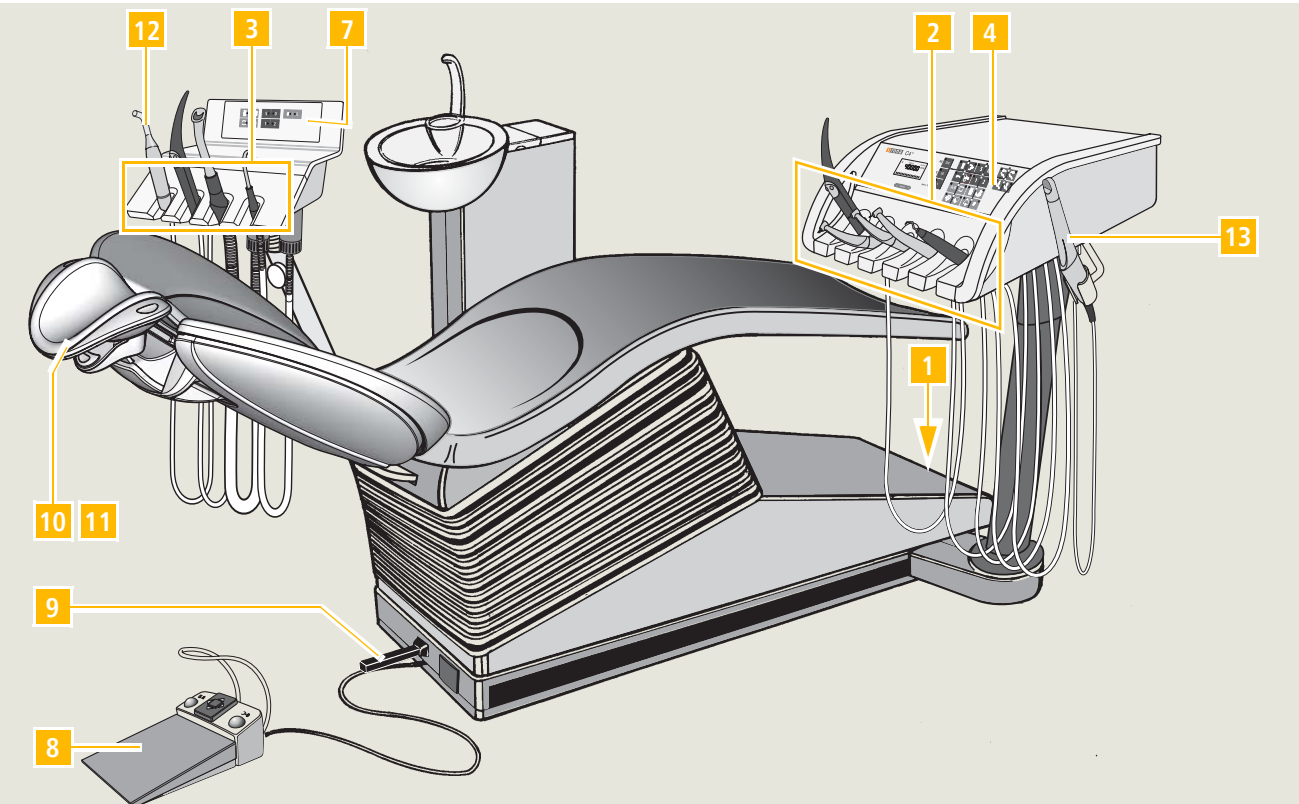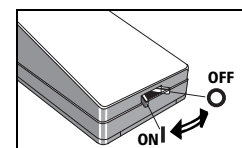## Overview image

Dear Customer

You can use these brief operating instructions to quickly find the most important control procedures and functions of your dental treatment center.

However, they do not describe all of its functions. Therefore, they cannot replace the full operating instructions of your dental treatment center with its many important descriptions and warnings.

Care and cleaning of the treatment center are described thoroughly in the document entitled "Care and Cleaning by the Practice Team". A quick overview of the required measures is provided in a document entitled "Care and Cleaning Plan for Treatment Centers".

