DIHOOL US-DHLCE-S395A

DIHOOL Electric Lift Table Instruction Manual

Model: US-DHLCE-S395A

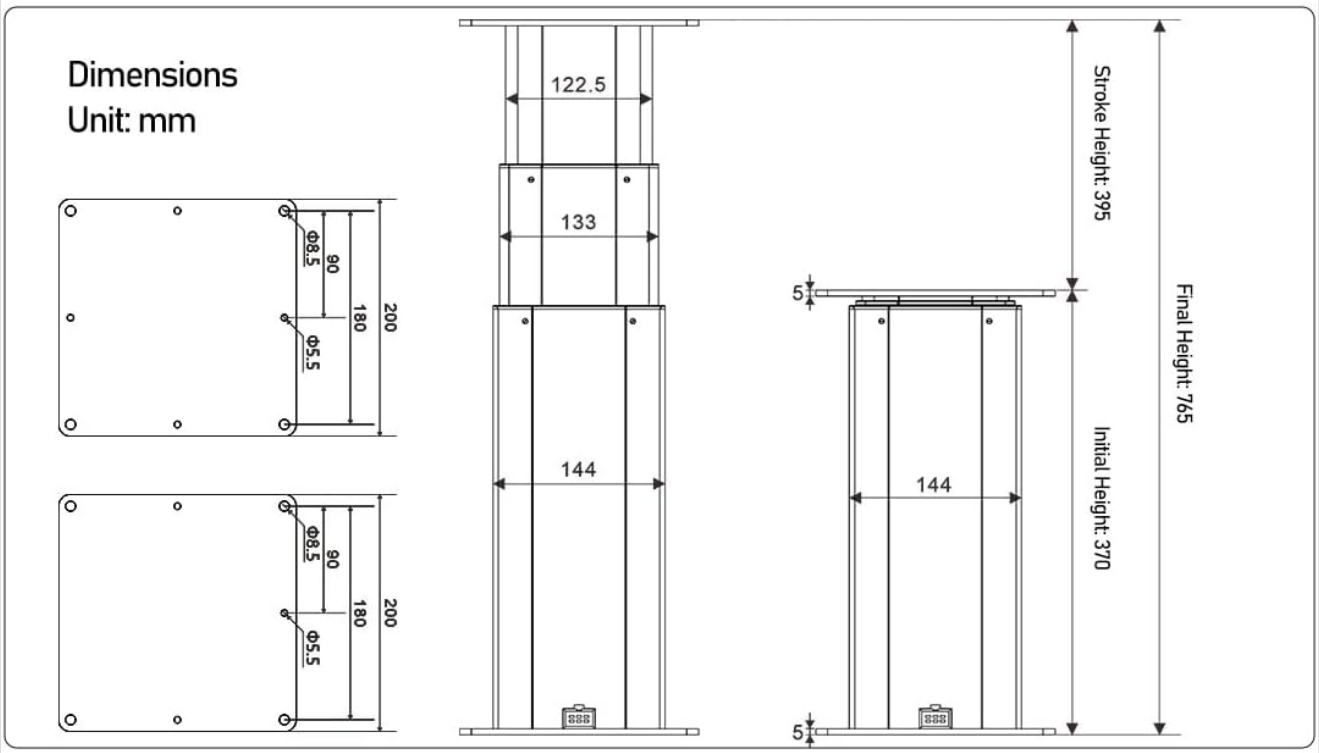
Brand: DIHOOL

1. Introduction and Product Overview

The DIHOOL Electric Lift Table, Model US-DHLCE-S395A, is a three-section electric lifting column designed for adjustable height applications. It is driven by a DC motor and constructed with aluminum oxide material for durability and efficient heat dissipation. This lifting platform is suitable for various uses, including medical appliances, home elevator systems, children's photography chairs, Japanese tatami tables, hidden lifting tables, children's toy tables, and laser printers.

Key features include a maximum load capacity of 80KG (180LB) and an adjustable height range. The system incorporates a current limit protection system that automatically disconnects the circuit if the load exceeds 80KG or an obstacle is detected, protecting the motor from damage. The controller supports multiple control methods, including remote, button, wire, and WiFi.

PARAMETERS



Model	DHLCE-S395A	DHLCE-S545A	DHLCE-S765A	DHLCE-S1155A
Initial Height	370mm/14.6in	480mm/18.9in	590mm/23.2in	800mm/31.5in
Final Height	765mm/30.1in	1025mm/40.4in	1355mm/53.3in	1955mm/77in
Stroke Length	395mm/15.6in	545mm/21.5in	765mm/30.1in	1155mm/45.5in
Section	3			
Voltage	DC20~32V			
No-Load Speed	10MM/S			
Max Load Capacity	200KG / 450LB			
Self-Locking Force	2500N(250KG) / 550LB			
Operating Temperature	-10°C~+60°C			
Limit Switches	Built-in			
Operating Frequency	10% Work System, Maximum 20 Minutes Continue Working			
Material	Body Aluminum， Panel Iron			
Note	If the load ⩾ 150KG(330LB), it cannot work continuously for more than 10 minutes			

Image 1.1: Overview of the DIHOOL Electric Lift Table's 3-section sleeve lifting structure, built-in limit switch, and quiet operation. The structure allows for simultaneous lifting and lowering of double-layer aluminum tubes, enhancing aesthetics. A built-in limit switch prevents damage from the internal telescopic push rod extending too far. The unit operates at a quiet 30dB.

