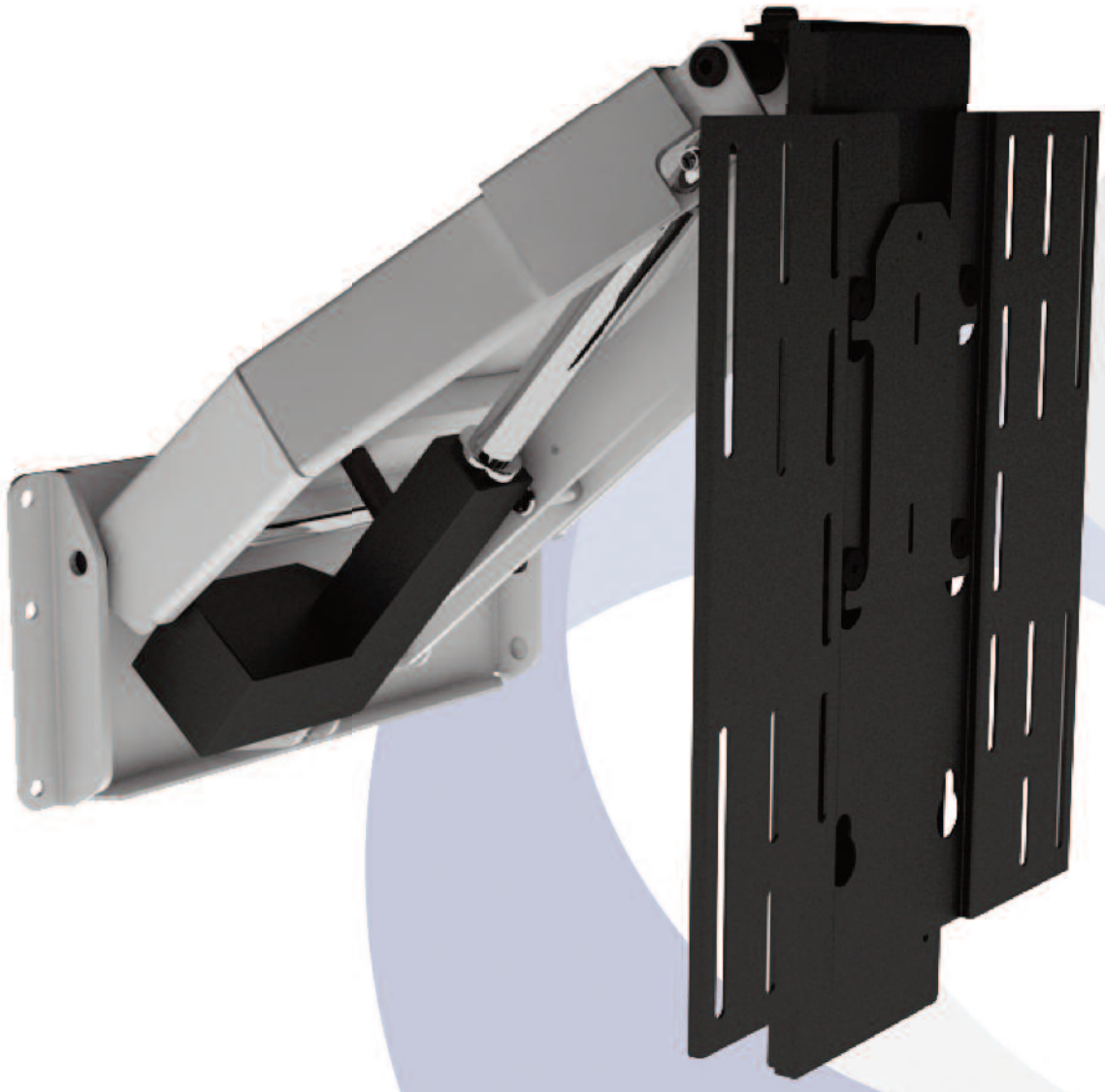
Installation Instructions

Wall Mounts

EAD2 - Electric Advance & Drop V2

Design Highlights

-Unique Advanced and Drop Motion
-Manual swivel with self aligning feature when retracting
-Smooth quiet motion
-Perfect For Mounting TV Above Fireplaces



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ISSUE 002

EAD2 - Electric Advance & Drop V2

Caution Warning

Beware of Moving Parts

Danger Electricity

Keep Hands Clear

Safety Disclaimer
Important Safety Instructions
Explanation of graphical symbols
-(Electric Shock Symbol) = The lightning flash within an equilateral triangle is intended to alert you to the presence of un-insulated "dangerous voltage" within the products enclosure that may be of sufficient magnitude to constitute an electric shock to persons
-(Caution Symbol) = The exclamation point within an equilateral triangle is intended to alert you to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the product
-(Tools Symbols) = The tools symbol within a coloured square are intended to highlight the required tools necessary for correct and safe installation of the product. These are intended as a
guide only, and it is at the installer's discretion as to which tools are used.

WARNING: RISK OF ELECTRIC SHOCK, ONLY AUTHORIZED INSTALLERS TO OPEN THE POWER CONTROL BOX.
WARNING: To reduce the risk of fire or electric shock, do not expose electrical parts to rain or moisture, unless the product has been specifically designed to do so.
WARNING: Failure to provide adequate structural strengthening, prior to installation can result in serious personal injury or damage to the equipment. It is the installer's responsibility to ensure the structure to which the component is affixed can support the four times the weight of the component.
WARNING: Do not exceed the weight capacity. This can result in serious personal injury or damage to the equipment. It is the installer's responsibility to ensure that the total combined weight of all attached components does not exceed that of the maximum figure stated.
WARNING: Failure to provide adequate structural strength for this component can result in serious personal injury or damage to equipment! It is the installer's responsibility to make sure the structure to which this component is attached can support five times the combined weight of all equipment. Reinforce the structure as required before installing the component.

Warnings:

1. **Read all technical instructions fully before installation and use. It is the installer's responsibility to ensure that all documentation is passed on the end user and read fully before operation.**
2. **Keep all documentation.**
3. **Heed all warnings.**
4. **Follow all technical specifications and instructions during installation.**
5. **Do not use near water unless the product has been specifically designed to do so.**
6. **Clean only with a dry cloth.**
7. **Do not defeat the purpose of the polarized or grounding type plug. A polarized plug has two blades, one wider than the other. A grounding type plug has two blades and a grounding prong. The wide blade or third prong are provided for your safety. If the provided plug does not fit your outlet, consult an electrician or contact the manufacturer.**
8. **Protect the power cord from being walked on or pinched, particularly at plugs, convenience receptacles, and the point where the exit from the apparatus.**
9. **Unplug the apparatus during lightning storms or when unused for long periods of time.**
10. **Only use attachments/accessories specified by the manufacturer.**
11. **Refer all servicing to qualified personnel. Servicing is required regularly on an annual basis, when the apparatus is damaged in any way, liquid has been spilled or objects have fallen into the apparatus, the apparatus has been exposed to rain or moisture, does not operate normally, or has been dropped.**
12. **To completely disconnect the apparatus form the AC mains, disconnect the power cord plug from the AC receptacle on the power control box.**
13. **To prevent overheating, do not cover the apparatus. Install in accordance with the instructions.**
14. **UK, Ireland and Hong Kong only – The power cord is supplied with a 13A plug having an earthing pin. The apparatus is earthed and this pin is not required for safety, merely to operate the safety shutter of mains outlet.**
15. **No naked flames such as lit candles should be placed on the unit.**
16. **Observe and follow the local regulations when disposing of batteries.**
17. **Do not expose the unit to dripping or splashing fluids.**
18. **Do not place objects filled with liquid, such as vases, on the unit.**
19. **Do not expose the batteries to excessive heat such as sunshine, fire or the like.**
20. **For all mounted apparatus, the apparatus should be installed on solid wood, bricks, concrete or solid wood columns and battens.**
21. **Always turn off power at source before putting on or taking off parts and cleaning.**
22. **Do not use outdoors unless marked for outdoor use.**
23. **Exceeding the weight capacity can result in serious personal injury or damage to equipment.**

Future Sound & Vision trading as Future Automation intend to make this and all documentation as accurate as possible. However, Future Automation makes no claim that the information contained herein covers all details, conditions or variations, nor does it provide for every possible contingency in connection with the installation or use of this product. The information contained in this document is subject to change without prior notice or obligation of any kind. Future Automation makes no representation of warranty, expressed or implied, regarding the information contained herein. Future Automation assumes no responsibility for accuracy, completeness or sufficiency of the information contained in this document.