Your C4+ Team

2 DE instrument positions

| Position 1	Position 2	Position 3	Position 4	Position 5
SPRAYVIT L	Motor	Motor	Motor	SIROSONIC L
	Highspeed handpiece	Highspeed handpiece	Highspeed handpiece	Highspeed handpiece
			Mini L.E.D.	Mini L.E.D.
				SIROSONIC L

At pos. 2 - 4, the motor and highspeed handpiece can be replaced at any time
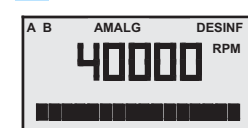
on the side of the dentist element
Camera

1 Unit main switch

During power-up, the treatment center automatically performs a self-test.

↳ After 20 seconds, the "READY" reading appears on the display.

3 AE instrument positions

Position 1	Position 2	Position 3	Position 4
Mini L.E.D.	SPRAYVIT L	Suction handpiece	Saliva ejector
3. Suction hose	SPRAYVIT		
Camera	Camera		

4 Control panel, dentist element

C4+

A AMALG DESINF
40000 RPM

40 100
20 50
0.2 1
rpm x 1000

Mode

A/B
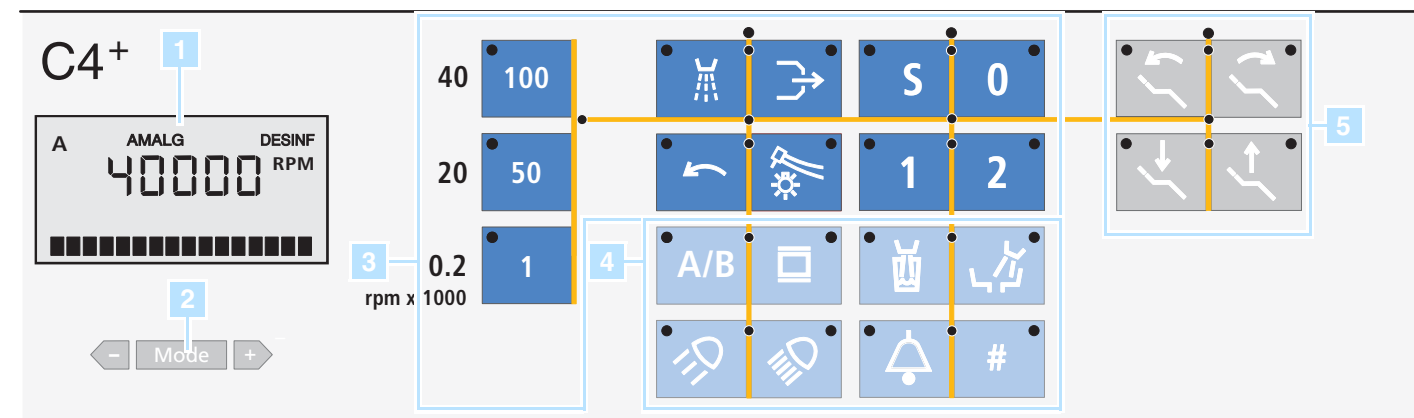
1 Display for indicating unit status

A B AMALG DESINF
40000 RPM

AMALG appears when the amalgam rotor needs to be replaced.

DESINF starts flashing when DENTOSEPT P must be refilled.

A appears when user A is selected.
B appears when user B is selected.

2 Mode key

Mode − +

Mode key with + / − keys for programming basic settings

You can go on to the next basic setting dialog by repeatedly pressing the Mode key.

− +

You can also use the + / − keys to set the following functions directly once they have been selected:

■ Brightness of instrument lights
■ Brightness of the operation light
■ Tumbler filling time
■ Cuspidor flushing time

3 Main functions – dark blue keys

40 100
20 50
0.2 1
rpm x 1000

0.2 1
rpm x 1000

Quick setting keys for instrument intensity and speed for:

■ Electric motors
■ Ultrasonic scalers
■ HF electrosurgery

If you press a key for less than 0.5 s, the value indicated next to that key appears on the display).

To set intermediate values, keep the key pressed longer than 0.5 s.

Key 1 is also used to activate the purge and autopurge functions.

If the cursor is in the intensity setting block, the intensity can also be set by moving the cursor back and forth with the foot switch.