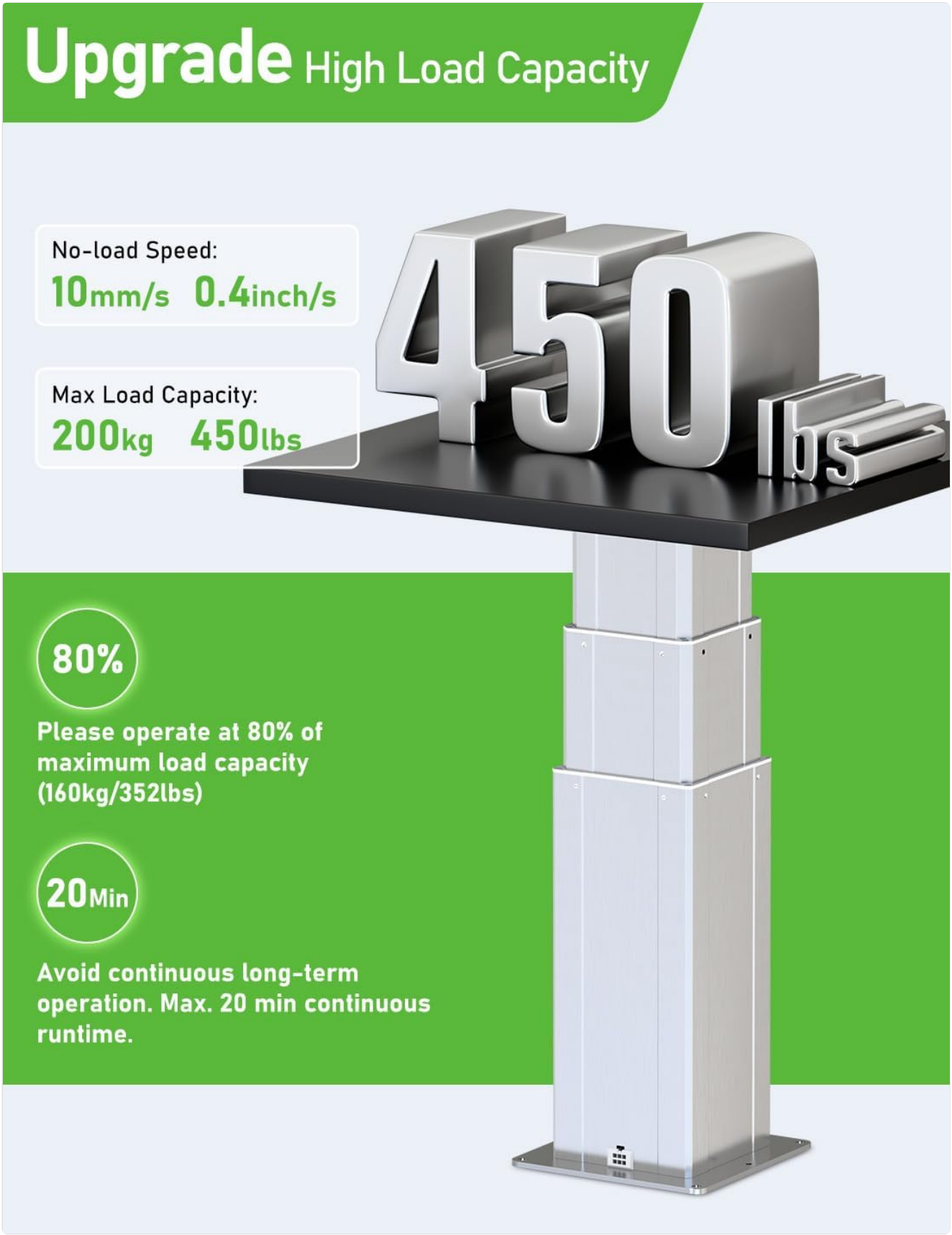


Image 1.2: Illustration of the lift table's high load capacity. It has a no-load speed of 10mm/s (0.4inch/s) and a maximum load capacity of 200kg (450lbs). For optimal performance and longevity, it is recommended to operate at 80% of the maximum load capacity (160kg/352lbs) and avoid continuous long-term operation, with a maximum continuous runtime of 20 minutes.

2. Safety Information

Read all instructions carefully before installation and operation. Failure to follow these instructions may result in injury or damage to the product.