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EAD2 - Electric Advance & Drop V2

Tool Indicator Icons

1.
2.
3.
4.
5.
6.
7.
8.

1. - Drill
2. - Tape measure
3. - Allen Keys
4. - Spirit Level
5. - Screwdrivers
6. - Spanners
7. - Pencil
8. - Saw

Product Warranty

This product carries a warranty that covers the cost of labour and spare parts incurred by any defects in materials and workmanship under normal use during a two year period from date of purchase. Support for any problems that are not hardware faults are excluded from the warranty entitlement. This warranty does not affect your statutory consumer rights.

The following is excluded from warranty service:

- Malfunctioning caused by misuse or damage, accidental or otherwise, or service modification by persons not authorised by Future Automation, or the use of any non Future Automation supplied parts;
- Any electrical, or other environmental work external to your Future Automation mechanism including power cuts, surges or lightning strikes;
- Additional items not supplied by Future Automation although they may have been supplied together by the retailer;
- Any 3rd party software products controlling your mechanism;
- Any transfer of ownership. Warranty is provided only to the initial purchaser;
- Compensation for loss of use of the product, and consequential loss of any kind;
- Use of the product over the specified weight capacity;
- Any damage to products during transit that is not checked and notified as “unchecked” or “damaged” upon receipt of delivery.

Any part of your system that needs to be replaced during a warranty repair becomes the property of Future Automation.

EAD2 - Electric Advance & Drop V2

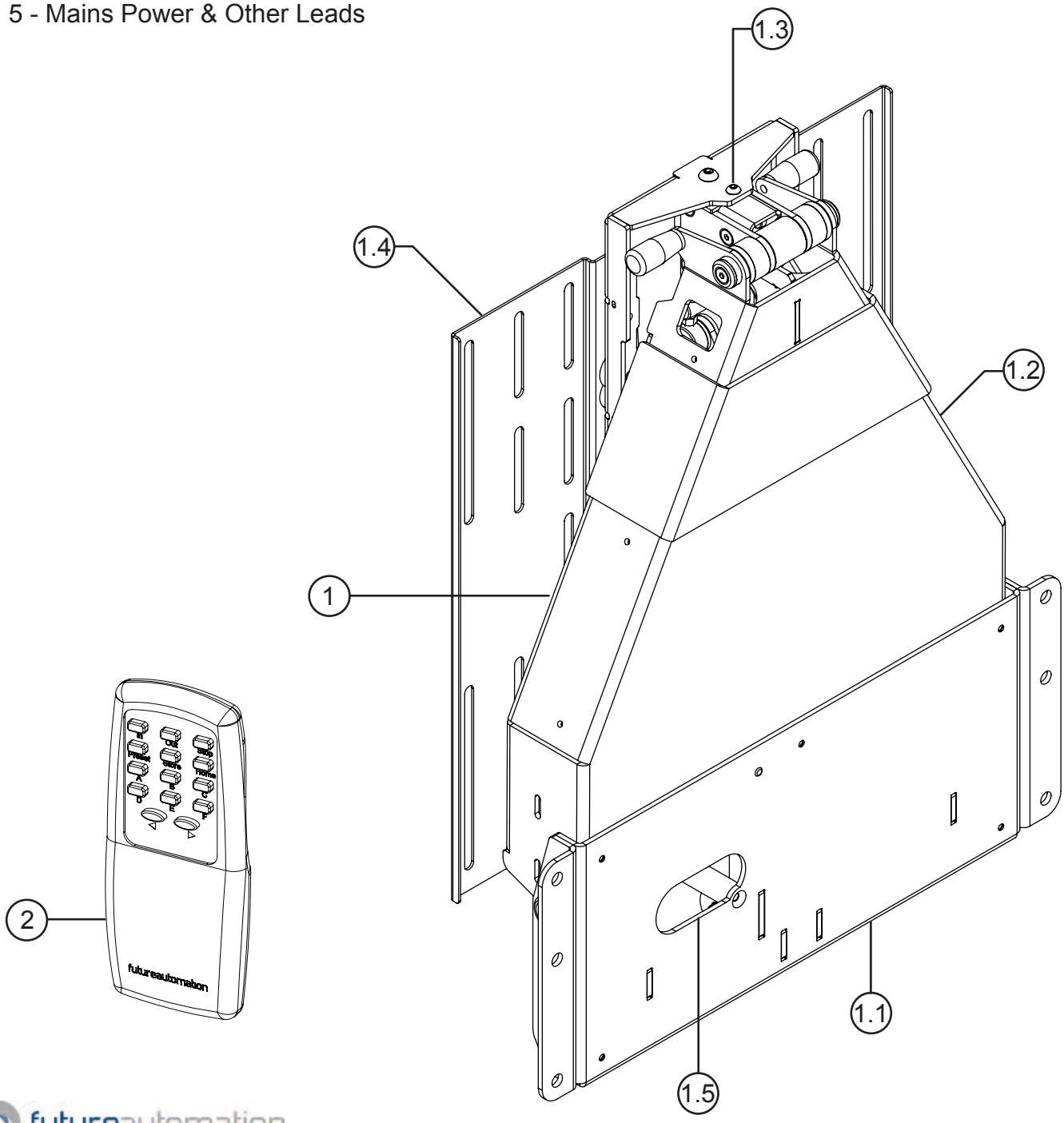
Package Contents

1 - Mechanism
1.1 - Wall Mount Plate
1.2 - Advancing Arm
1.3 - Swivel Locking Bolt
1.4 - KH Mount Plate
1.5 - Cable Entry / Exit Hole
2 - IR Remote Control

Not Shown On Page

3 - x2 AAA Batteries
4 - Multi Pack Of Nut, Bolts & Washers
5 - Mains Power & Other Leads

Nuts & Bolts Multipack:
A range of nuts, bolts, washers and spacers to aid in the mounting for your screen