Spray ON/OFF
on burr drives

Chip blower
on burr drives

CCW rotation ON/OFF
for electric motor

Instrument light ON/OFF
Pressing this key for a while displays the light intensity settings dialog.

Mouth rinsing position chair program
with last-position memory function
Programmable cuspidor flushing and/or tumbler filling

Chair program 0
Entry/exit position (freely programmable)

Chair programs 1 and 2
(freely programmable)
The four program keys are also used for reprogramming the chair programs.

4 Additional functions – light blue keys

A/B

Preselection of user A or B
All instruments must be in place.
You cannot switch users after picking up an instrument.

X-ray image viewer ON/OFF
Also WHITE SCREEN activation for video option

Composite key ON/OFF
for SIROLUX operation light,
reduced light intensity ≤ 8,000 lux for processing composite materials

A 100%
OPERATING LIGHT

SIROLUX operation light ON/OFF
for normal light intensity (24,000 lux at 100 %)
Pressing this key for a while displays the light intensity settings dialog: OPERATING LIGHT

A 10
CUP FILL TIMER

Tumbler filling
Pressing this key for a while displays the settings dialog: CUP FILL TIMER

A 420
BOWL FLUSH TIMER

Cuspidor flushing
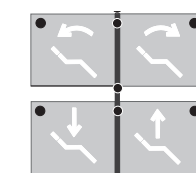Pressing this key for a while displays the settings dialog: BOWL FLUSH TIMER

Freely selectable function
e.g. call key, always functions as a button (connected by the service engineer)

Freely selectable function
The function can be preset as a button or switch in the Mode dialog.
(Connected by the service engineer).

5 Chair functions – gray keys
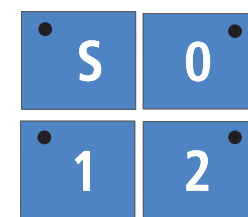
for manual chair settings:
Tilt backrest backward or forward.

Height adjustment down/up

6 Additional functions of the control panel SIVISION keys

Apart from the previously described functions, the keys of the dentist element have additional functions in connection with SIVISION. They are described in section 13 .

5 Programming chair positions

S 0
1 2

The four factory-set programs can be changed individually by users A and B (observe the display).

■ Programs 1 and 2
■ Entry/exit program 0
■ Mouth rinsing program S

➢ You can move the chair to the desired treatment position by pressing the corresponding chair function key.

➢ To have the SIROLUX FANTASTIC operation light switch on or remain off when the chair reaches the programmed treatment position, you must switch the lamp ON or OFF now. This setting is then also programmed.

➢ Now move the dentist element to the desired treatment position by hand.

➢ To save the program settings, press the desired program key for approx. 3 seconds.

↳ An acoustic signal sounds and the LED in the corresponding key lights up.

6 Saving instrument functions

A 40000 RPM

40 100

40 100

A/B

The factory-set instrument programs can be changed individually by user A and user B.

➢ Select the corresponding user, i.e. A or B, pick up an instrument and set it according to your wishes.

Example for electric motor:

■ 40,000 rpm
■ with cooling spray
■ CW rotation
■ with instrument light

➢ To save the settings, press key A/B for a while (approx. 3 s).

↳ An audible signal sounds. These settings are then activated whenever the instrument is picked up.

7 Control panel, assistant element

2 1 2

S 0
1 2
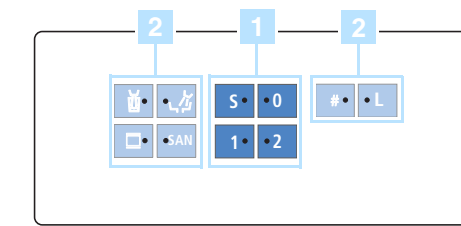
1 Main functions – dark blue keys

Mouth rinsing position chair program
with memory function of last treatment position

Chair program 0
Entry/exit position (freely programmable)

Chair programs 1 and 2
(freely programmable)
The four program keys are also used for reprogramming the chair programs.

