



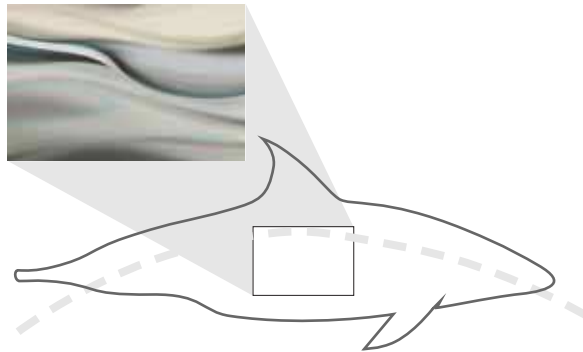
DOLPHIN
ALAVO

INSTALLATION GUIDE

VOL I

THE SKINS STORY

ALAVO



HECTORS DOLPHIN

Native to New Zealand, particularly the South Island, the Hector's dolphin is the smallest dolphin in the world. It is also the rarest.

The remaining number of adults is estimated to be 55. Hector's dolphins live in groups of two to eight animals and feed both at the surface of the ocean as well as the sea floor.

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INSTALLATION INSTRUCTIONS

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IMPORTANT

Ensure you have read through and understood this document fully before attempting to install an Alavo system.



When space is at a premium, and energy-efficiency is a priority, this modular, touch-free, behind-mirror handwash system from Dolphin has got all the answers - quick to install, easy to replenish, and a pleasure to use.

At Dolphin we are always happy to help. Simply pick up the phone, pop in to see the team or drop us an email.

It's a Dolphin thing...

CONTACT US

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E info@dolphinsolutions.co.uk
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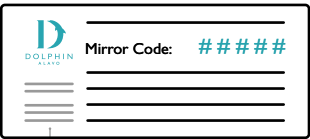
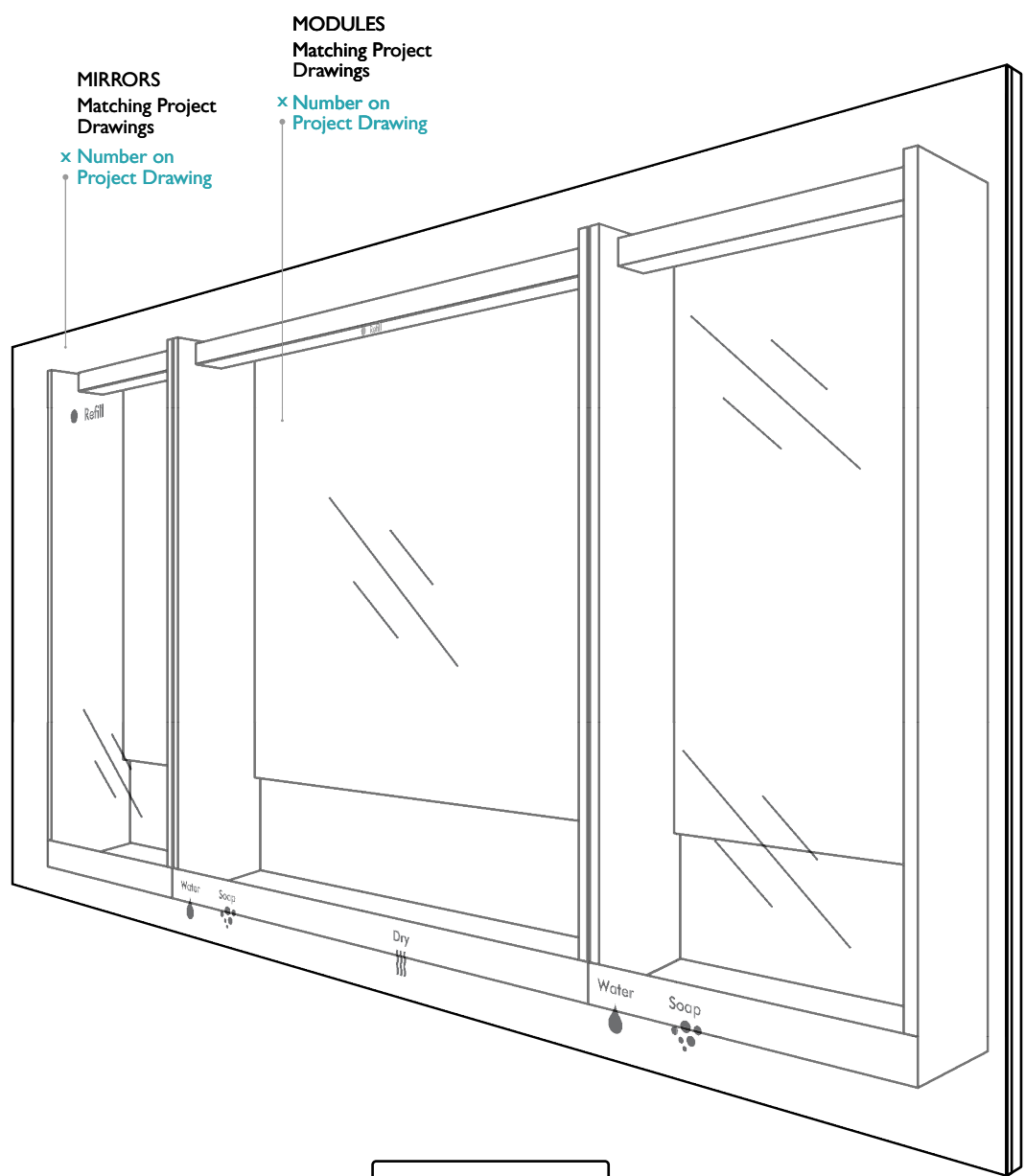
© Dolphin Solutions Ltd.



PARTS AND FIXINGS LIST

PARTS AND FIXINGS INCLUDED WITH ALAVO

Please ensure you are in possession of all parts and fixings listed below.



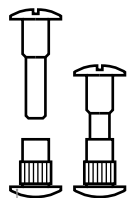
MIRROR LABELS
Identifying
Mirrors

x 1 per
Mirror
ON MIRRORS

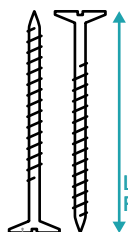


MODULE LABELS
Identifying
Modules

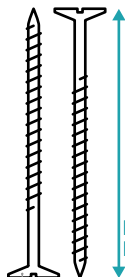
x 1 per
Module
ON MODULES



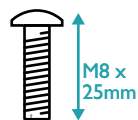
BOLTS
Connecting Modules
x 2 per Module



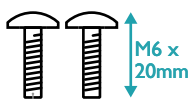
SCREWS
Fixing Installation Bracket
x As Required
NOT SUPPLIED



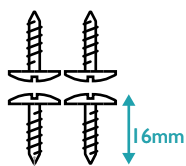
SCREWS
Fixing Modules
x As Required
NOT SUPPLIED



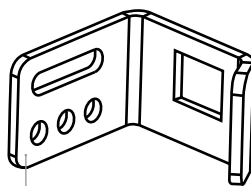
BOLTS
Attaching Hinges
x 1 per Hinge



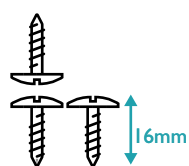
BOLTS
Attaching Strut Brackets
x 2 per Strut



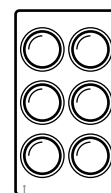
SCREWS
Attaching Light Sensor
x 4 per Light Sensor



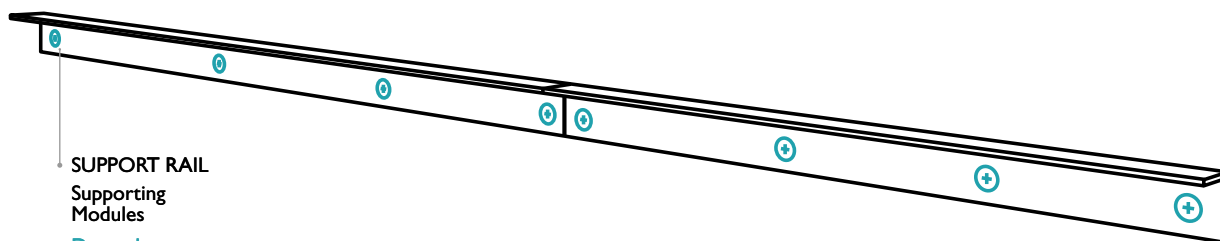
LOCK KEEPS
Locking Mirrors
x Number on Project Drawing



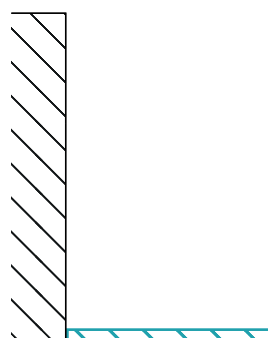
SCREWS
Attaching Lock Keeps
x 3 per Lock Keep



MOUNT BUTTONS
Buffer Behind Mirrors
x 2 per Mirror



SUPPORT RAIL
Supporting Modules
x Dependent on Alavo Width



NOTE

If two systems are being installed adjacent to each other follow project drawings for support rail datums.