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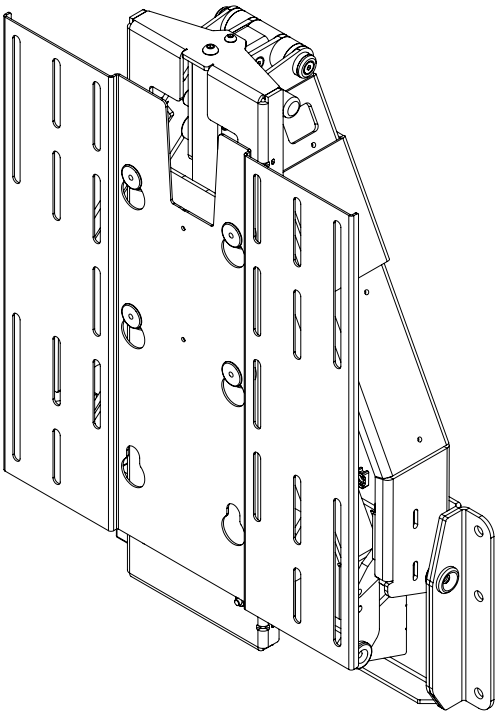
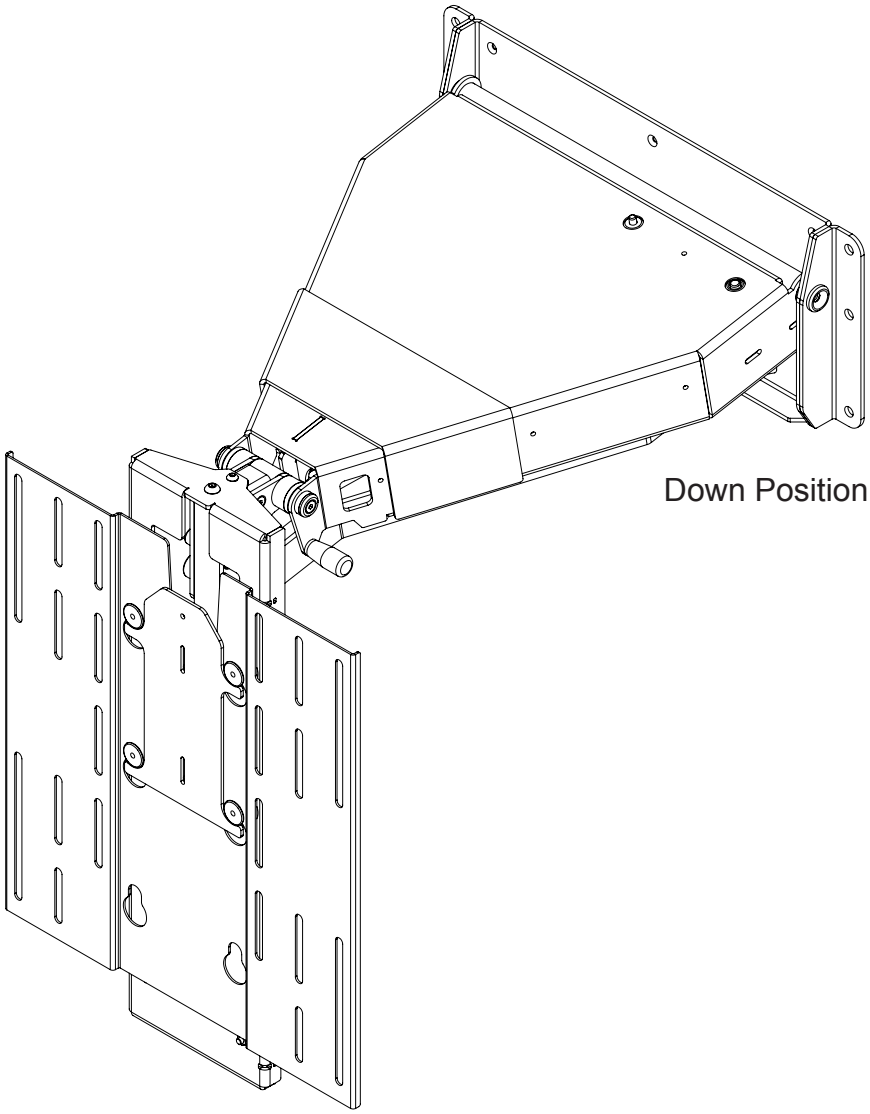
Before you start, check the following:

-The product is in good condition
-No damage to any parts
-Wiring is all secure
-The unit is in the up position
-Test the movement of the mechanism



Up Position



Down Position

EAD2 - Electric Advance & Drop V2

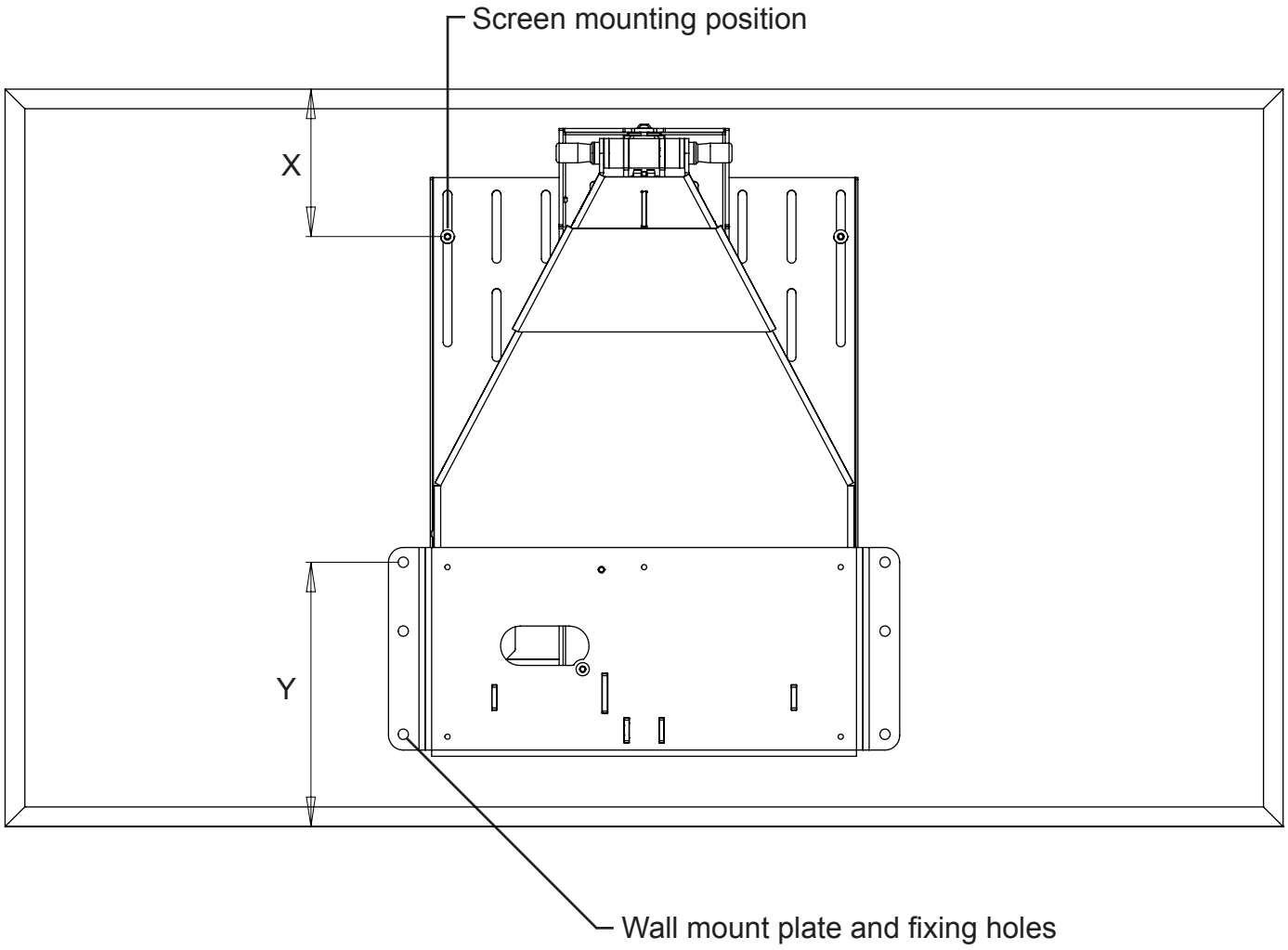
Screen Positioning

Establish the mechanism positioning behind the screen and where the mounting holes are so the correct height is achieved when fixing to the wall.

Make sure the mechanism is in the IN position when doing this.

To establish clearances and general requirements please refer to the EAD2 Tech Sheet.

A recommended mounting option is to recess the mechanism into the wall so the screen sits flush with the wall in the up position.