2 Additional functions – light blue keys

Tumbler filling
ON/OFF

Cuspidor flushing
ON/OFF

X-ray image viewer ON/OFF
Also WHITE SCREEN activation for SIVISION

Sanitation of the treatment center
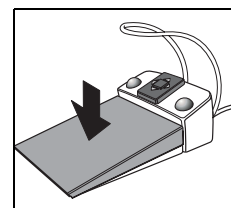This key can be used to start the treatment center sanitation program.

Freely selectable function
The function can be preset as a button or switch in the Mode dialog.

Light ON/OFF
■ With SPRAYVIT picked up: Instrument light
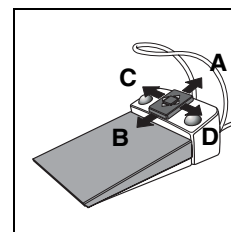■ With SPRAYVIT in holder: Operation light

8 Foot switch for C⁺

Pedal (foot switch)

Activating the instrument
✓ An instrument is removed.
➤ Step on the foot pedal.
✎ The instrument starts running.
✎ If appropriate, intensity control relative to pedal movement (if "speed controller foot switch" has been preset under Mode).
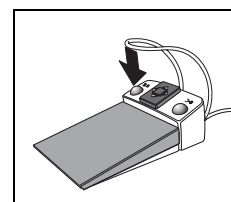
4-way foot control plate

Cursor control
✓ The cursor control is activated (see Mode dialog).
➤ Shift 4-way foot control plate.

Cursor directions
A: forward – cursor up
B: back – cursor down
C: to the left – cursor to the left
D: to the right – cursor to the right
✎ Cursor navigation along the marked path and triggering of the corresponding key function.

Left button

Programmed movement to mouth rising position S
✓ All instruments are in place.
➤ Press left key.
➤ Programmed movement of chair to mouth rinsing position **S** or the last treatment position (depending on starting situation).

Spray ON/OFF
✓ An instrument is removed.
➤ Press left key.
✎ Toggle between spray ON and spray OFF, or SIVISION function.

Right button
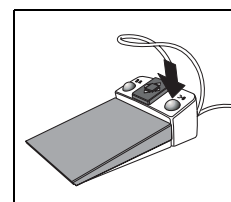
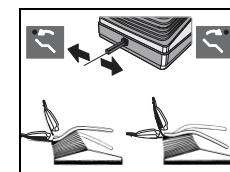**Programmed movement to position 0**
✓ All instruments are in place.
➤ Press right key.
➤ Programmed movement of the chair to entry/exit position 0.

Activating the chip blower
✓ An instrument is removed.
➤ Press right key.
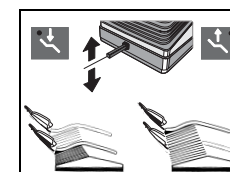✎ Chip blower active for duration of actuation, or SIVISION function.

9 4-way foot control (optional)
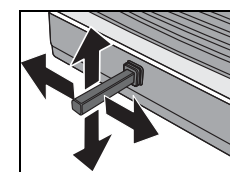
Positioning the patient

Backrest
Lever to the **left**:
Backrest moves to the **rear**

Lever to the **right**:
Backrest to the **front**

Height adjustment
Lever **up**:
Chair moves **up**

Lever **down**:
Chair moves **down**

Suction via 4-way foot control

When the large spray aspirator is removed from its holder, the suction current can be switched on and off with the 4-way foot control.

This function must be preselected in the mode dialog "SUCTION VIA 4-WAY FOOT CONTROL".

10 MultiMotion (optional)

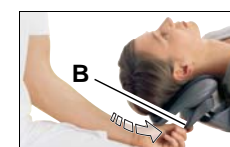### Positioning the patient with the control elements on the MultiMotion head rest

Pulling out/pushing in the headrest
The headrest can be adjusted to the patient's height by pulling out or pushing in the headrest extension.

Mandibular position
➤ Pull the headrest out of the guide by pulling handle **A**.

Maxillary position
➤ Take the load off the headrest by lifting it slightly.
➤ Press release **B** on the handle.
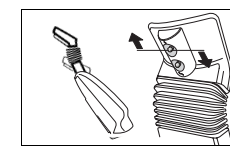➤ Let the headrest slide down slowly.