If adjacent systems vary in height, the support rails will have different horizontal datums.

**** IT IS THE CONTRACTOR'S
RESPONSIBILITY TO ENSURE
THERE IS SUFFICIENT STRENGTH
IN THE WALL AND FIXINGS TO
SUPPORT ALAVO ****

POWER AND WATER REQUIREMENTS

POWER REQUIREMENTS

Wiring and power requirements when installing the Alavo system.

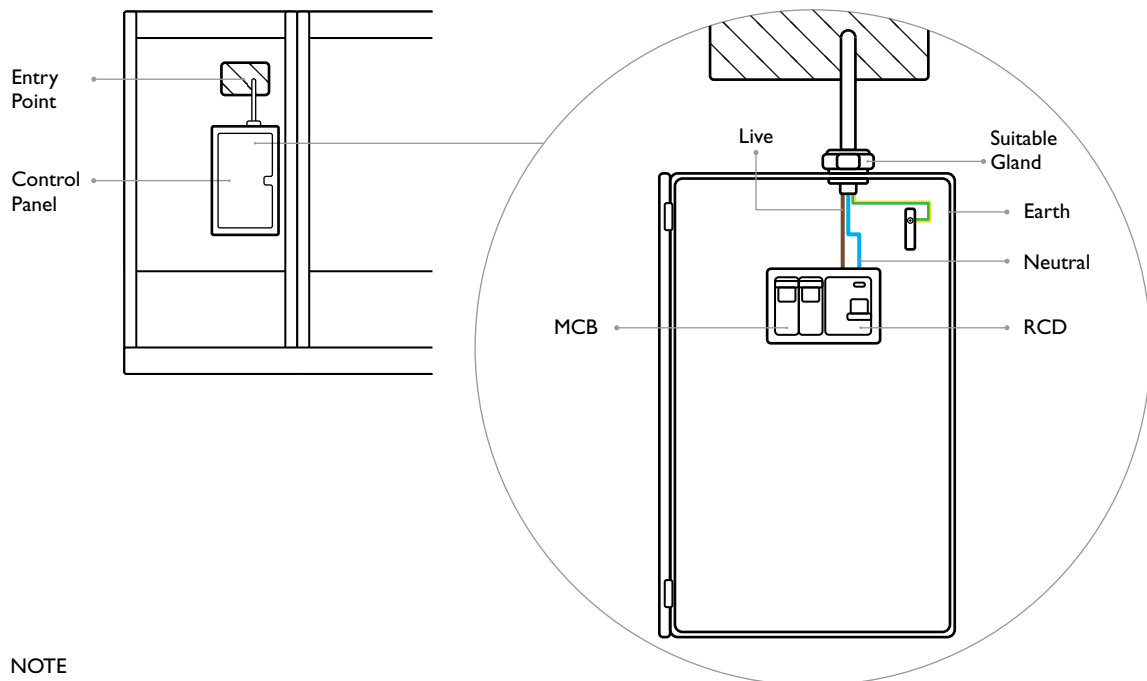
IT IS THE RESPONSIBILITY OF THE ELECTRICIAN:

- To connect the system according to regulations.

CONNECTIONS

The entry point positioning for the power supply is critical and can be found on the Alavo project drawings.

Power supply should be wired into the RCD and a suitable gland installed for entering the control panel.



NOTE

Connections should be carried out by a qualified electrician.

We recommend the system is not powered via an external PIR sensor to avoid repeated tap activation on system restart.

MCB - Main Circuit Breaker

RCD - Residual Current Device

PIR - Passive Infrared Sensor

ELECTRICAL SUPPLY

Standard mains input voltage of 230V AC single phase supply is required.

The table below displays the power requirements for Alavo according to the number of washstations.

NUMBER OF WASHSTATIONS	SUPPLY (AMPS)
1-2	15 A
3	20 A
4	24 A
5	28 A
6	33 A
7	37 A
8	42 A

WATER REQUIREMENTS

Plumbing and pressure requirements when installing the Alavo system.

IT IS THE RESPONSIBILITY OF THE PLUMBER:

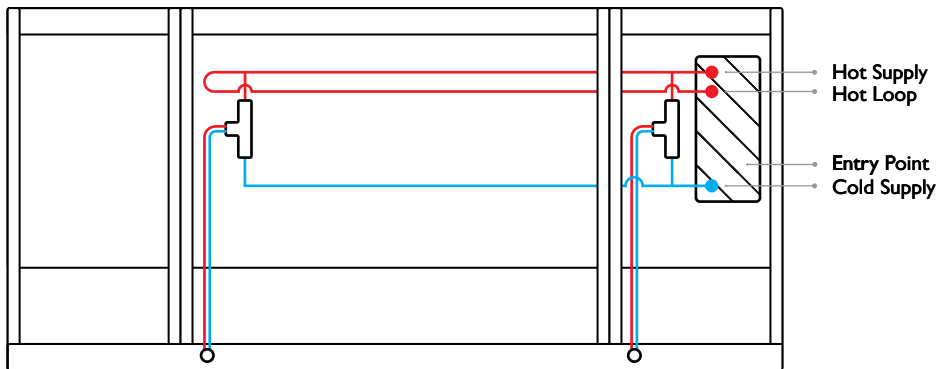
- To connect the system according to regulations and industry standards, and to adjust the plumbing if required.

CONNECTIONS

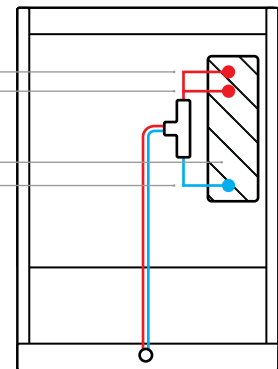
A hot loop is provided and should be isolated if not required.

The entry point positioning of the water supply is critical and can be found on the Alavo project drawings.

TWO WASHSTATIONS OR MORE



SINGLE WASHSTATION

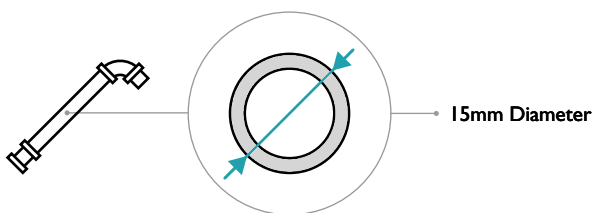


NOTE

Connections should be carried out by a qualified plumber.

FEED DIAMETER

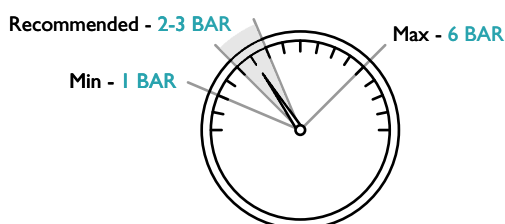
Alavo fittings accept / connect to 15mm feeds.



PRESSURE

A pressure of 1 to 6 bar is required, and for best results 2 to 3 bar is recommended.

The hot and cold supplies should be balanced.