- **Load Capacity:** Do not exceed the maximum load capacity of 80KG (180LB). The static load capacity is 120KG (260LB). Overloading can cause damage to the motor and lifting mechanism.
- **Obstacle Detection:** The controller features a current limit protection system. If the load exceeds the maximum or an obstacle is encountered, the system will automatically disconnect to prevent motor damage. However, always ensure the path of movement is clear.
- **Continuous Operation:** The motor requires heat dissipation. Avoid continuous operation for extended periods. The operating frequency is a 10% working system, with a maximum continuous run time of 20 minutes. After 20 minutes of continuous operation, allow the unit to cool down.
- **Power Supply:** Ensure the power supply voltage matches the product specifications (AC100V-220V for power supply, DC24-30V for DC Motor).
- **Installation:** Follow installation guidelines carefully. For ceiling installations, ensure the load capacity is less than 140KG and use specialized expansion screws. Lateral installation is prohibited and will void the warranty for any resulting damage.
- **Children and Pets:** Keep children and pets away from the lift table during operation to prevent accidents.
- **Environmental Conditions:** Operate the lift table within the specified temperature range of -15°C to +65°C.

3. Product Specifications

The following table details the technical specifications for the DIHOOL Electric Lift Table, Model US-DHLCE-S395A.

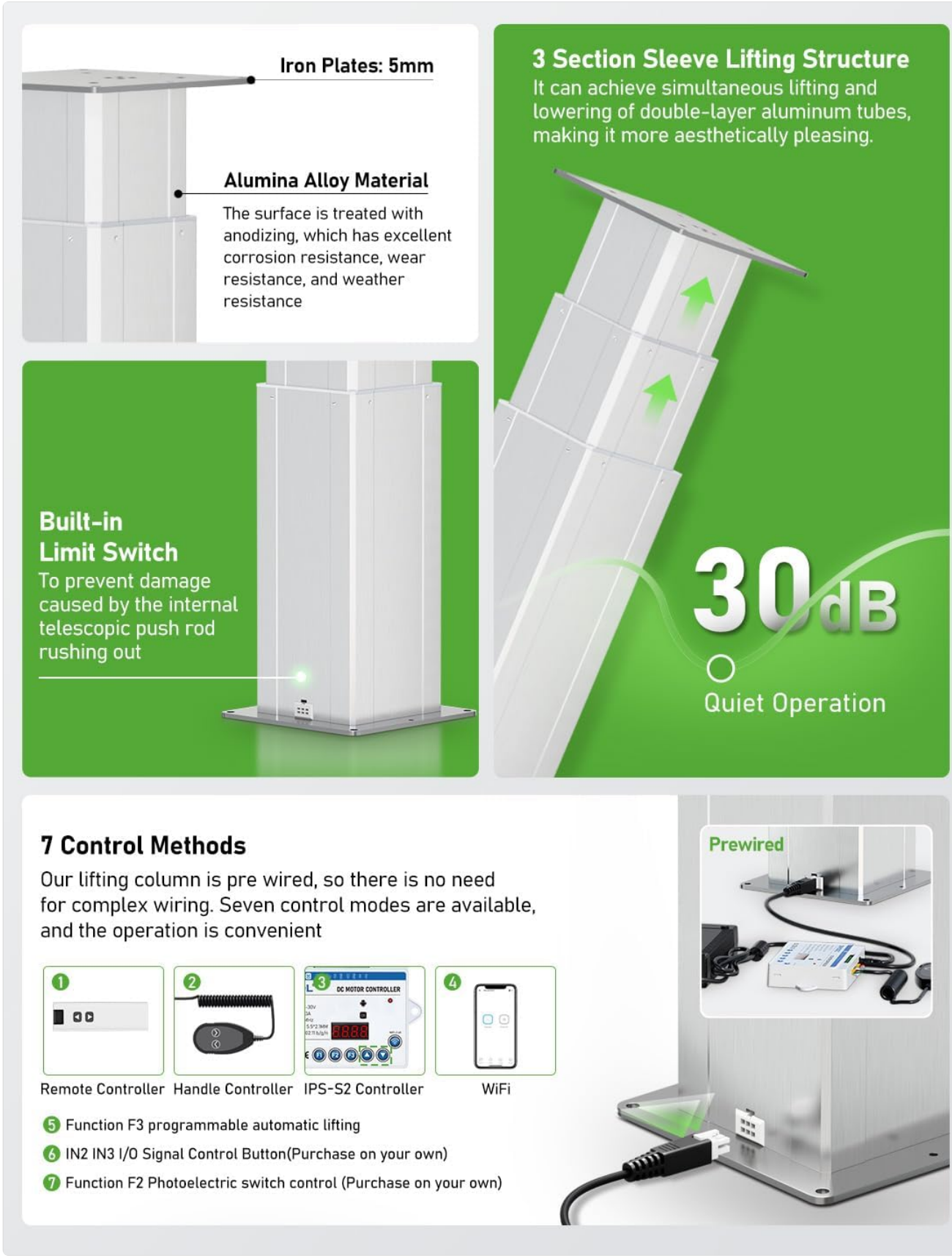


Image 3.1: Detailed parameters and dimensions for various DIHOOL electric lift table models, including DHLCE-S395A. This model features an initial height of 370mm (14.6in), a final height of 765mm (30.1in), and a stroke length of 395mm (15.6in). It is a 3-section unit with a voltage range of DC20-32V, a no-load speed of 10mm/s, and a max load capacity of 200KG (450LB). It includes built-in limit switches and operates at a 10% work system, with a maximum of 20 minutes continuous working time. The material is body aluminum with an iron panel.