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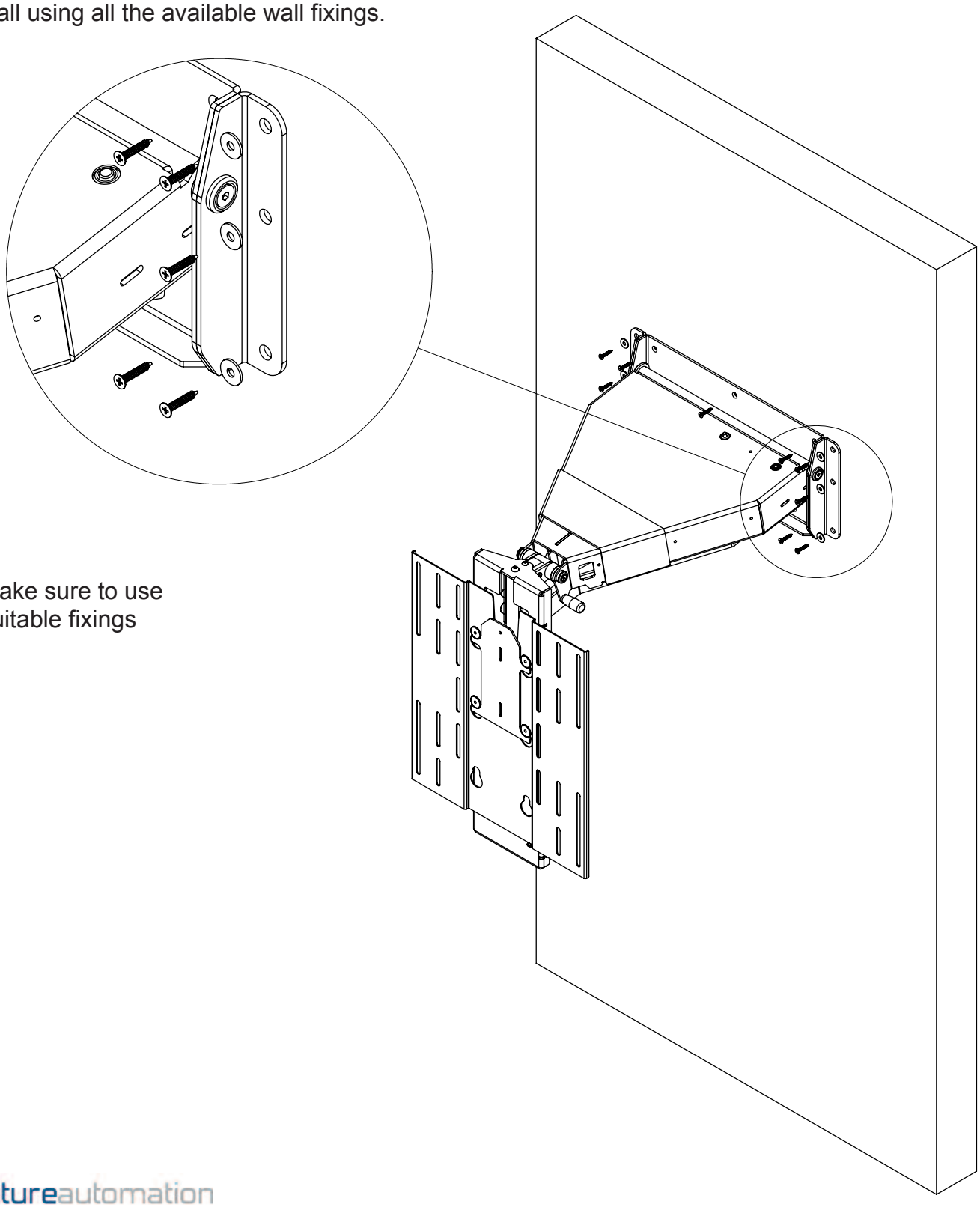
Fitting the mechanism to the wall

Once the position of the wall plate has been decided with reference to where the screen will be fix to the wall using all the available wall fixings.



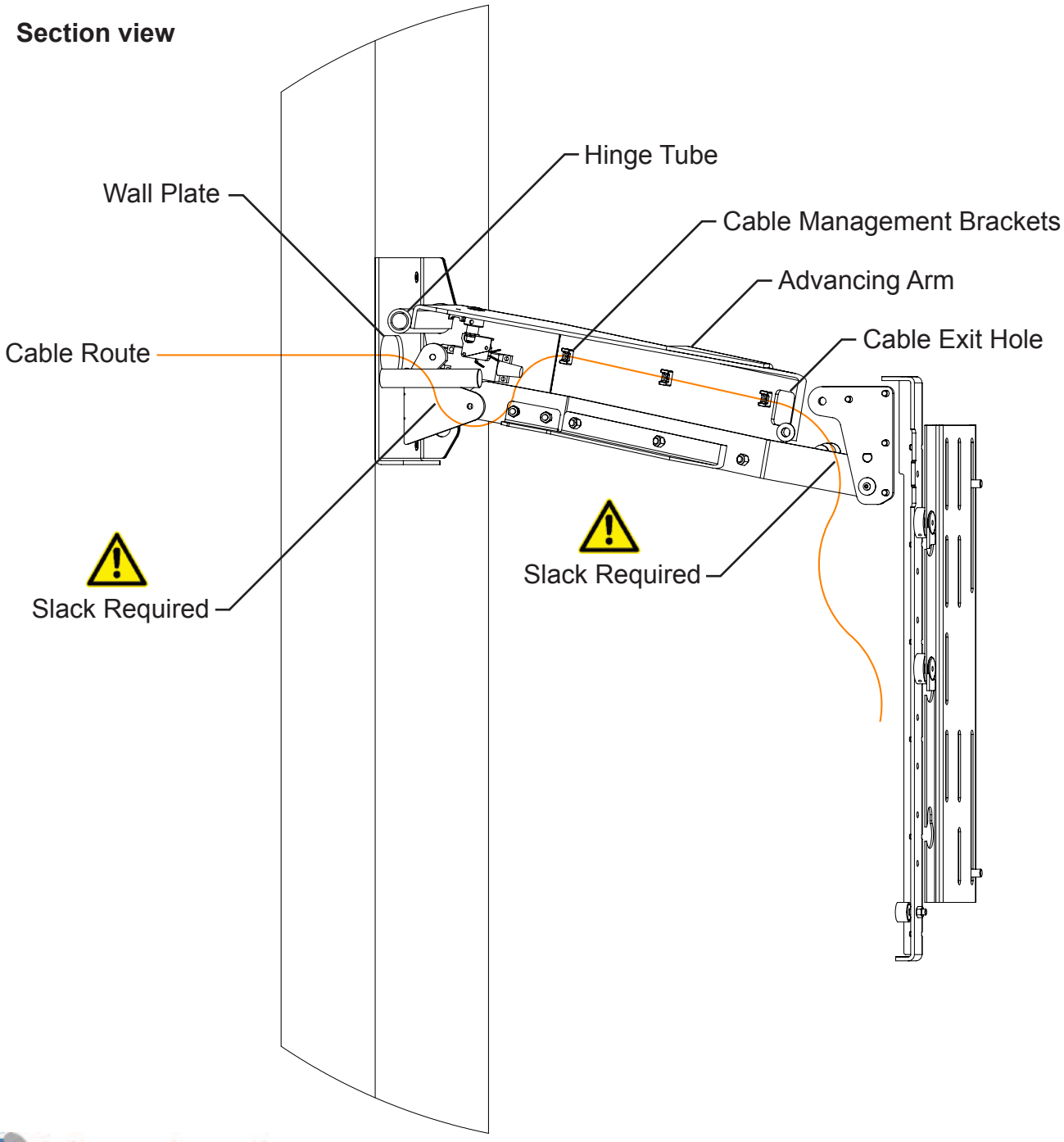
Make sure to use suitable fixings

EAD2 - Electric Advance & Drop V2

Cable routing

Bring the cables through the wall and the EAD2 wall plate. Loop around the hinge tube allowing enough slack not to get caught or pulled taught.
Run the cables inside the arm and cable tie to the management brackets.
Bring the cable out though the exit hole and down to the screen.
Make sure there is enough slack from the screen to the mechanism to allow for movement.

