

# Air Frame User Manual



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**Warranty Policy**

ROE Visual Co., Ltd. is pleased to offer a 2-year warranty on all standard products<sup>①</sup> against manufacturers defects, covering parts and labors. ROE will provide both factory and on-site technical support when necessary during the warranty period. Following cases are not included:

1. If replacement parts required, customers should ship defective parts at their cost. ROE will ship replacement parts at our cost, during the warranty period.
2. In terms of customized products<sup>②</sup> and/or systems<sup>③</sup>, every order will be clearly specified in the contract and will be handled on an individual basis.
3. After the 2-year warranty, customers should bear charges of service and/or repair in accordance with the industrial standard.
4. The warranty will be void as follows:
  - (1) Accidents or human error.
  - (2) Any modification, disassembly, repair, maintenance or testing unauthorized by ROE.
  - (3) Product series number is broken, including SN, ESN, MEID, and IMEI.
  - (4) Gross negligence.

**Notes:**

- ① Standard products refer to products officially launched by ROE.
- ② Customized products refer to ROE standard products which are partially or totally designed in line with customers' requirements and demands.
- ③ Customized systems refer to products with special systems required by customers.

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# 1. Safety Information



This product is for professional use only. It is not for household use.

This product presents risk of severe injury if not used in the correct way.

Before use, always visually inspect for damage. Do not use if damage is found.

Do not use any abrasive or corrosive products to clean any of the carbon parts.

Do not use any clamps on the carbon parts.

Do not use tools to open/close the locks.



Read this manual before installing or servicing this product.

Follow safety precautions listed below and observe all warnings in this manual and printed on the product.

No magnesium alloy is used in this frame

All carbon fiber used is fire retardant.

## 2. Usage

### 2.1 Frame and Bracing

	<p>Open Bracing position</p> <p>Total depth: 448mm</p>
	<p>Closed Bracing position</p> <p>Total depth: 120mm</p>
	<p>Clamps are opened and closed using the red actuator.</p> <p>Arms need to be positioned according to the desired configuration. (bracing or transport)</p>
	<p>A transport lock is foreseen on the carbon frame tube.</p> <p>A red actuator is used to unlock.</p>



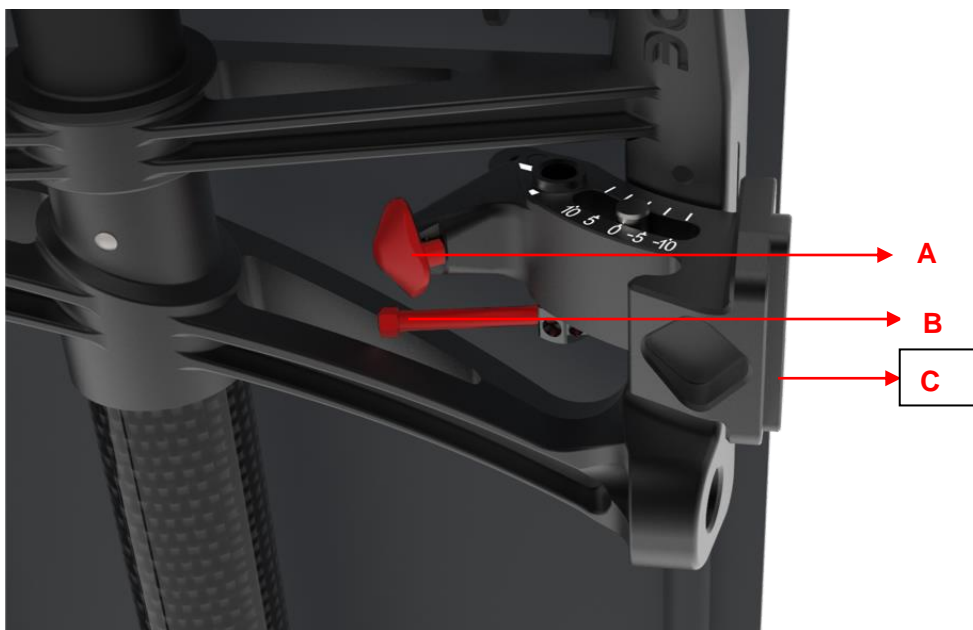
To lock the bracing, move part A upwards and rotate clockwise until part A is locked into part B.

To unlock the bracing, move part B upwards and rotate part A counterclockwise.



Locked position

## 2.2 Side Lock



The frame can be put in a +10 / +5 / 0 / -5 / -10 degree position.