Rotation and tilt
➤ Press and hold one or both of the two lateral control elements (**C**).
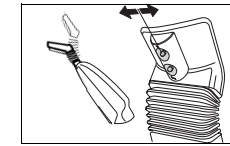➤ Set the headrest to the required position and let go of the control elements (**C**) again.

11 4-way control of headrest (optional)

Positioning the patient with the switches on the motorized head rest
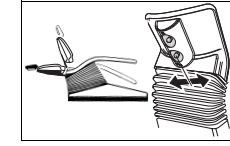
Moving the headrest in/out
Upper 4-way control **up**:
Headrest moves **out**
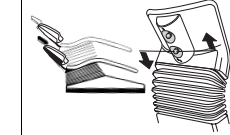
Upper 4-way control **down**:
Headrest moves **in**

Tilting the headrest
Upper 4-way control **to the left**:
Headrest tilts **back**

Upper 4-way control **to the right**:
Headrest tilts **forward**

Backrest
Lower 4-way control **to the left**:
Backrest to the **rear**

Lower 4-way control **to the right**:
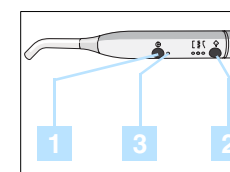Backrest to the **front**

Height adjustment
Lower 4-way control **down**:
Chair moves **down**

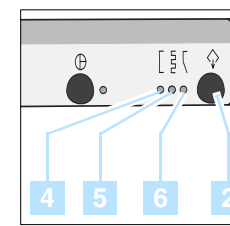Lower 4-way control **up**:
Chair moves **up**

12 Mini L.E.D.

Keys and LEDs

1 ON/OFF switch
2 Function button
3 Status control lamp

| green	Normal operation
red, flashing	Overheat protection

Operating mode displays

The **Mini L.E.D.** has three different modes. To select the desired mode, press function key **2**.

4 Quick curing mode
The Mini L.E.D. operates at full power for 10 seconds.
5 Pulse curing mode
The Mini L.E.D. runs at full power in the "Pulse" mode
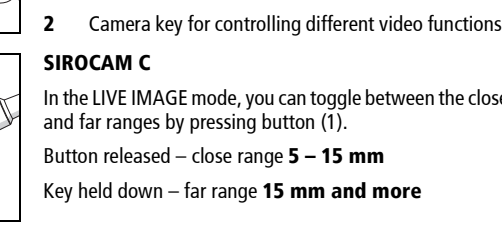6 "Soft start" mode

13 Patient communication system

Cameras
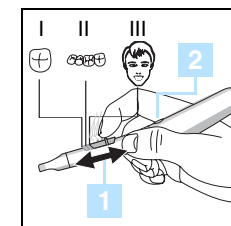
SIROCAM 3
1 Slide switch for presetting the focusing range **before** inserting the camera in the oral cavity.

Pos. **I**	Detail exposure
Pos. **II**	Overview exposure
Pos. **III**	Whole-face exposure

2 Camera key for controlling different video functions

SIROCAM C
In the LIVE IMAGE mode, you can toggle between the close and far ranges by pressing button (1).

Button released – close range **5 – 15 mm**

Key held down – far range **15 mm and more**

Operating modes

VIDEO mode

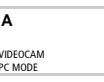The camera image is directly displayed on the SIVISION monitor. The quad image memory of the camera is activated.
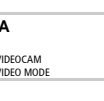
If the camera is the active instrument, "**VIDEOCAM**" and the operating mode "**VIDEO MODE**" appear on the display.

PC mode

The camera image is first processed on the PC and then the image generated on the PC is displayed on the SIVISION monitor.

The proper use of the PC mode is described in detail in the unit operating instructions. The configuration procedure is described in the instructions "PC Software Installation Manual", REF 59 11 719 (on CD).

PC mode <> VIDEO mode selection
✓ with the camera **removed**
➤ press key A/D on the control panel

All of the video functions that are activated by pressing the control panel keys can also be triggered via the foot switch with the cursor functions.