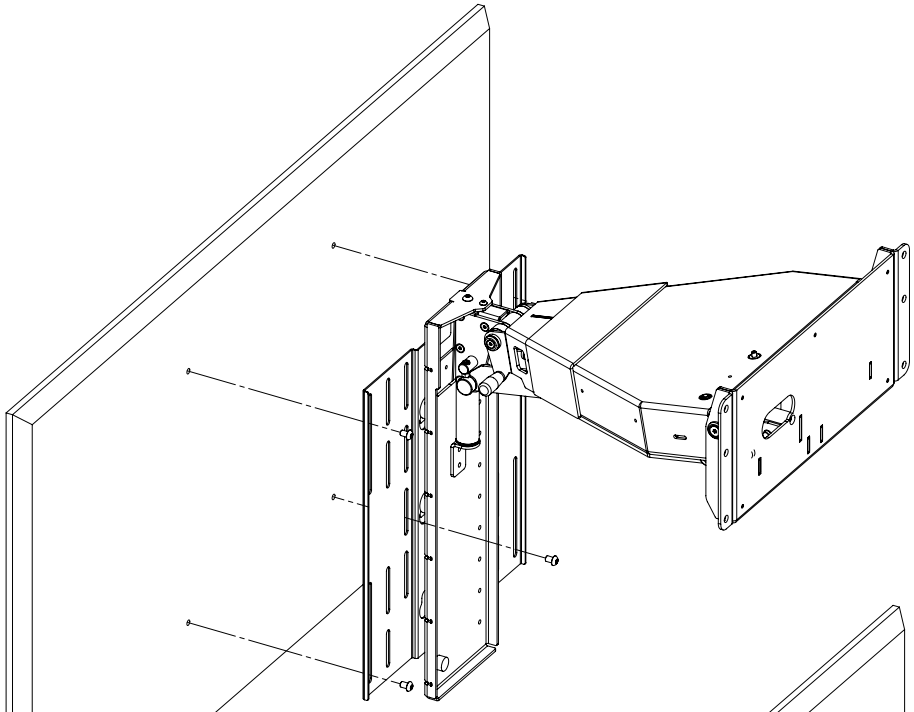
Section view



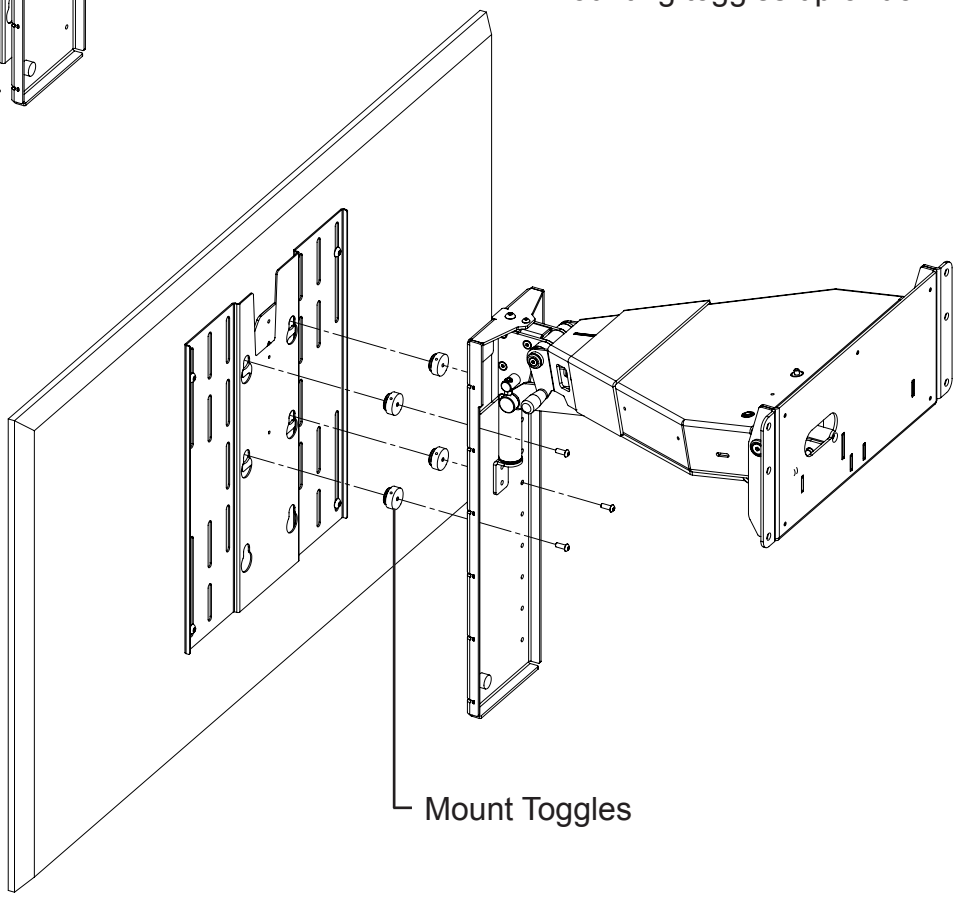
EAD2 - Electric Advance & Drop V2

Mounting the screen

Attach the screen to the KH mounting plate using the appropriate fixings found in the fixtures pack.
It may be necessary with some screens to use spacers to provide clearance for AV cables at the rear



It is possible to get further height adjustment by repositioning the mounting toggles up or down.



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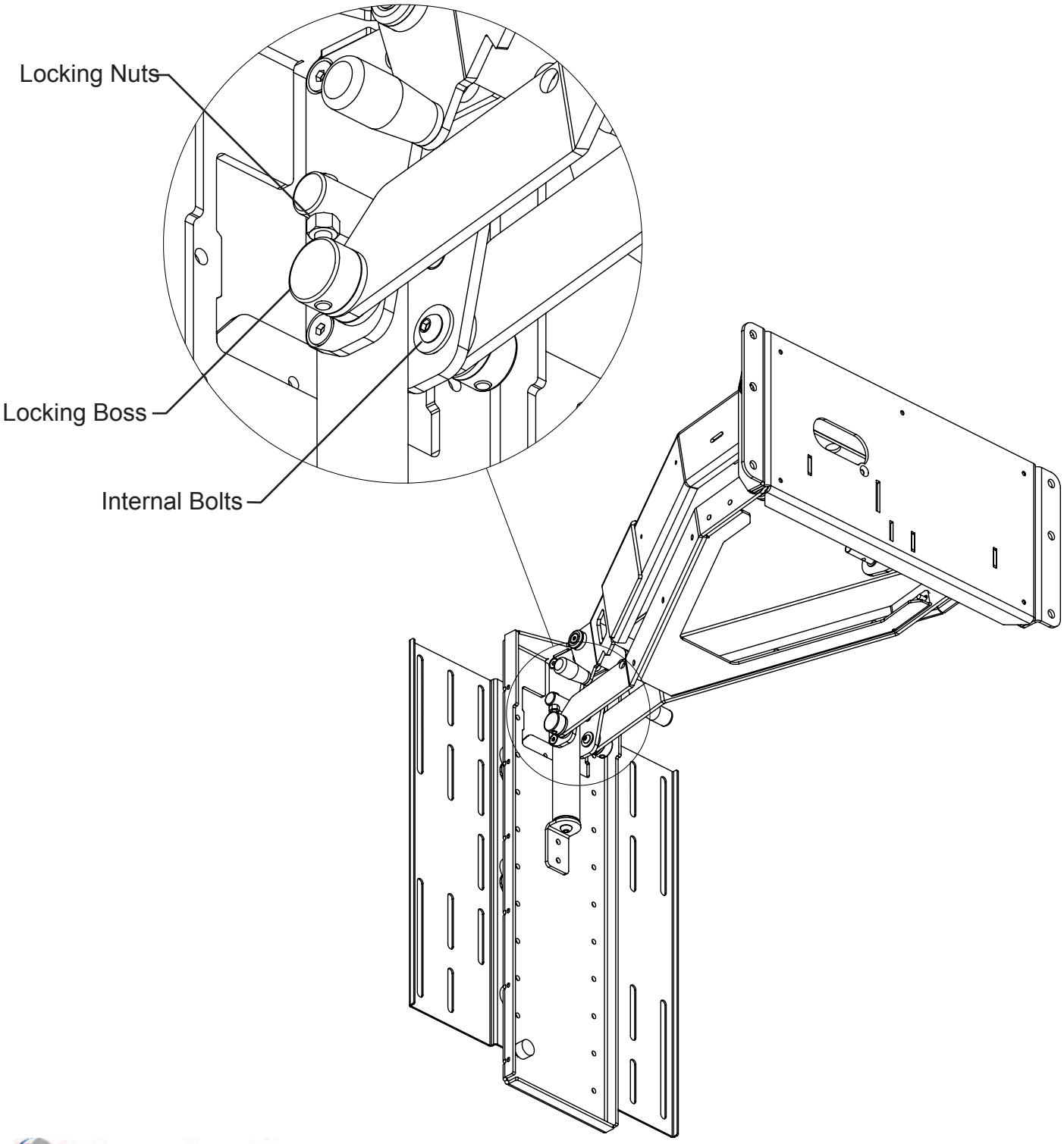
Tilt Adjustment (If Required)