Specification	Value
Model	US-DHLCE-S395A

Specification	Value
Max Load Capacity	80KG / 180LB
Static Load Capacity	120KG / 260LB
Min. Height	360MM (14.17")
Max. Height	790MM (31.10")
Stroke Length	430MM
Speed	10MM/S
Column Width	144*144MM
Dimensions (L.W.H)	200*200*360MM
Voltage (Power Supply)	AC100V-220V
Voltage (DC Motor)	DC24-30V
Amperage Capacity	3 Amps
Surface Treatment	Electrophoretic black
IP Grade	IP43
Operating Temperature	-15°C ~ +65°C
Operating Frequency	10% working system, maximum 1 hour work continue (Note: Image 3.1 states max 20 min continuous working)
Material	Aluminum Oxide
Noise Level	40 Decibels
Included Components	Controller
Assembly Required	Yes
Item Weight	9 Kilograms

4. Setup and Installation

This section provides guidance on installing your DIHOOL Electric Lift Table. Ensure all components are present before beginning installation.

4.1 Included Accessories

The package includes the necessary hardware for installation:

- M8*20 Bolts (8pcs)

- M8 Nuts (8pcs)
- M5*25 Screws (16pcs)

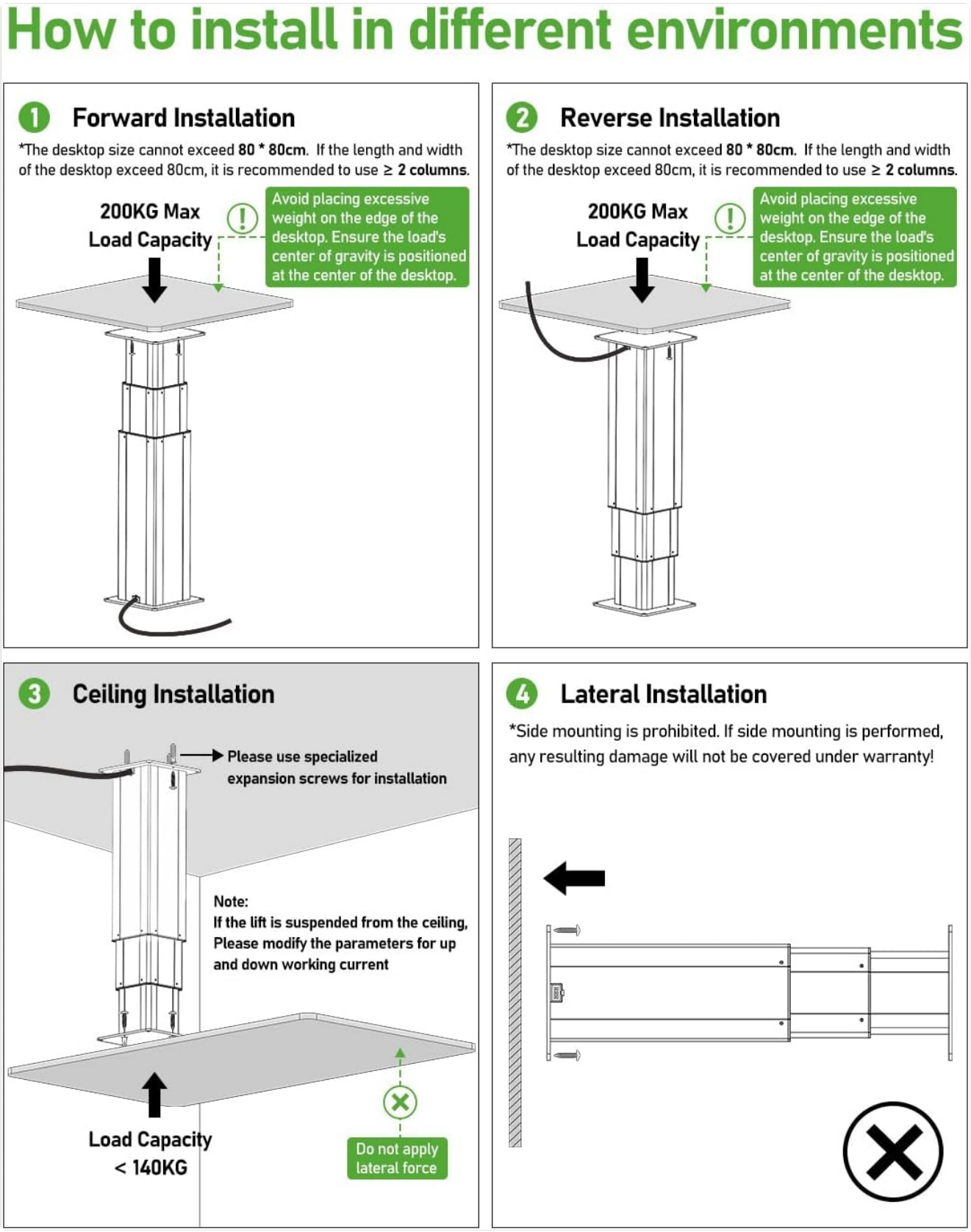


Image 4.1: Description of included accessories (M8*20 Bolts, M8 Nuts, M5*25 Screws) and examples of installation methods. For wooden board installation, use M5*25 screws. For steel plate installation, use M8*20 bolts and M8 nuts. The image also highlights customizable options for enclosure color, upper/lower panels, and power interface.

4.2 Installation Environments

The lift table can be installed in various configurations. Always ensure the desktop size does not exceed 80*80cm. If the

length and width of the desktop exceed 80cm, it is recommended to use 2 or more columns.