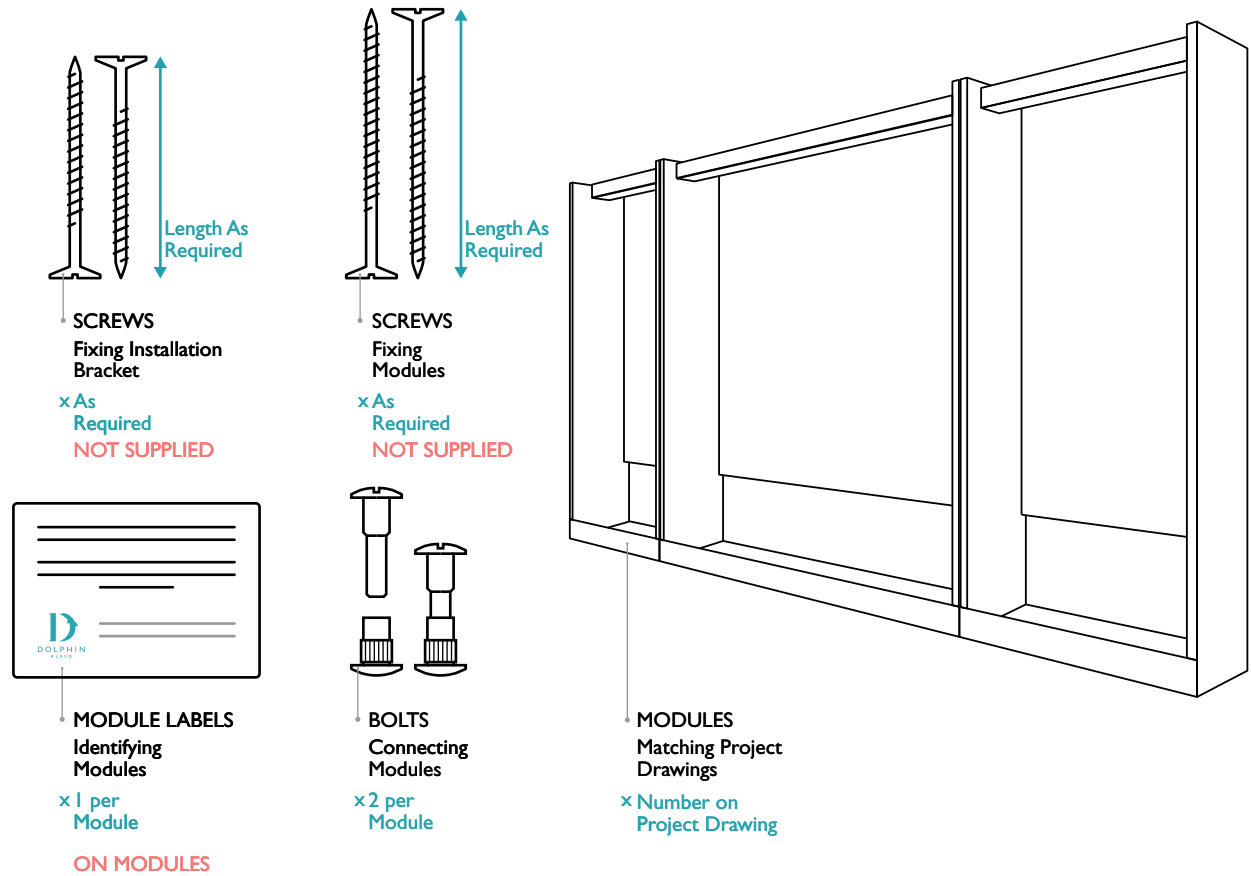


INSTALLING MODULES

BEFORE YOU START

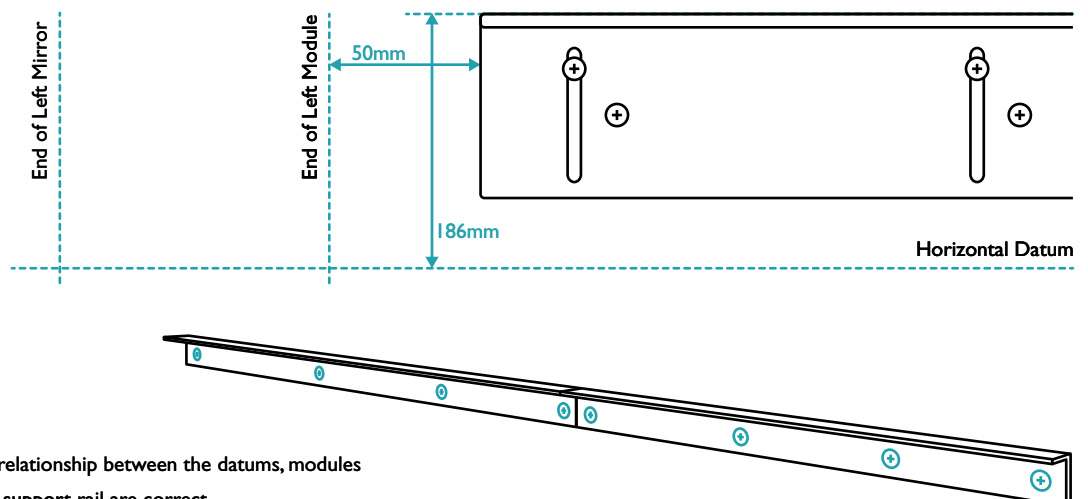
Ensure you have the correct modules for the Alavo system. Each module will be labelled and must match the project drawings.

Ensure you have all of the parts and fixings listed below.



01 FIX THE SUPPORT RAIL

Mark all datums on the wall and fix the support rail in the correct location as shown below. A recommended screw diameter of 5mm should be used. Check all brackets that make up the rail are level and secure.



**** MINIMUM OF TWO OPERATIVES SHOULD BE UTILISED FROM HERE ON ****

System weighs 60KG per metre

02 DETERMINE NUMBER OF MODULES

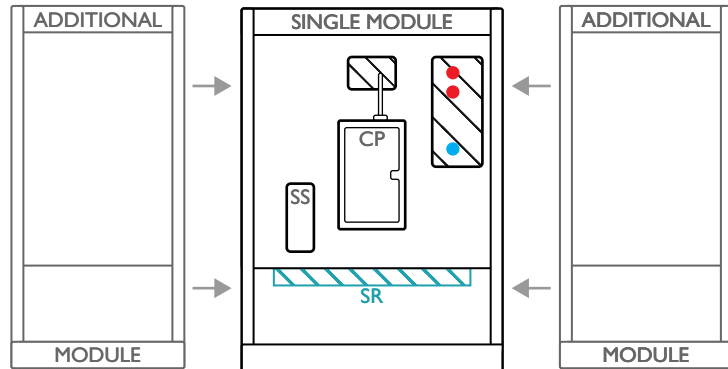
Determine number of modules on the project drawing and follow the respective instructions below. If the system has additional modules (AM), either to the left of the control panel (CP) or to the right of the soap system (SS), these should be installed last and do not require a support rail (SR).

SINGLE MODULE:

Lift single module onto the support rail and fix securely to the wall using all screw holes.

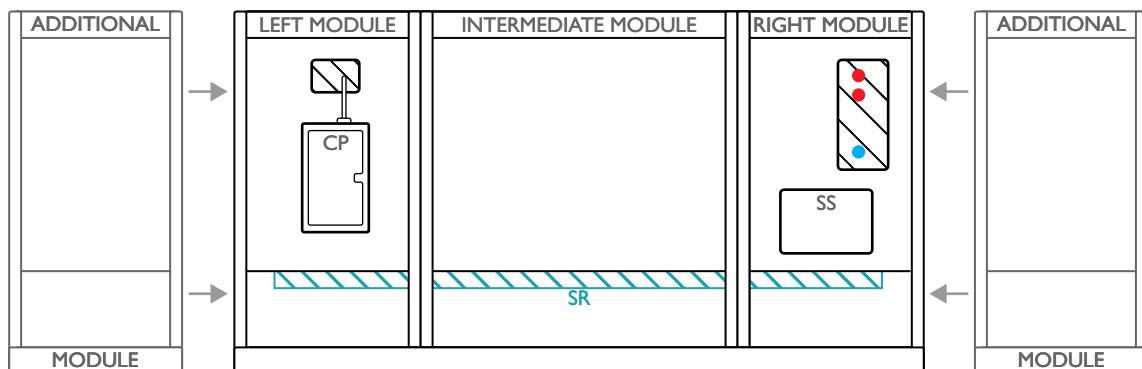
If the system has additional modules, align and fix to each end. These are not placed on the support rail.

Continue to Fitting Mirrors on Page 16.

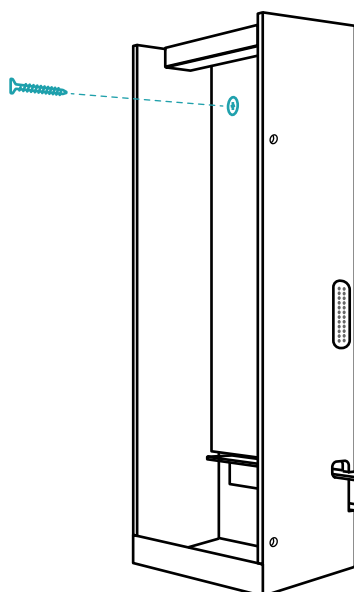


TWO MODULES OR MORE:

Continue to step 03 below. If the system has additional modules, either to the left of the control panel or to the right of the soap system, these should be installed last and do not require a support rail.



03 POSITION LEFT HAND MODULE



Raise the left end module onto the installation bracket, align with the vertical datum and fix with one screw.