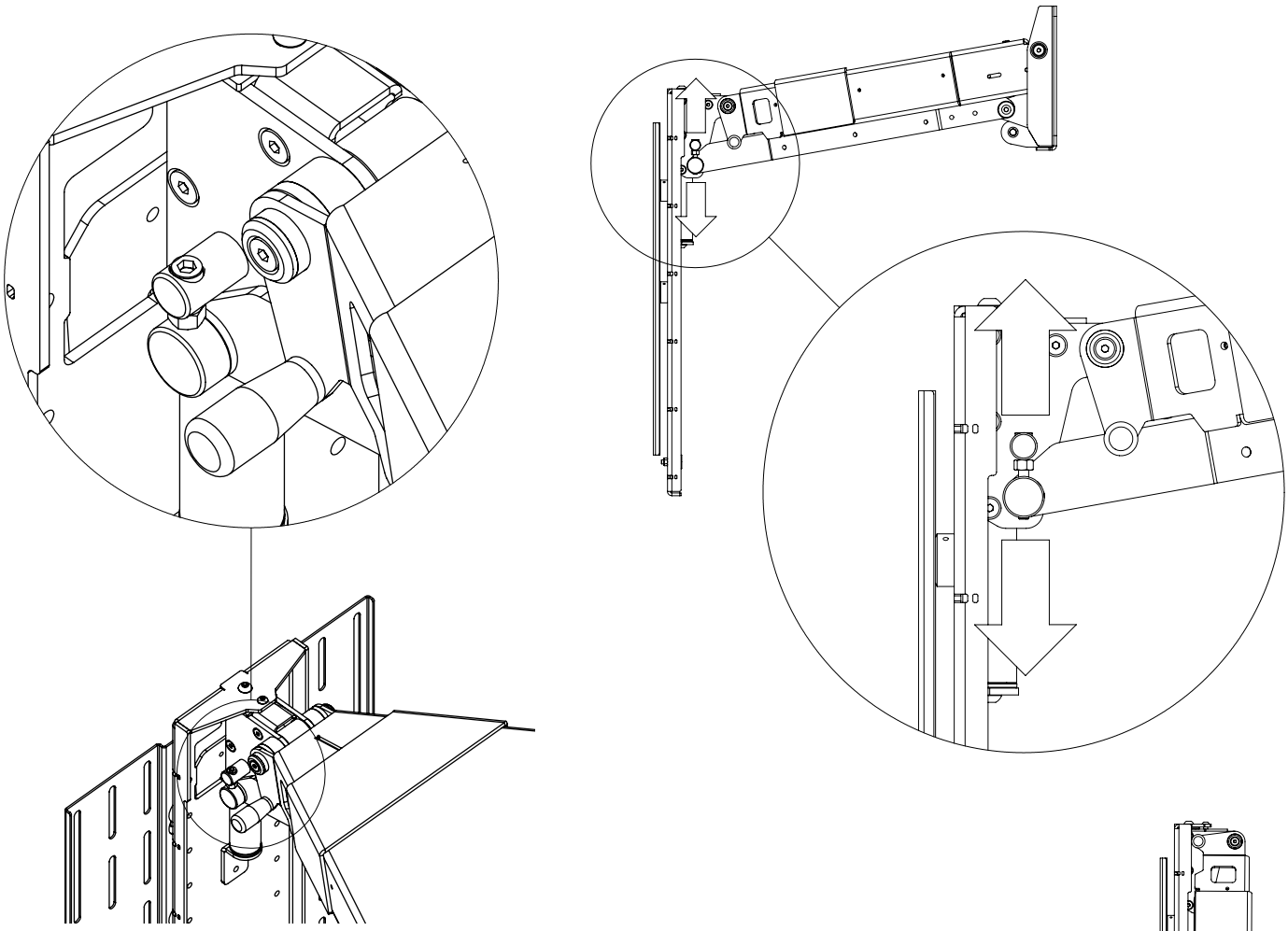
To adjust the tilt of the screen when in the up position, run into the out position, then loosen the internal bolt and the locking nuts so the locking boss can slide up or down.



EAD2 - Electric Advance & Drop V2

Tilt Adjustment (If Required)

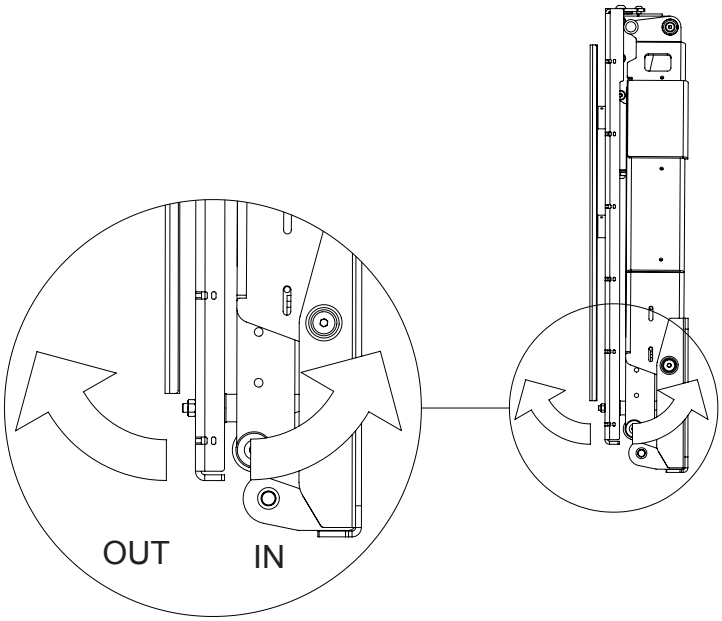
Turn the captive bolts simultaneously or turn by turn to alter the tilt position. Tighten the internal bolts and locking nuts and run the EAD2 back into the up position to see the tilt alteration. It may be necessary to repeat this procedure a few times until the desired tilt has been acquired.



TURN BOLT CLOCKWISE - BOTTOM TILTS OUT

TURN BOLT ANTI-CLOCKWISE - BOTTOM TILTS IN

Once tilt position is set tighten the internal bolts and locking nuts back up



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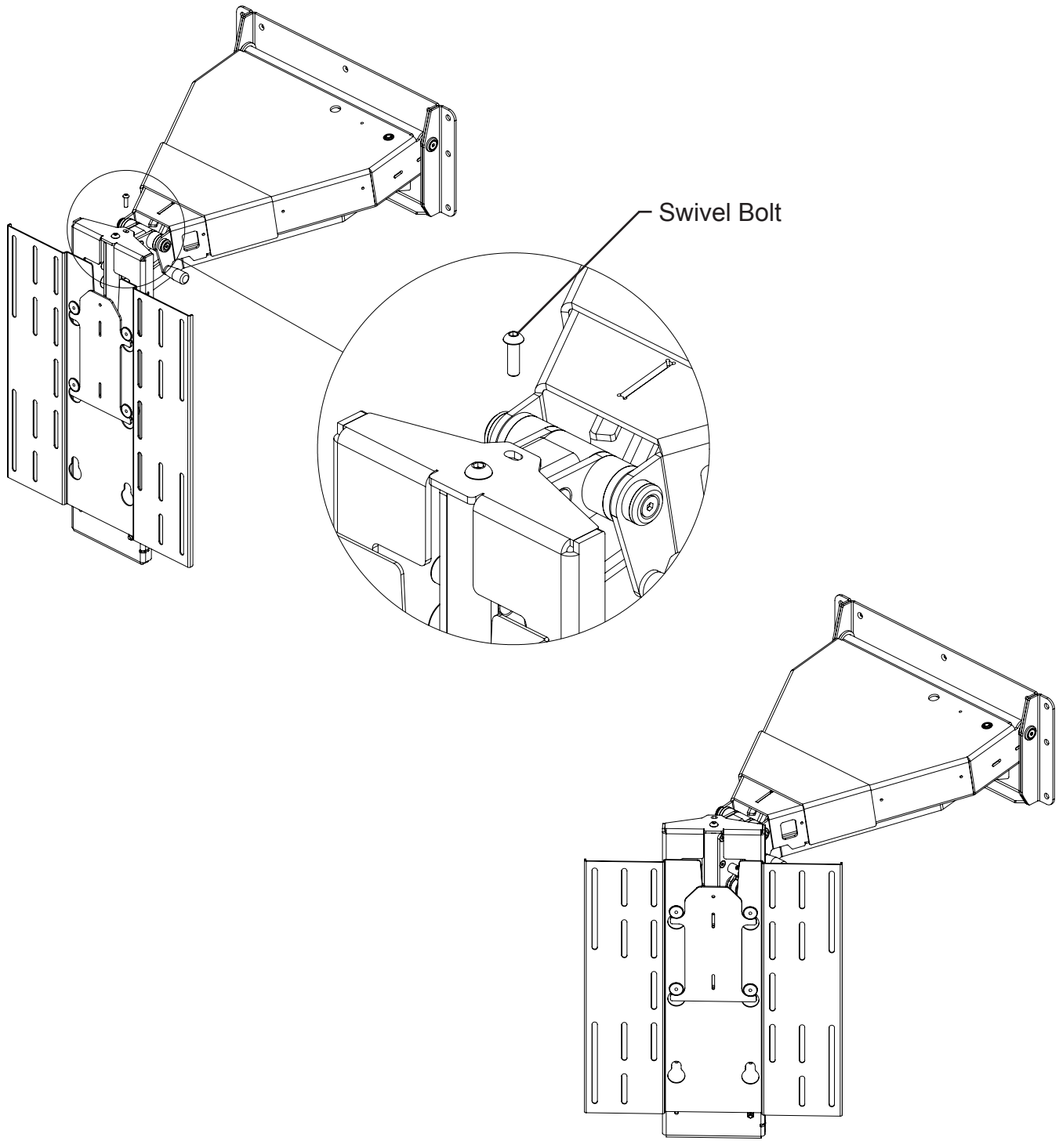
Swivel Option

Remove swivel bolt to enable swivel function, if not required leave in place for parallel tracking. Up to 45 degrees rotation in each direction.

