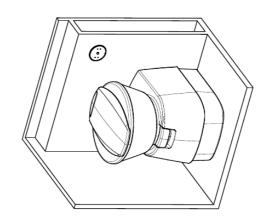


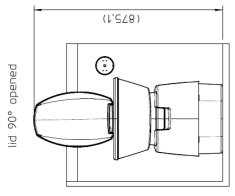
Fig. 34

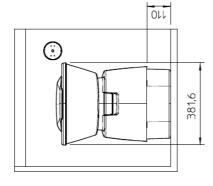
# 4.8 Dimensioned sketches

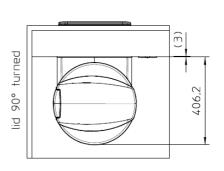
# 4.8.1 CT 4110

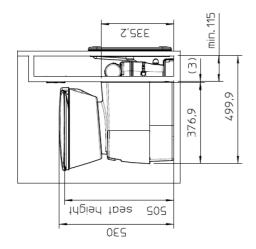
Dimensions in mm

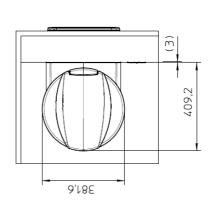




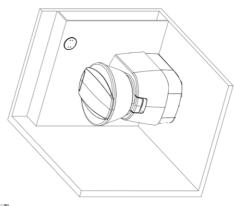


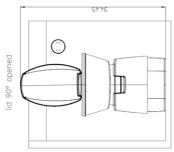


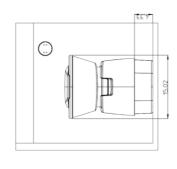


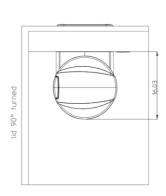


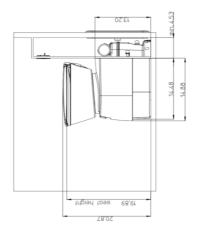
# Dimensions in inch

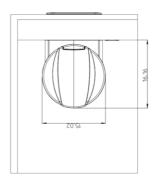






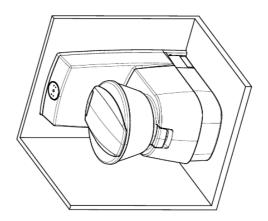


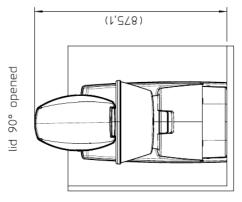


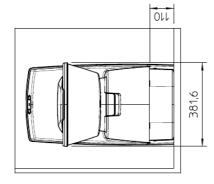


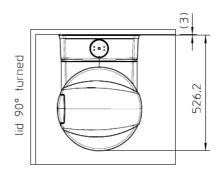
4.8.2 CTS 4110

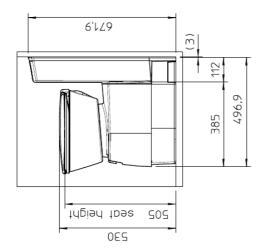
Dimensions in mm

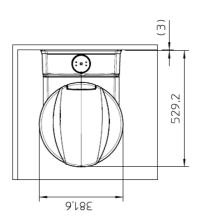




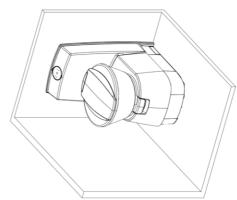


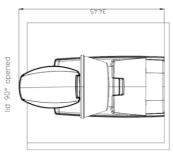


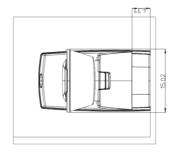


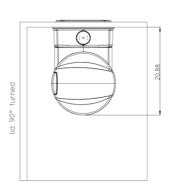


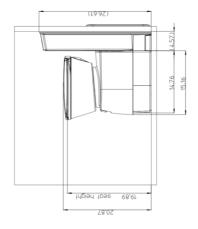
# Dimensions in inch

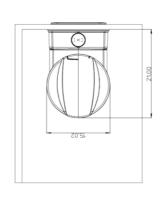












# 4.9 Template for control and operator panel installation

Original size