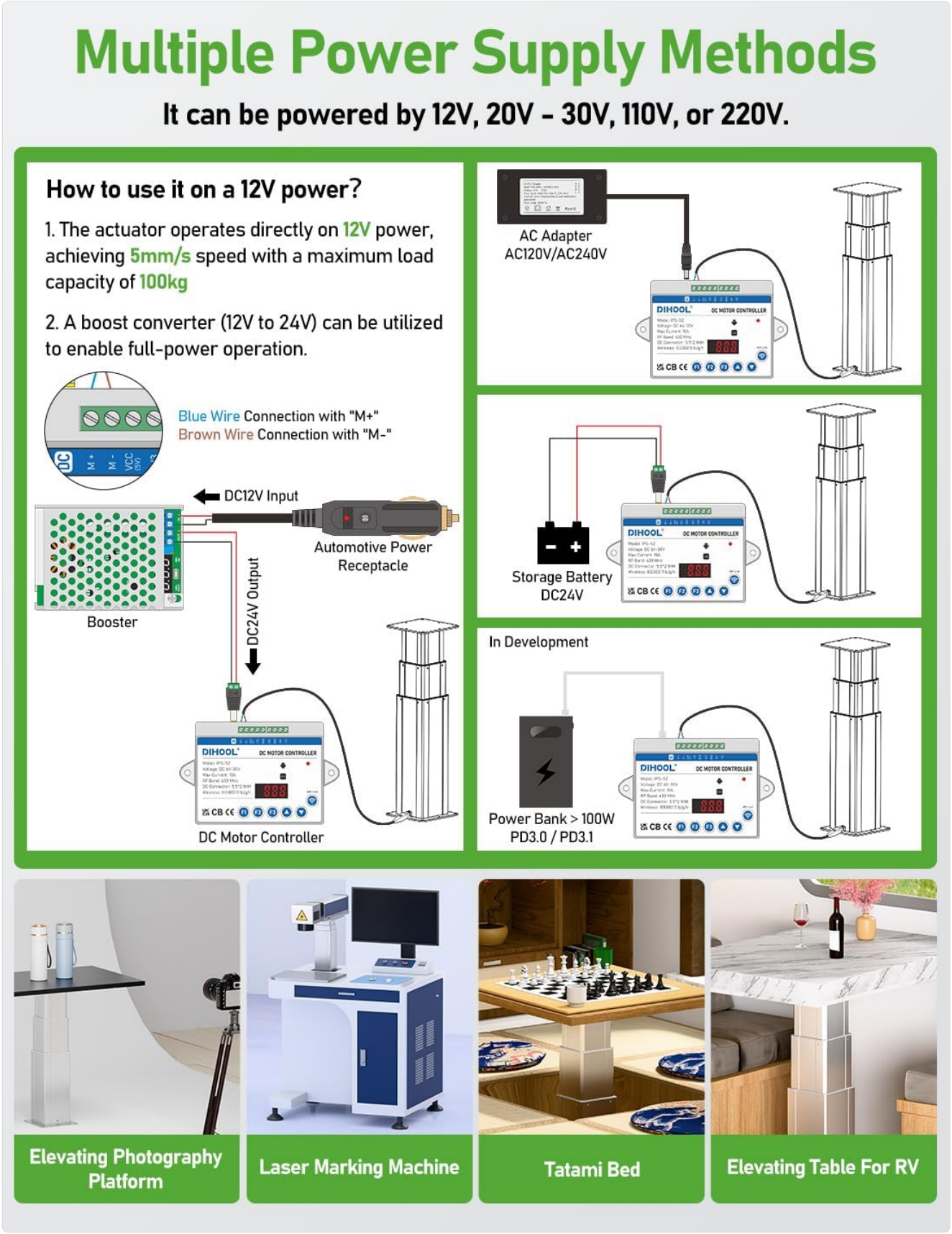


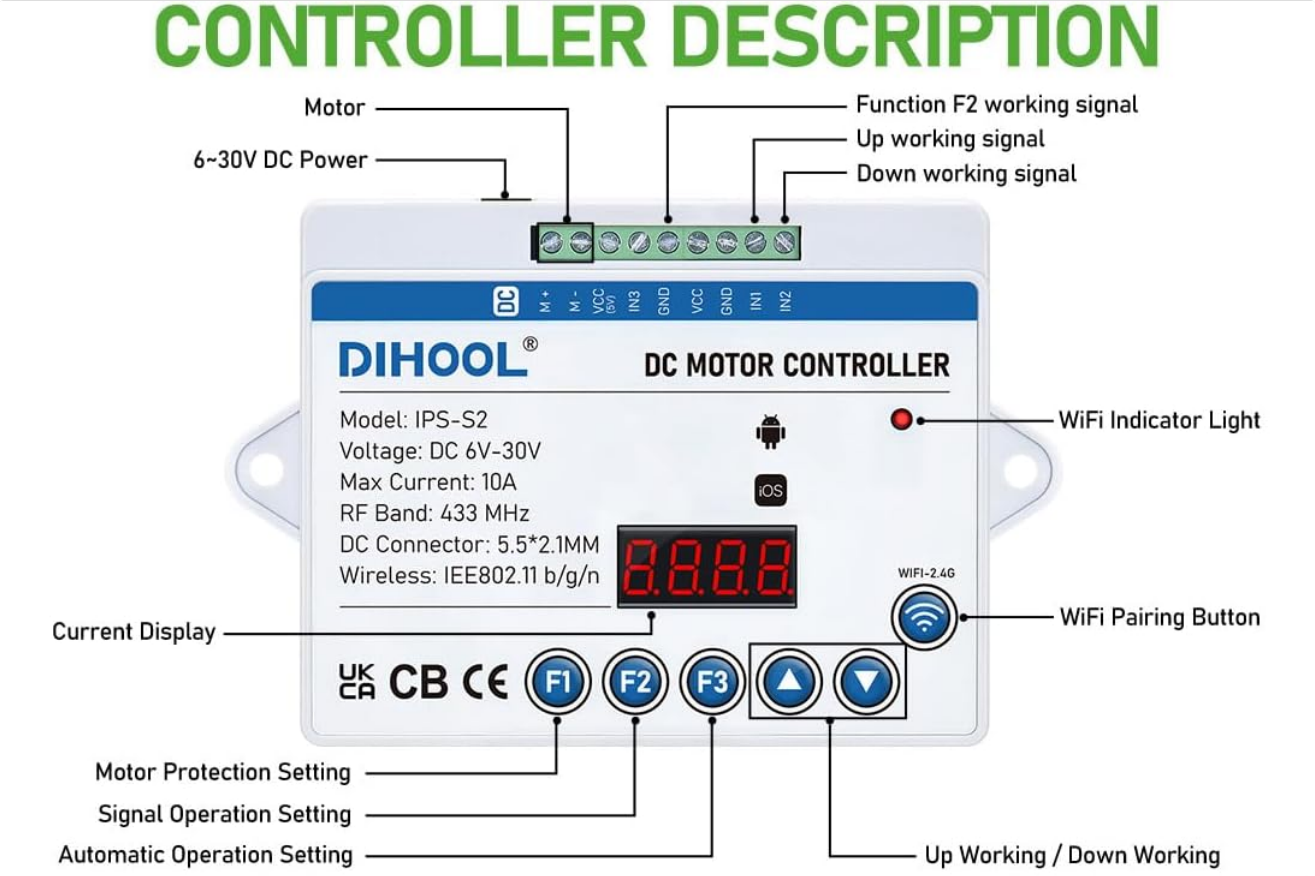
Image 4.2: Illustrations of different installation methods. **Forward Installation:** The desktop size should not exceed 80*80cm. Avoid placing excessive weight on the edge of the desktop; ensure the load's center of gravity is positioned at the center. **Reverse Installation:** Similar desktop size and weight distribution guidelines apply. **Ceiling Installation:** Use specialized expansion screws. If the lift is suspended from the ceiling, modify parameters for up and down current. Load capacity must be less than 140KG. **Lateral Installation:** Side mounting is prohibited. Any resulting damage will not be covered under warranty.

1. **Forward Installation:** Mount the lift table with the motor facing downwards. Ensure the load is centered to prevent tipping.

2. **Reverse Installation:** Mount the lift table with the motor facing upwards. Ensure the load is centered.
3. **Ceiling Installation:** This method requires specialized expansion screws. If suspending the lift from the ceiling, it is crucial to adjust the parameters for the up and down current in the controller. The load capacity for ceiling installation must be less than 140KG.
4. **Lateral Installation:** Side mounting is strictly prohibited. Any damage resulting from lateral installation will not be covered under warranty.