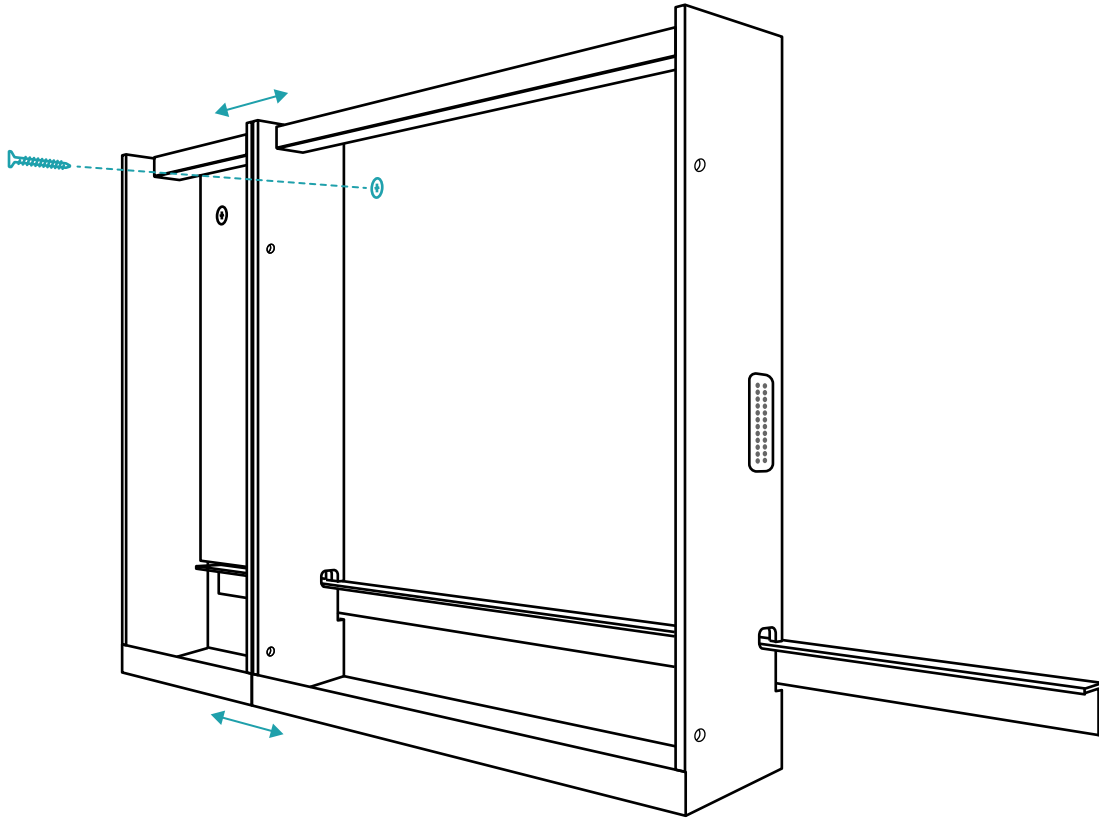
NOTE

Modules are numbered as per project drawing.

A single fixing screw is recommended until all modules are mounted.

04 POSITION NEXT MODULE

Lift the next module onto rail and slide carefully up to the previous module. Ensure the 24 pin plug, soap tube and water pipes are fed through and connected.



05 SLIDE, PULL TIGHT, BOLT THEN FIX

Use the two-part connecting bolts through the cheeks to connect the modules and pull them tight together. Only after the modules are tight should you then fix the module to the wall. A single fixing screw is recommended until all modules are mounted.

SLIDE



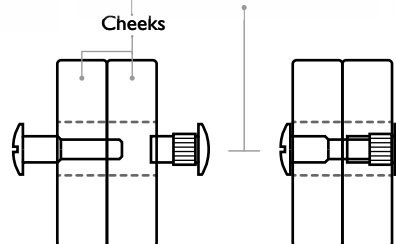
PULL TIGHT



BOLT



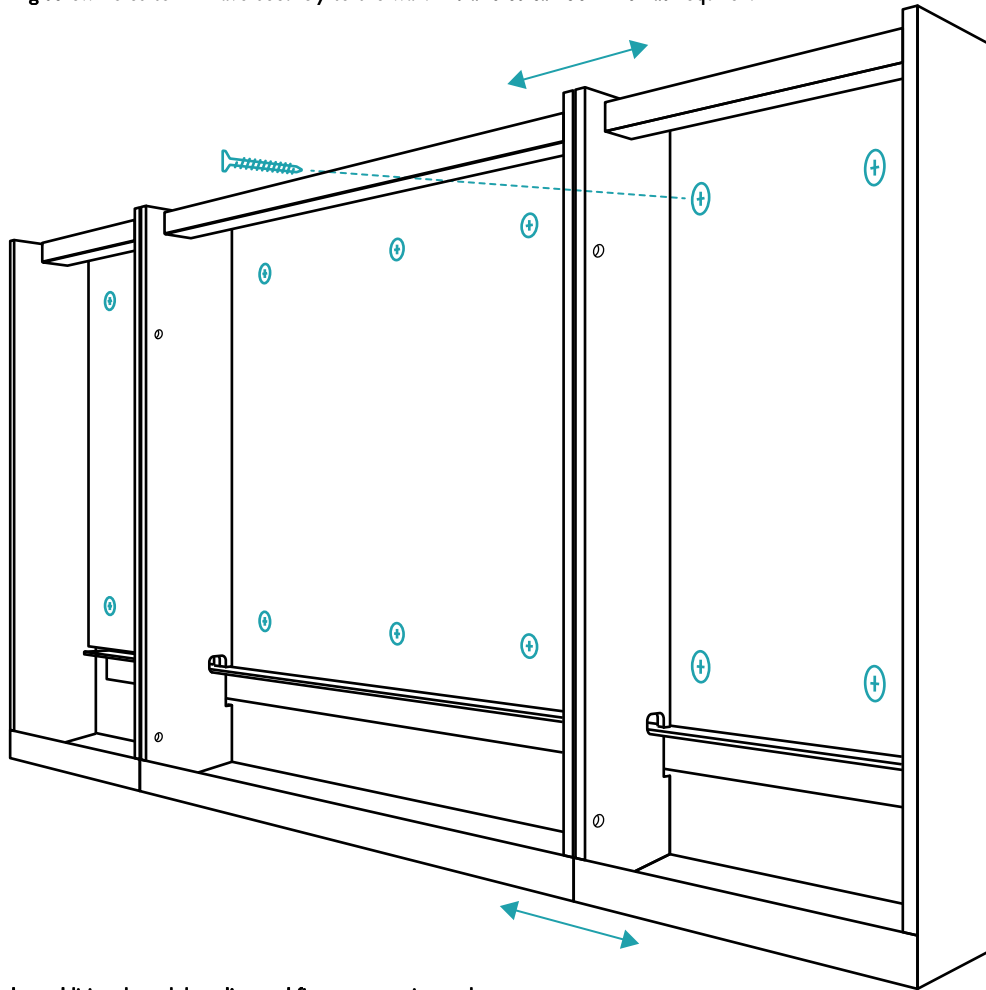
FIX



**** REPEAT STEP 04 - 05 FOR ALL SUBSEQUENT INTERMEDIATE MODULES ****

06 POSITION RIGHT MODULE

Lift the right module onto rail and repeat step 05. Once all the modules are tight against each other and level on the support rail, use all remaining screw holes to fix Alavo securely to the wall. Extra holes can be drilled as required.



NOTE

If the system has additional modules, align and fix to respective ends.

These do not require a support rail. See Page 13, step 03.

If lighting is installed on additional modules, these must be plugged into the adjacent modules.

07 CONNECT THE SOAP PLUMBING

Make the plumbing connection for the soap taking care to ensure the tube runs behind the vertical pipe that feeds the tap. The tube must be pushed fully home inside the fitting ensuring the depth marker lines up with the edge.

NOTE

The soap tube tail adjacent to the soap tank may need to be cut to length as required.

CONNECT



PUSH TIGHT



CUT TO LENGTH

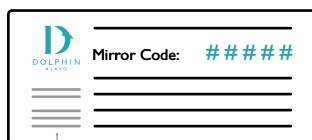
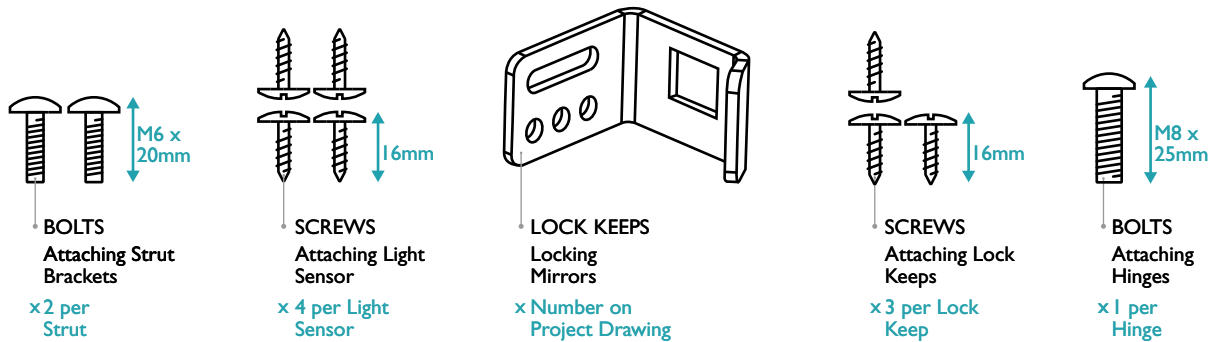


FITTING MIRRORS

BEFORE YOU START

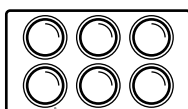
Ensure you have the correct mirrors for the Alavo system. Each mirror will be labelled and must match the project drawings.