Second monitor function without camera
The monitor integrated in the treatment center serves as primary or secondary monitor for the externally connected PC. The factory settings and configuration procedure is described in the instructions "PC Software Installation Manual", REF 59 11 719 (on CD).
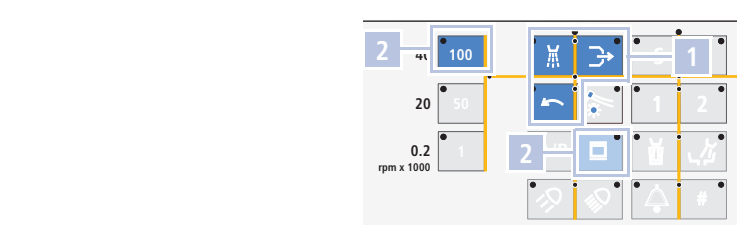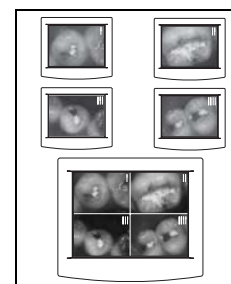
Grasping the camera ergonomically

The risk of blurred exposures can be reduced considerably by using a finger resting on the patient's chin as a "makeshift camera stand".
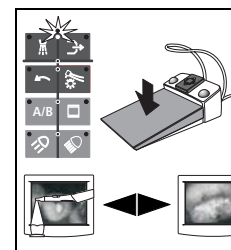
1 Displaying images, saving and deleting in the Video mode

Display of still images
The camera can save 4 consecutive still images (identified with **I**, **II**, **III** and **IIII**).

A 5th view shows a **QUAD IMAGE** in which these 4 still images are tiled on the screen.

Saving still images in the video camera
✓ The cursor is located in the **Instrument** key block.
➤ Remove the camera (→ live image).
➤ Step on the foot pedal (→ still image **I**).
➤ Step on the foot pedal again (→ live image).
➤ Step on the foot pedal (→ still image **I** is overwritten) etc.

To save still images **II** to **IIII**, switch to the next image memory location (see "Switching to the next image") and repeat the procedure.
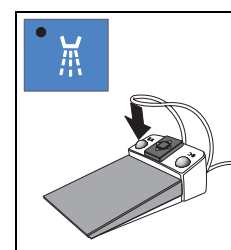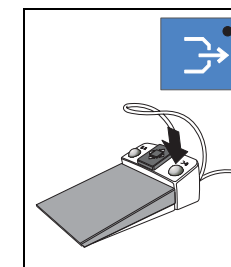
Switching to the next image
✓ with instruments in place **or** camera picked up
➤ Press the "Spray ON/OFF" key **or**
➤ with **the camera removed**: actuate the left foot switch key.
✎ In **SINGLE IMAGE** mode, switching to the next memory location.
✎ In **QUAD IMAGE** mode, switching to memory location **I**, **II**, **III** or **IIII** for image selection.
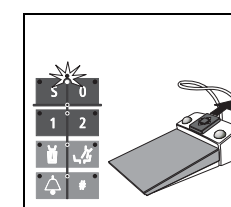
Switching to the next image with the cursor
✓ with the camera removed
✎ The cursor is in the **chair programs** key block, level 1.
➤ 4-way foot control plate forward
✎ Switches through images:
STILL IMAGE **I**, STILL IMAGE **II**, STILL IMAGE **III**, STILL IMAGE **IIII**, QUAD IMAGE, STILL IMAGE **I**, STILL IMAGE **II**......

Toggle between QUAD IMAGE and SINGLE IMAGE
✓ with instruments in place **or** camera picked up
➤ actuate "Chip Blower" key **or**
➤ with **the camera removed**: Actuate right left foot switch key.
✎ Toggle between **QUAD IMAGE** and **SINGLE IMAGE**.
✎ When you switch to a **SINGLE IMAGE**, the image previously selected in the **QUAD IMAGE** is displayed.

Clearing the memory
✓ Only with the camera removed and active!
➤ Actuate the "CCW rotation" key.
✎ Clears all camera image memory locations. The **LIVE IMAGE** mode for image **I** appears.

2 White screen/black screen

White screen
Switches **WHITE SCREEN** ON or OFF on the SIVISION monitor.

Black screen
Toggles between any view and a **BLACK SCREEN**. The previous view reappears when you press this key again.