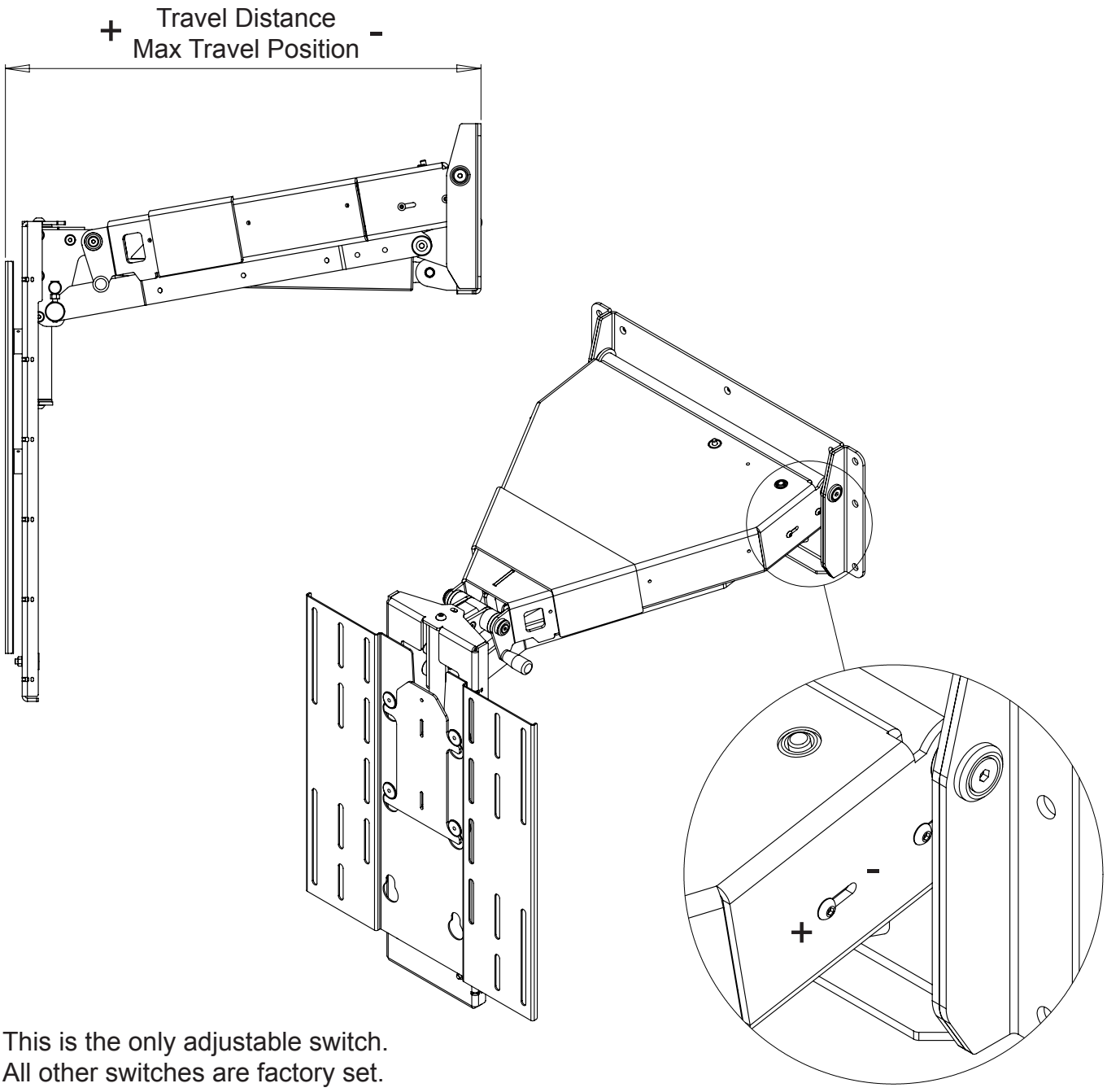


EAD2 - Electric Advance & Drop V2

Travel Switch Adjustment

To adjust the travel distance out position, loosen the 2 switch bolts on the side of the advance arm shown below in the detailed view. Slide the switch to adjust the travel.

Sliding the switch backwards towards the wall will reduce the travel distance.
Sliding the switch forwards towards the screen will increase the travel distance.

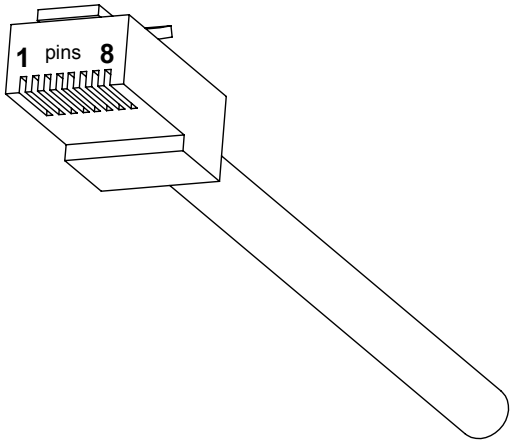


This is the only adjustable switch.
All other switches are factory set.

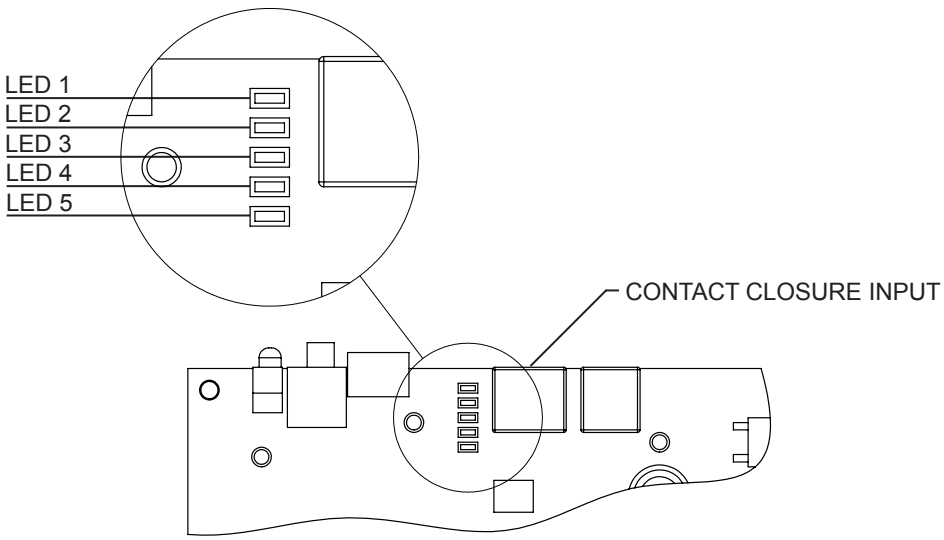
EAD2 - Electric Advance & Drop V2

Contact Closure

- Use an RJ45 connector in the CCI socket on the control box to operate via contact closure