Ensure you have all of the parts and fixings listed below.



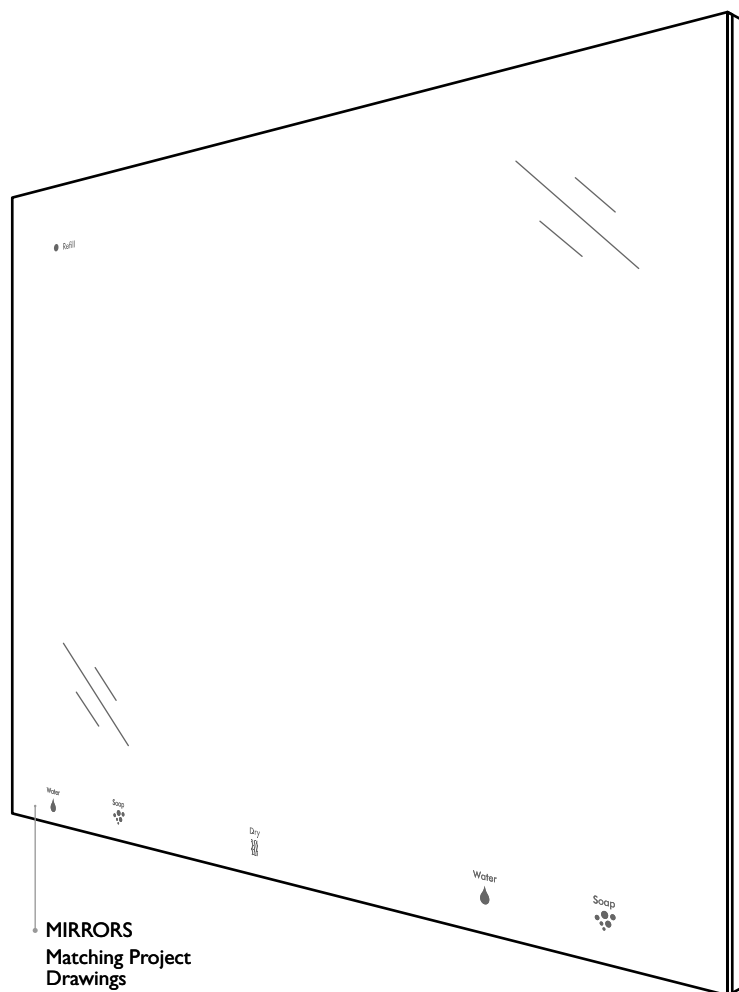
MIRROR LABELS
Identifying Mirrors

x 1 per Mirror
ON MIRRORS



MOUNT BUTTONS
Buffer Behind Mirrors

x 2 per Mirror

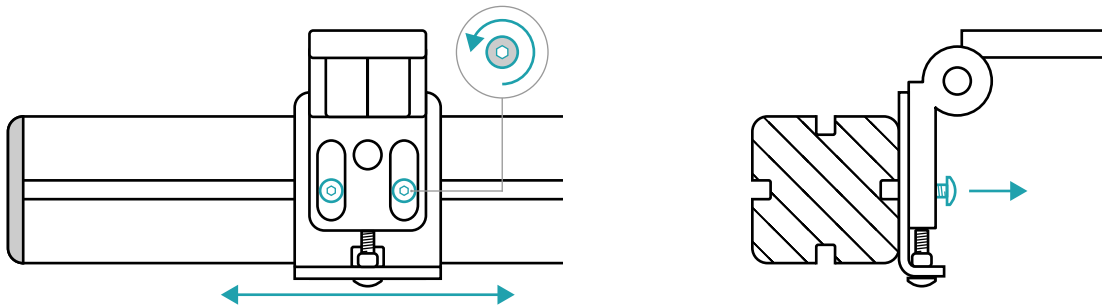


MIRRORS
Matching Project Drawings

x Number on Project Drawing

01 SLACKEN MIRROR HINGES

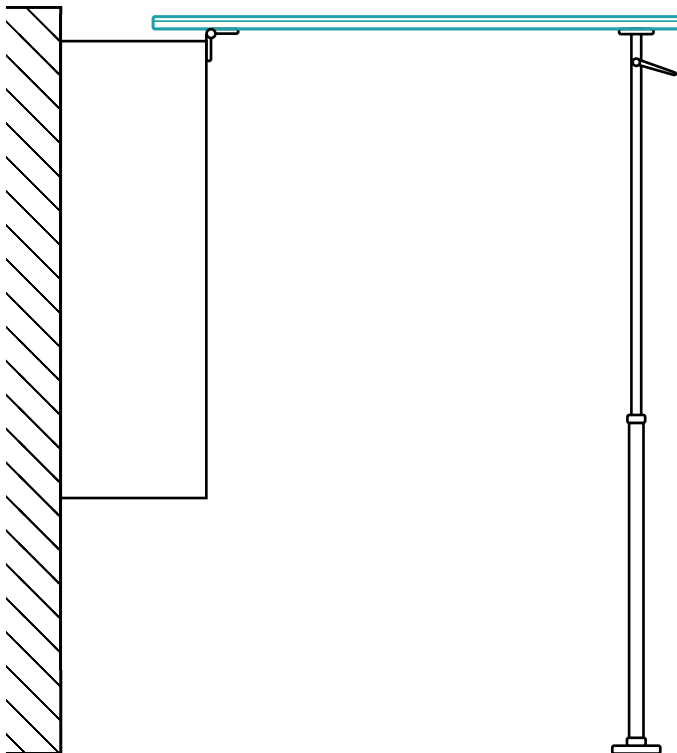
Slacken the bolts on the mirror hinges to allow them to slide easily along the rail. The hinges will already be attached to the hinge rail on the modules.



**** MINIMUM OF TWO OPERATIVES SHOULD BE UTILISED FROM HERE ON ****
**** KEEP TOP AND BOTTOM BATTENS ON MIRROR WHILST INSTALLING ****

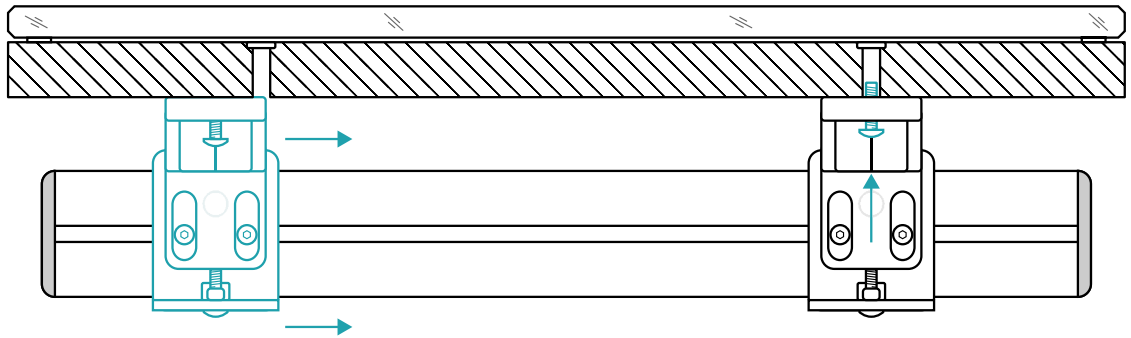
02 LIFT FIRST MIRROR INTO PLACE

Lift mirror to horizontal and move into position on the Alavo system. Hold or prop the mirror open as shown below.