4.3 Power Supply Methods

The lift table can be powered by various methods, including 12V, 20V-30V, 110V, or 220V.



FUNCTION F1: MOTOR PROTECTION SETTINGS

Press and hold the **F1** key for 3 seconds to enter the F1 sub-function settings, click F1 to switch in the sub-functions, and hold the **F1** key for 3 seconds to exit the setting (press" ▲ " to increase /" ▼ " to adjust the value)

Code/Subfunction Name		Subfunction Parameter Description	Value	Refer Value	
A	Current Limit For Up	Limited Current Value For The Moving Up	A00.1~ A10.0	A05.0	(Amp)
b	Current Limit For Down	Limited Current Value For The Moving Down	b00.1~ b10.0	b01.5	(Amp)
C	Running Time	Running Time Of The Motor	C000~ C999		(Seconds)
d	Current Limit For Rebound	Current Rate Of Change For Moving Down	d00.1~ d02.0	d00.6	(Amp)
E	Rebound Time	Running Time During Rebound	E001~ E999	E001	(Seconds)
F	Reduce Voltage For Down	Reduce Percentage Of Voltage During Lifting Down	F020~ F093	F093	(%)
L	Reduce Voltage For Up	Reduce Percentage Of Voltage During Lifting Up	L020~ L093	L093	(%)
t	Standby Time	Standby Time Of The Screen	t000~ t999	T005	(Minutes)

FUNCTION F2: SIGNAL OPERATION SETTINGS

Press and hold the **F2** key for 3 seconds to enter the F2 sub-function settings, click F2 to switch in the sub-functions, and hold the **F2** key for 3 seconds to exit the setting (press" ▲ " to increase /" ▼ " to adjust the value)

Code/Subfunction Name		Subfunction Parameter Description	Value	
A	Up Woking Time	Motor Up Working Time	A000~ A999	(Seconds)
b	Pause Time	Motor Pause Time	b000~ b999	(Seconds)
C	Down Woking Time	Motor Down Working Time	C000~ C999	(Seconds)
d	Operation Mode 0: Motor Working 1: Motor not Working	0: Signal Present, stop. Signal disappear, execute actions A,b,c 1: Signal Present, stop after executing action A. Signal disappear, execute actions b and c	0-1	/

FUNCTION F3: AUTOMATIC OPERATION SETTINGS

Press and hold the **F3** key for 3 seconds to enter the F3 sub-function settings, click F3 to switch in the sub-functions, and hold the **F3** key for 3 seconds to exit the setting (press" ▲ " to increase /" ▼ " to adjust the value)

Code/Subfunction Name		Subfunction Parameter Description	Value	
A	Up Woking Time	Motor Up Working Time	A001~ A999	(Seconds)
b	Pause Time	Motor Pause Time	b000~ b999	(Seconds)
C	Down Woking Time	Motor Down Working Time	C001~ C999	(Seconds)
d	Pause Time	Motor Pause Time	d000~ d999	(Seconds)
E	Number of Cycles	The Number Of Cycles Of The Motor	0~999	(frequency)
F	Cycle Operation Model: 0 Close, 1 Start	0: Close Cycle Operation; 1: Start Cycle Operation Press the " ▲ " / " ▼ " to start, press again to close	0-1	/

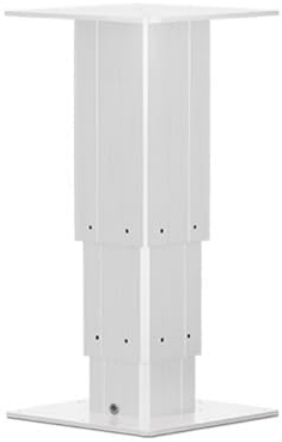
Image 4.3: Demonstrates multiple power supply methods. The actuator can operate directly on 12V power, achieving 5mm/s speed with a maximum load capacity of 100kg. A boost converter (12V to 24V) can be used to enable full-power operation. Examples include AC adapter (AC120V/AC240V), automotive power receptacle (DC12V input with boost converter), storage battery (DC24V), and power bank (100W PD3.0/PD3.1). Common applications shown are elevating photography platforms, laser marking machines, tatami beds, and elevating tables for RVs.

5. Operating Instructions

The DIHOOL Electric Lift Table features a pre-wired controller with seven available control modes for convenient operation.