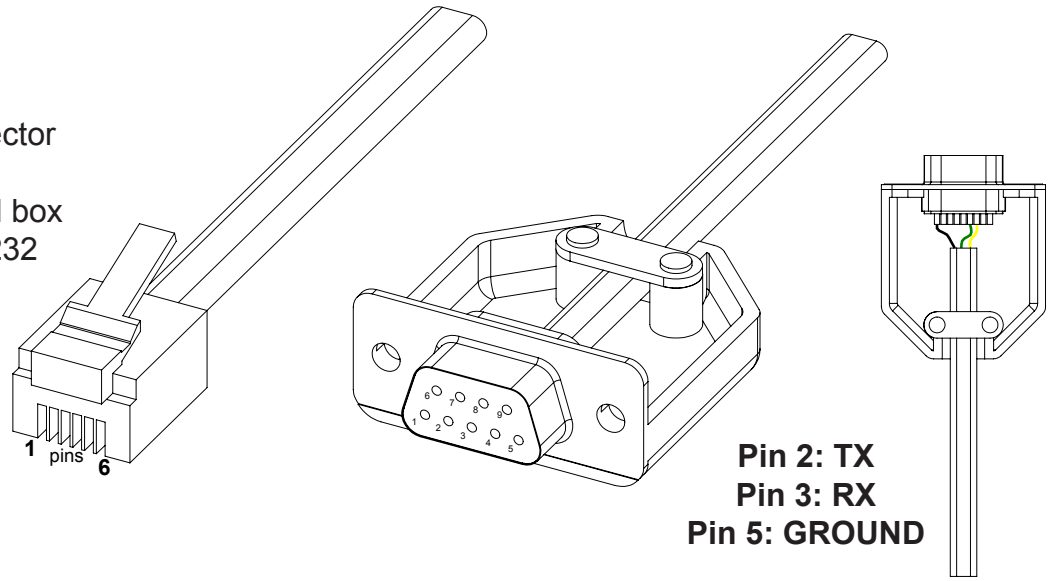
PIN	DESCRIPTION	ACTION	WIRE / CABLE		CONTACT CLOSURE LED INDICATOR
			568A	568B	
1	12V SUPPLY	12V SUPPLY - CURRENT LIMITED	W/G	W/O	
2	12V LATCH	When 12V attached, device will go OUT. When 12V removed, device will go IN.	G	O	
3	GROUND	GROUND	W/O	W/G	
4		PIN 4 NOT USED	BL	BL	
5	DEVICE LATCH	Short to GROUND (pin 3), device will go OUT, remove short device will go IN.	W/BL	W/BL	LED 4
6	DEVICE STOP	Momentary short to GROUND (pin 3), stops device in current position.	O	G	LED 3
7	DEVICE OUT	Momentary short to GROUND (pin 3), makes device go OUT.	W/BR	W/BR	LED 2
8	DEVICE IN	Momentary short to GROUND (pin 3), makes device go IN.	BR	BR	LED 1



EAD2 - Electric Advance & Drop V2

RS232
- Use an RJ25 connector in the socket marked RS232 on the control box to operate using RS232

Pin 1: RX
Pin 6 : TX
Pin 3 & 4: GROUND



Pin 2: TX
Pin 3: RX
Pin 5: GROUND

Details

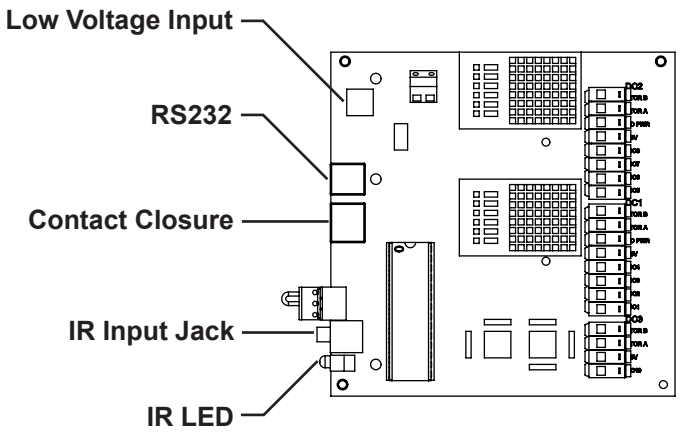
Baud rate:	9600
Stop bit:	1
Parity:	None
Databits:	8

RJ25		9 PIN D
PIN 1: RX	TO	PIN 2: TX
PIN 6: TX	TO	PIN 3: RX
PIN 3: GROUND	TO	PIN 5: GROUND
PIN 4: GROUND	TO	PIN 5: GROUND

IMPORTANT
Ensure protocol is entered exactly as written, including Carriage Return (Enter / ASCII 13).

Protocol	Action
fa_in Carriage Return (Enter ⏎)	Device IN
fa_out Carriage Return (Enter ⏎)	Device OUT
fa_stop Carriage Return (Enter ⏎)	Device STOP (At any position)

Operation Details

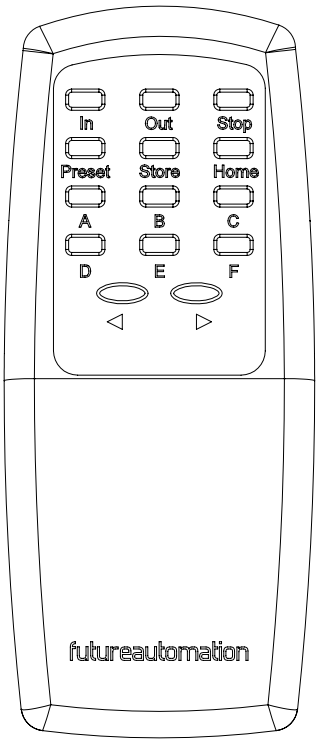


EAD2 - Electric Advance & Drop V2

Operation buttons for the IR remote

In - Brings the mechanism inside the cabinet

Stop - Will stop the operation at any position



Out - Brings the mechanism out of the cabinet facing forward

Store, Store + C - Stores max out position

Store, Store + B - Clears max out position

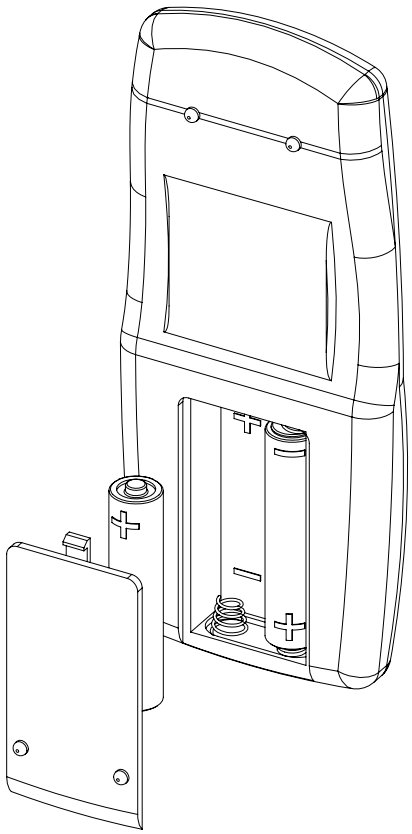
Store + D,E, F - Stores positions D, E & F

D, E, F - Moves to relevant stored position

Note
Only buttons indicated are functional with the product. Any button pressed when in motion mechanism will stop.

Replacing batteries

Future Automation IR Remote Controller needs x2 AAA batteries which are provided within the packaging



EAD2 - Electric Advance & Drop V2

A general technical overview of the EAD V2 electric advance and drop version 2 mechanism.

	EAD V2
Product Dimensions (W,H,D)	520x650x135mm [20.5x25.6x5.3"]
Weight	30Kg [66.1lb]
Power Consumption	250W - 500W
Power Consumption On Standby	100mA
Lifting Capacity (Kg)	25Kg [55.1lb]
Standard Colour	White Body with Black Screen Mount Plate
Max Rotation	45 Degrees
Control	IR Remote, RF Remote, Contact Closure & RS232
Power Supply	240V or 110V
Control Of 3rd Party Product	No
Shipping Details	
Dimensions Approx (W,D,H)	790x590x270mm [31.1x23.2x10.6"]
Weight Approx (Kg)	35Kg [77.2lb]

Wall Mount UBL2 - Trouble shooting

For information on our products please refer to our web site - **www.futureautomation.co.uk**
or for questions on installations and our product range please phone us on - **+44(0) 1438 833577** and ask for our technical support department

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