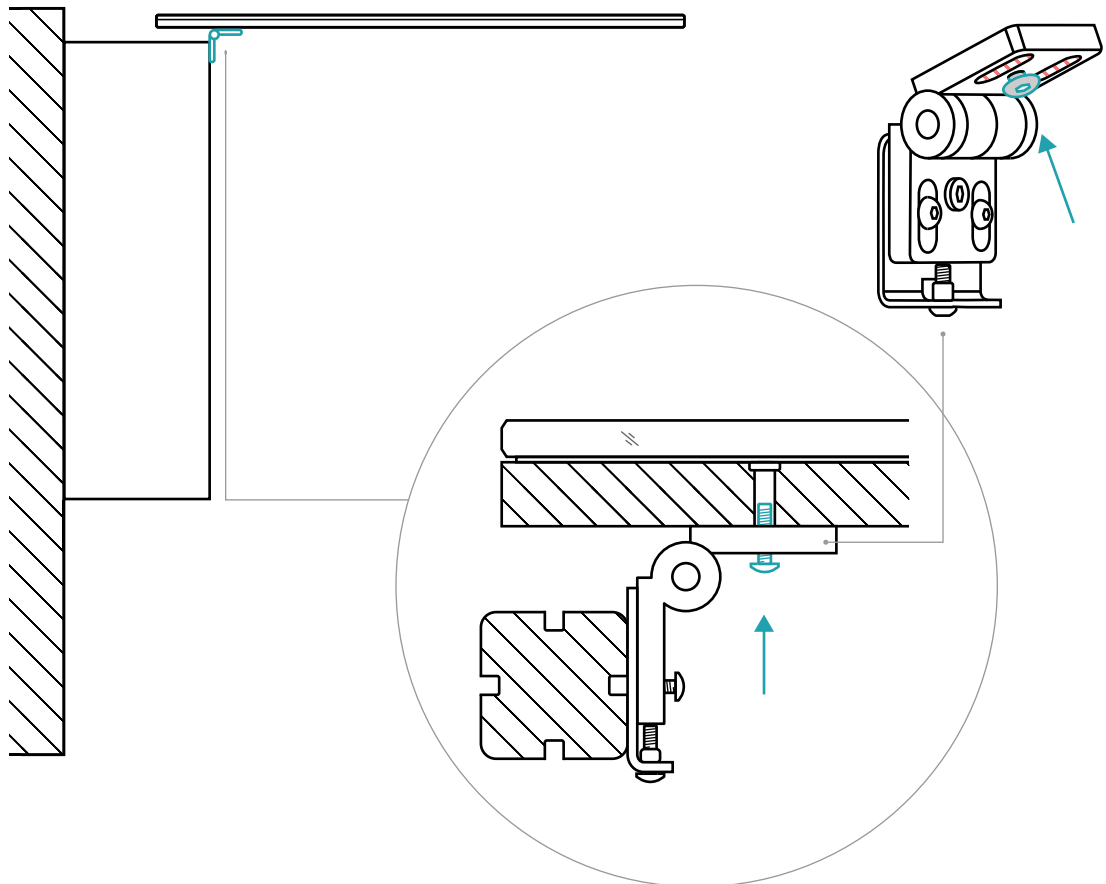
03 SLIDE HINGES INTO POSITION

Slide hinges into position to line up with mirror fixing holes.



04 ATTACH HINGES ONTO MIRROR

Use attached bolts to fix hinges to the mirror.



NOTE

Bolt must be inserted into round hole, not into slotted holes.

Take care not to cross thread the bolt as its counterpart insert cannot be replaced.

05 CLOSE MIRROR AND ALIGN

Remove prop and close the mirror. Then slide mirror along rail and line up with the alignment notch in the metal bottom plate as shown below. If there is only one mirror, align as per Project Drawings.

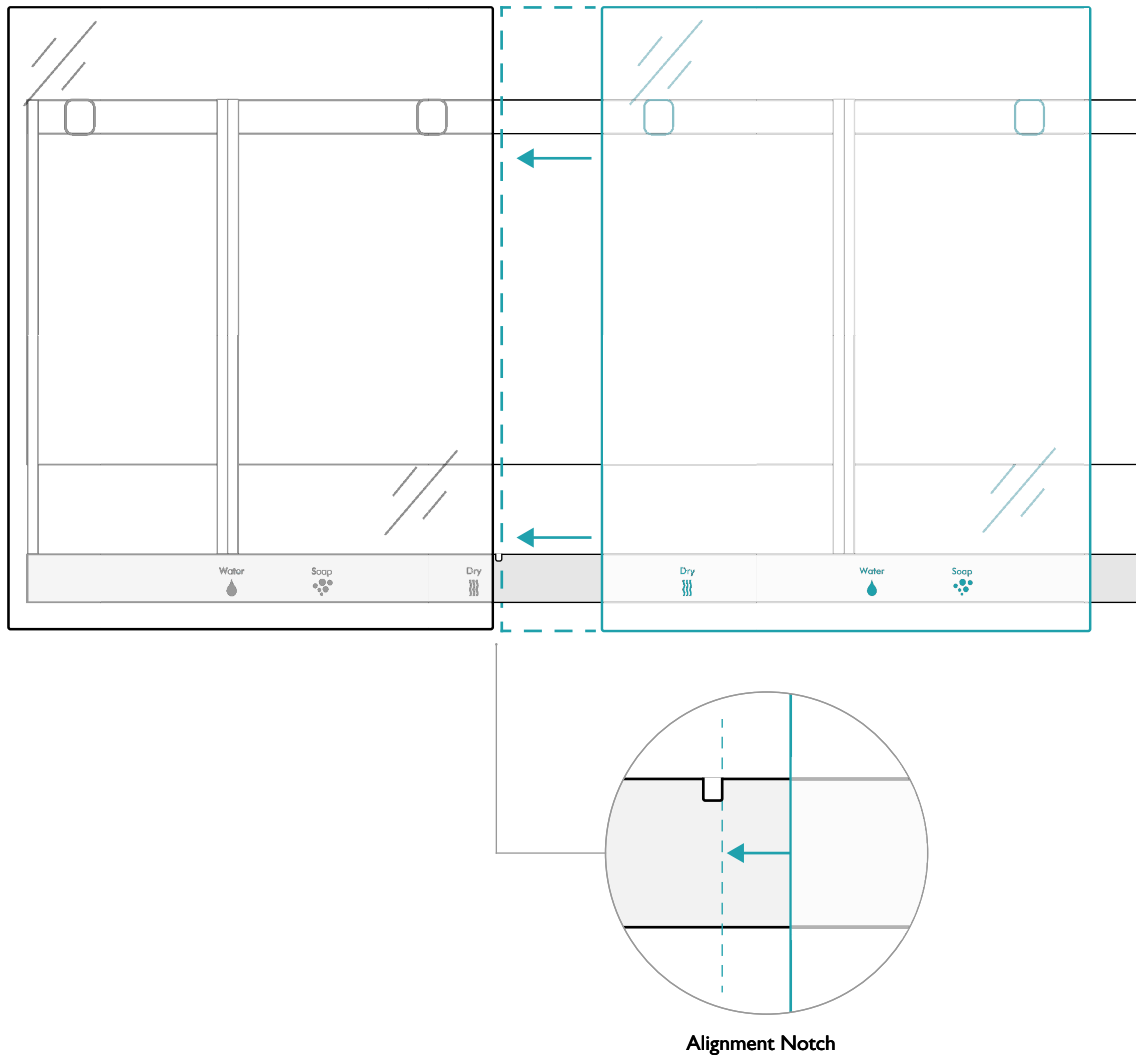
NOTE

For the left hand mirror, the right hand edge should be aligned with the left hand edge of notch.

For all other mirrors, the left hand edge should be aligned with the right hand edge of notch.

This is to allow for the correct spacing of 3mm between mirrors.

**** TAKE CARE TO ENSURE MIRRORS DO NOT COLLIDE ****



06 ATTACH GAS STRUTS ONTO MIRROR

Open the mirror to horizontal and prop open again. Ensure the ball joint is fully tightened against the strut at both ends. Then attach the gas strut to the mirror using the 90 degree bracket and bolts provided. Test by removing props whilst manually supporting the mirror to ensure gas struts are holding all the weight.