5.1 Controller Description

The lift has undergone various upgrades



Product Model	DHLCE-S	DHLCE	DHLC1100
Maximum Power Of Motor	120W	60W	60W
Sections Of Aluminum Tubing	3	3	2
Load Capacity	450LB	176LB	600LB
Speed	No-load: 10MM/S 70KG Load: 9MM/S	No-load: 9MM/S 70KG Load: 3.5MM/S	No-load: 5MM/S 70KG Load: 4MM/S
Stroke	395MM/545MM/ 765MM/1155MM	275MM/375MM/430MM	300MM/500MM
Noise	30dB	45dB	30dB
Motor Type	Hall Coded Motor	Brush Motor	Brush Motor
Customized	Customizable	Non-customizable	Customizable

Image 5.1: Detailed diagram of the DIHOOL DC Motor Controller (Model: IPS-S2). It shows various components including the motor connection (6-30V DC Power), WiFi indicator light, WiFi pairing button, current display, and control buttons (F1, F2, F3, Up, Down, Set). The image also outlines the functions of F1 (Motor Protection Setting), F2 (Signal Operation Setting), and F3 (Automatic Operation Setting) with their respective sub-functions and parameter descriptions.

5.2 Control Methods

The lifting column is pre-wired, simplifying setup. Seven control modes are available:

1. Remote Controller

2. Handle Controller
3. IPS-S2 Controller (Main unit)
4. WiFi Control
5. Function F3 programmable automatic lifting
6. IN2 IN3 I/O Signal Control Button (Purchase separately)
7. Function F2 Photoelectric switch control (Purchase separately)

5.3 Controller Functions

The controller features three main function buttons (F1, F2, F3) for advanced settings:

- **F1: Motor Protection Settings**
  Press F1 to enter sub-function settings. Use the up/down arrows to select and adjust parameters such as Current Limit Up/Down, Running Time Up/Down, Rebound Time, Reduce Voltage for Up/Down, and Standby Time.
- **F2: Signal Operation Settings**
  Press F2 to enter sub-function settings. Adjust parameters like Up/Down Working Time, Motor Running Time, Operation Mode (Signal present, stop; Signal disappear, execute actions A,b,c; Signal present, execute actions A,b,c; Signal disappear, execute actions b and c), and Motor Not Working.
- **F3: Automatic Operation Settings**
  Press F3 to enter sub-function settings. Adjust parameters such as Up/Down Working Time, Pause Time, Down Working Time, Number of Cycles, and Cycle Delay Mode.

Timing Control: If a specific height is desired (e.g., 200MM), calculate the time required to reach that height and then set parameter C (time) within the F3 Automatic Operation Settings.
Downward Current Setting: The controller allows setting a downward current 0.2~0.3A higher than the indicated current. This feature helps prevent objects from being caught during downward movement.

6. Maintenance

Regular maintenance ensures the longevity and optimal performance of your DIHOOL Electric Lift Table.

- **Cleaning:** Periodically clean the exterior of the lift column with a soft, dry cloth. Avoid using abrasive cleaners or solvents that could damage the aluminum oxide finish.
- **Inspection:** Regularly inspect all cables and connections for any signs of wear, fraying, or damage. Ensure all mounting bolts and screws are securely tightened.
- **Lubrication:** The internal mechanism is generally maintenance-free. Do not attempt to lubricate internal components unless specifically instructed by DIHOOL support.
- **Overload Prevention:** Always adhere to the maximum load capacity of 80KG (180LB). Operating the unit beyond its rated capacity can lead to premature wear and motor failure.
- **Cooling Periods:** Respect the operating frequency of 10% working system, with a maximum continuous run time of 20 minutes. Allow the motor to cool down after extended use to prevent overheating.
- **Environmental Protection:** Keep the lift table in an environment within the specified operating temperature range and protect it from excessive moisture or dust, which can affect electrical components.

7. Troubleshooting

This section addresses common issues you might encounter with your electric lift table. If the problem persists, contact customer support.

Problem	Possible Cause	Solution
Lift table does not move	No power supply Loose cable connection Overload protection activated Controller malfunction	Check power outlet and cable connections. Ensure all cables are securely plugged in. Reduce load; check for obstacles. Allow motor to cool if recently overloaded. Refer to controller manual or contact support.
Lift table moves slowly or intermittently	Insufficient power Partial overload Motor overheating	Ensure stable power supply. Check voltage. Reduce load to below maximum capacity. Allow the unit to cool down. Avoid continuous operation.
Unusual noise during operation	Obstruction in lifting mechanism Loose components Motor issue	Inspect the lifting column for any foreign objects. Check all mounting hardware for tightness. If noise persists, discontinue use and contact support.
Controller display not working	No power to controller Controller cable issue	Check main power and controller connection. Ensure controller cable is not damaged or loose.
WiFi control not connecting	Incorrect WiFi settings Router issues	Refer to the controller manual for WiFi setup instructions. Ensure correct network and password. Restart your WiFi router.

8. Warranty and Support

For specific warranty terms and conditions, please refer to the documentation provided with your purchase or contact DIHOOL customer service directly. Warranty coverage typically includes defects in materials and workmanship under normal use.

Customer Support:

If you encounter any issues not covered in this manual or require further assistance, please contact DIHOOL customer support. Have your product model number (US-DHLCE-S395A) and purchase information ready when contacting support. Contact information can typically be found on the DIHOOL official website or on your product packaging.