NOTE

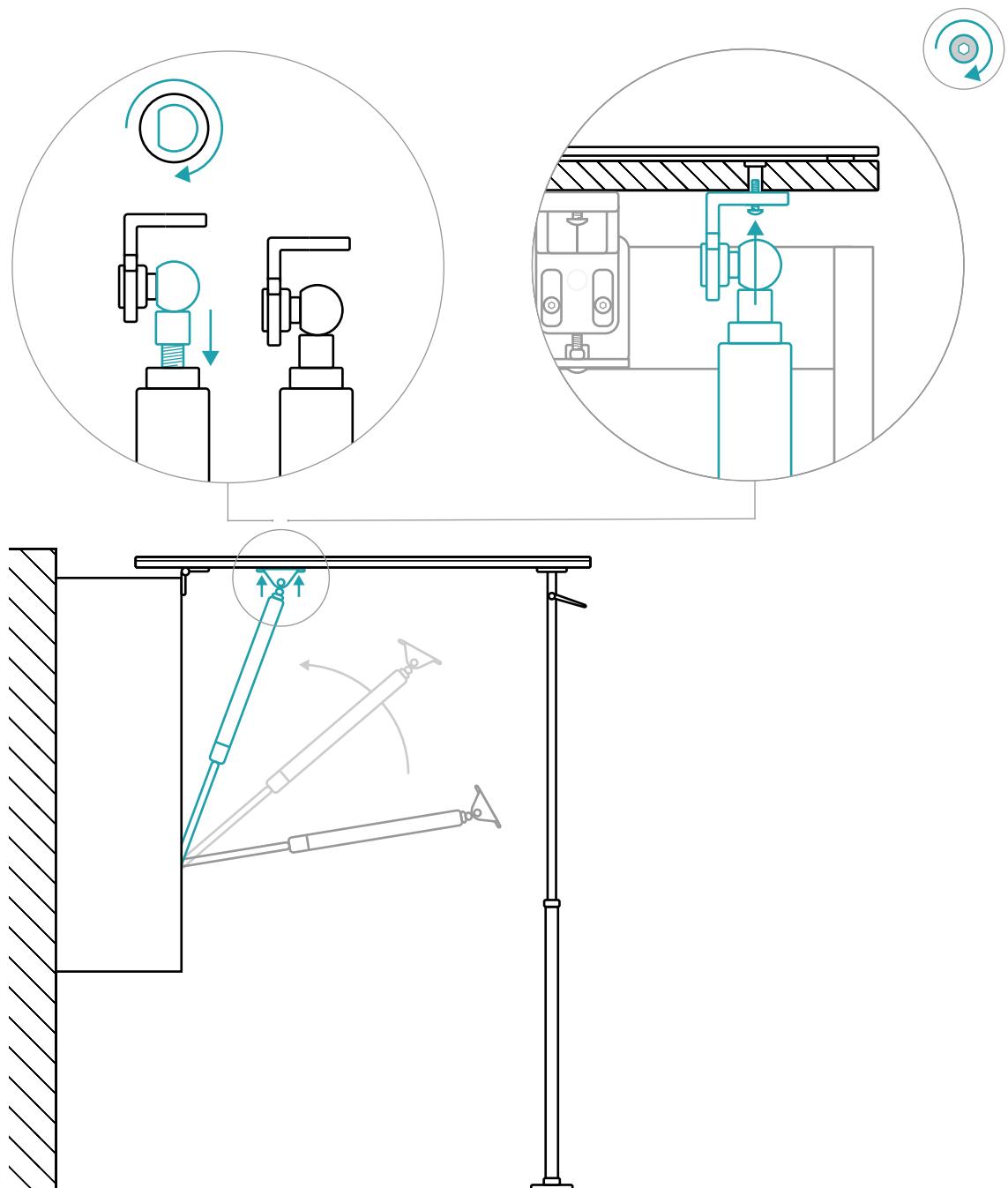
The struts will already be attached to the correct module, with the chamber at the top.

The 90 degree bracket will already be attached to the gas strut.

Check that the ball joint on the 90 degree bracket is facing towards the nearest module cheek.

Take care not to cross thread the bolt as its counterpart insert cannot be replaced.

**** OPEN MIRRORS SLOWLY AND WITH CAUTION AT THIS STEP AS GAS STRUTS WILL BE FULLY CHARGED - THIS COULD RESULT IN THE MIRRORS OPENING WITH EXCESSIVE FORCE UNTIL ADJUSTED AS PER STEP 07 ****



07 ADJUST PRESSURE IN GAS STRUT

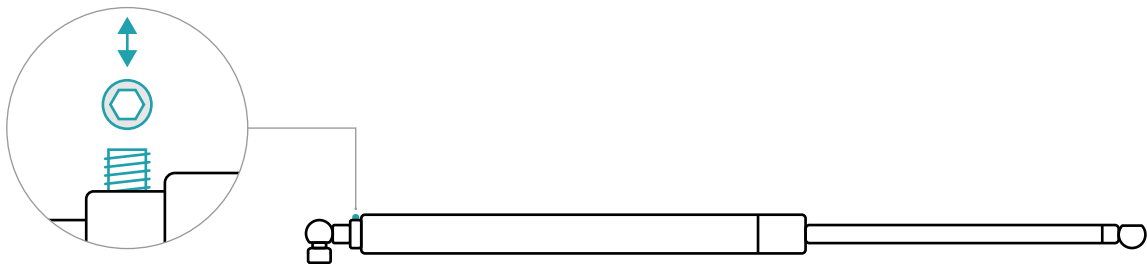
To adjust gas pressure, slacken grub screw in short bursts, and maintain equal pressure between strut pairs.

NOTE

Test mirror weight repeatedly to ensure sufficient gas remains.

Do not over-tighten grub screw.

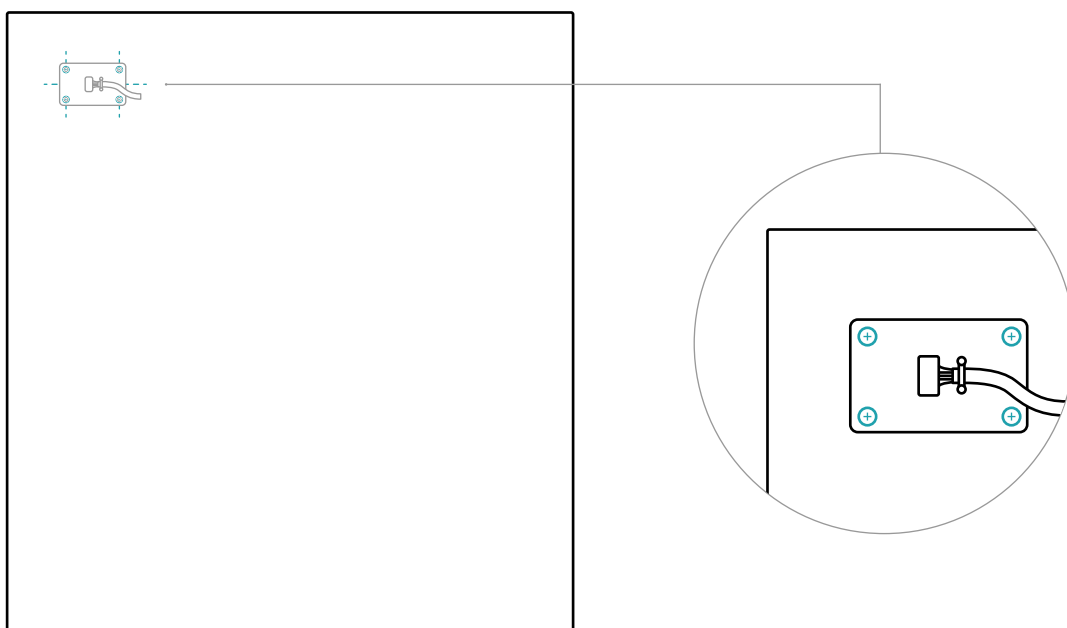
**** RELEASE GRUB SCREW IN SHORT BURSTS AND WITH CAUTION ****



**** REPEAT STEPS 01 - 07 FOR ALL SUBSEQUENT MIRRORS ****

08 FIX REFILL LIGHT BOARD TO MIRROR

Position refill light board onto back of mirror by locating the pilot holes which are indicated on the project drawings. Fix the board to the mirror using the screws provided.



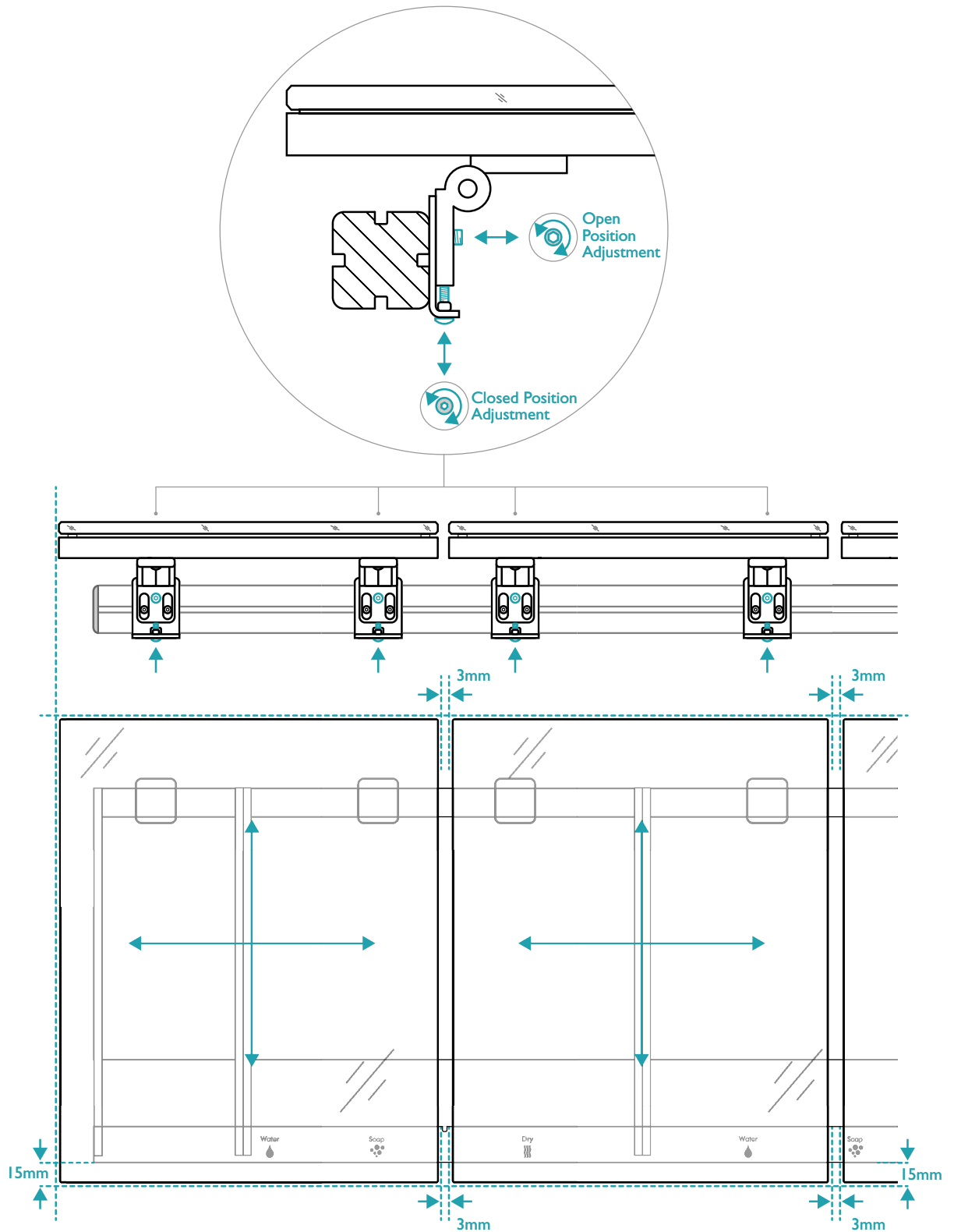
09 ADJUST MIRROR POSITIONS

Check all mirrors align with equal gaps both in the closed and open positions. Use the bolts on the hinges to adjust as necessary. Then tighten all hinge bolts and recheck all mirrors are level with equal gaps.

NOTE

Ensure hinge fixing bolts are slack before adjusting mirrors.

Mirrors should be opened carefully ensuring edges do not conflict.

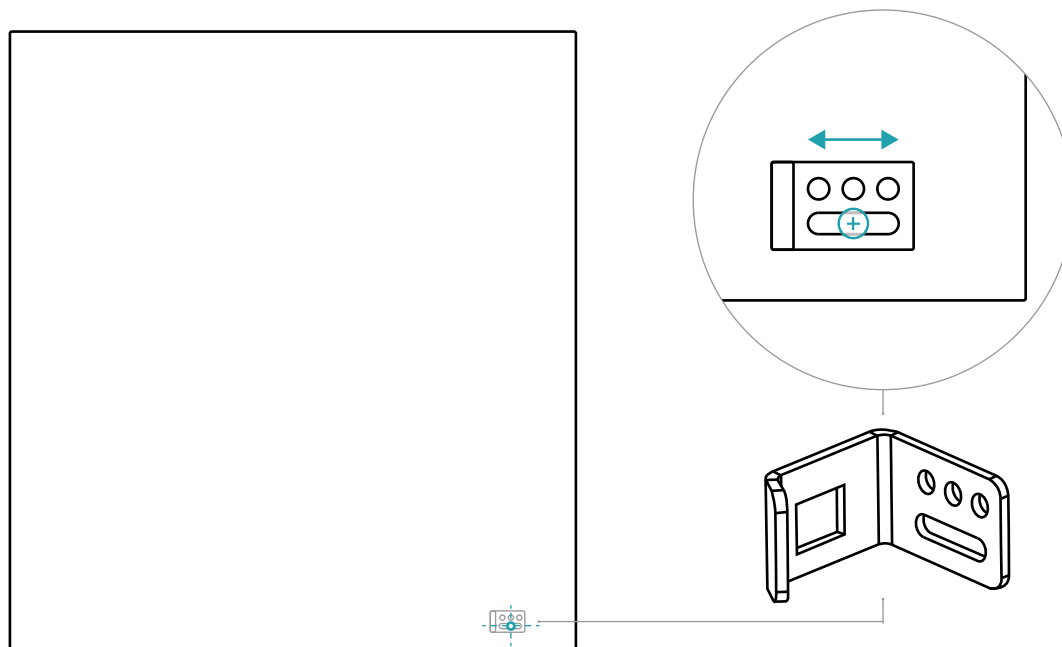


10 FIX LOCK KEEP ONTO MIRROR

Locate lock keep onto back of mirror by finding the pilot hole which will be indicated on the project drawings. First fix one screw centrally in the slotted hole to allow for adjustment.

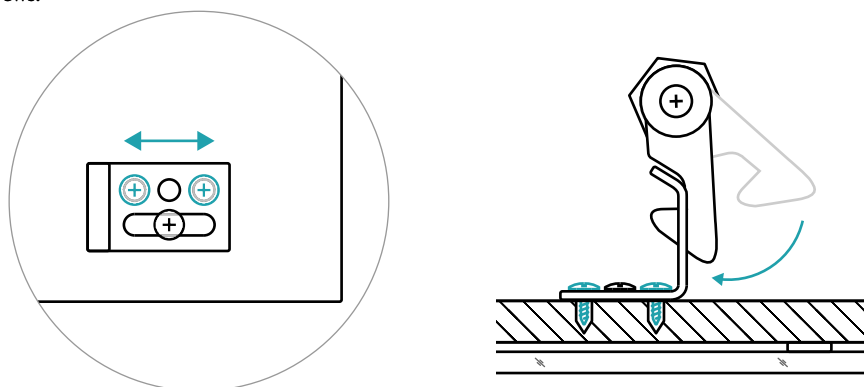
NOTE

Ensure the slotted hole is nearest to the bottom of the mirror.



11 ADJUST AND SECURE LOCK KEEP

Close the mirror and check the lock latches automatically with its counterpart. Adjust as necessary and fix in place with remaining screws.



12 STICK MOUNT BUTTONS ON MIRROR

Stick mount buttons on back of mirror where the module and the mirror make contact. This creates a soft close buffer when shutting the mirrors



INSTALLATION AND COMMISSIONING CHECKLIST

VISUAL AND FUNCTIONAL CHECKS

Ensure all visual and functional checks have been carried out to check Alavo has been delivered and installed successfully.

01 PROJECT DETAILS

Project reference number:

System number:

Location:

02 VISUAL CHECKS

- ☐ Mirror condition is excellent
- ☐ Mirror alignment is correct - 3mm gaps between mirrors and all mirrors align with their corresponding alignment notch
- ☐ All plumbing and soap connections are pushed up to depth markers
- ☐ Soap tubing is straight and level across system without undulations
- ☐ Foaming soap solution is supplied - [important not to use liquid soap](#)

03 ACTIVATE ALAVO SYSTEM

Turn on power supply to the system

Turn on water supply to the system and check for leaks

Activate Alavo by turning on the RCD and the MCB switches

Wait 30 seconds for system to initialise

All taps will discharge momentarily to show they have been activated

04 FUNCTIONAL CHECKS

- | | |
|--|--|
| <input type="checkbox"/> There is a 3mm clearance between all mirrors when in the open position | |
| <input type="checkbox"/> All mirrors latch and lock securely | |
| <input type="checkbox"/> Gas struts support weight of mirrors | |
|
 | |
| <input type="checkbox"/> Light sensor is operating correctly - circle located at the top left of Alavo | Cover with hand to check - lighting will turn off
See O&M guide for light sensor adjustment |
| <input type="checkbox"/> Soap/paper refill light is illuminated | See O&M guide for refill light details |
| <input type="checkbox"/> Service key switch is working | In service mode taps and soap dispensers will be disabled - refill light will be red |
|
 | |
| <input type="checkbox"/> All icon lights are illuminated | If installed |
| <input type="checkbox"/> All halo lights are illuminated | If installed |
| <input type="checkbox"/> All through mirror lights are illuminated | If installed |
| <input type="checkbox"/> Colour and brightness of lights - can be adjusted | See O&M guide for light adjustment |
|
 | |
| <input type="checkbox"/> All hand dryers activate when hands placed under sensor | |
| <input type="checkbox"/> All soap dispensers discharge when hands placed under sensor | |
| <input type="checkbox"/> All taps discharge when hands placed under sensor | |
| <input type="checkbox"/> Angle of tap flow correct | |
| <input type="checkbox"/> Water output temperature from TMV is correct and conforms to regulations | See O&M guide for adjusting TMV
TMV - Thermostatic Mixing Valve |

05 ACTIONS

Cleaners/facilities staff familiarised with Alavo and the relevant instructions for cleaning and maintenance
Cleaners/facilities staff shown how to put unit into service mode with key-switch for cleaning and maintenance
Cleaners/facilities staff advised to refill Alavo with foaming soap solution **ONLY** and not liquid soap

06 SIGN OFF

Commission completed by: _____

Signed: _____

Date: _____





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