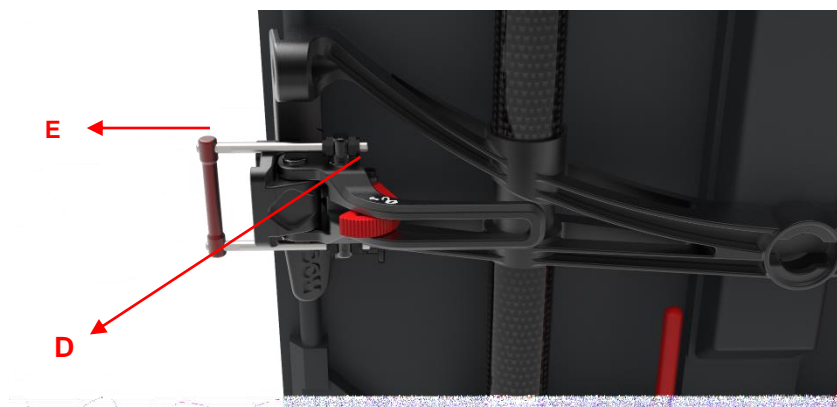
Also, any angle between +10 and -10 can be achieved by just tightening A to the correct position.

To achieve this, part A needs to be loosened by turning 90 degrees away from the tile.

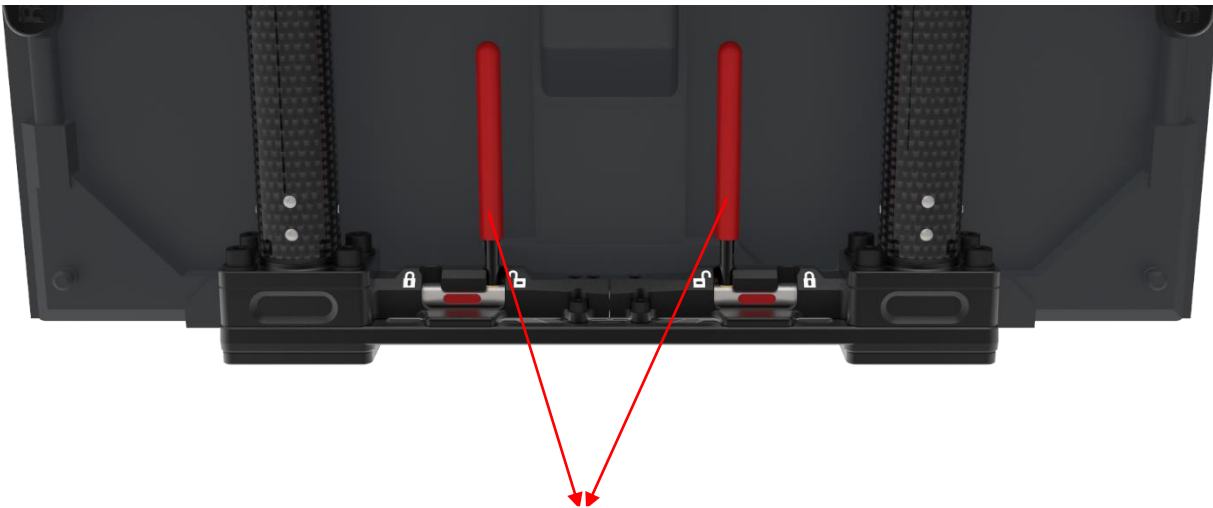
Pull part B and position part C in the desired position. Retighten part A.

Push lever D to unlock.

Always put locking handle D and latch E in this position for transport, to prevent damage to the next tile in the dolly.

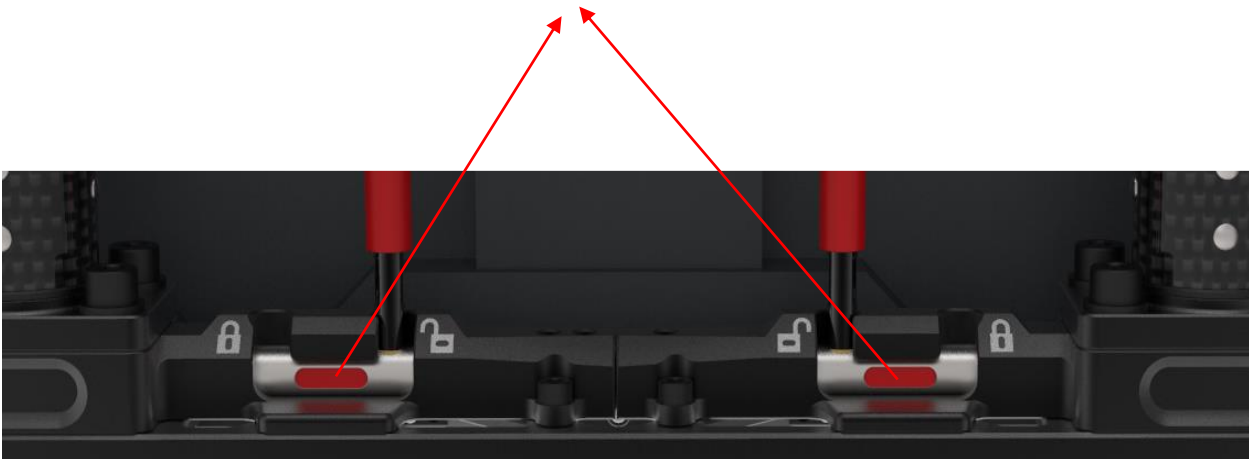


### 2.3 Bottom Lock

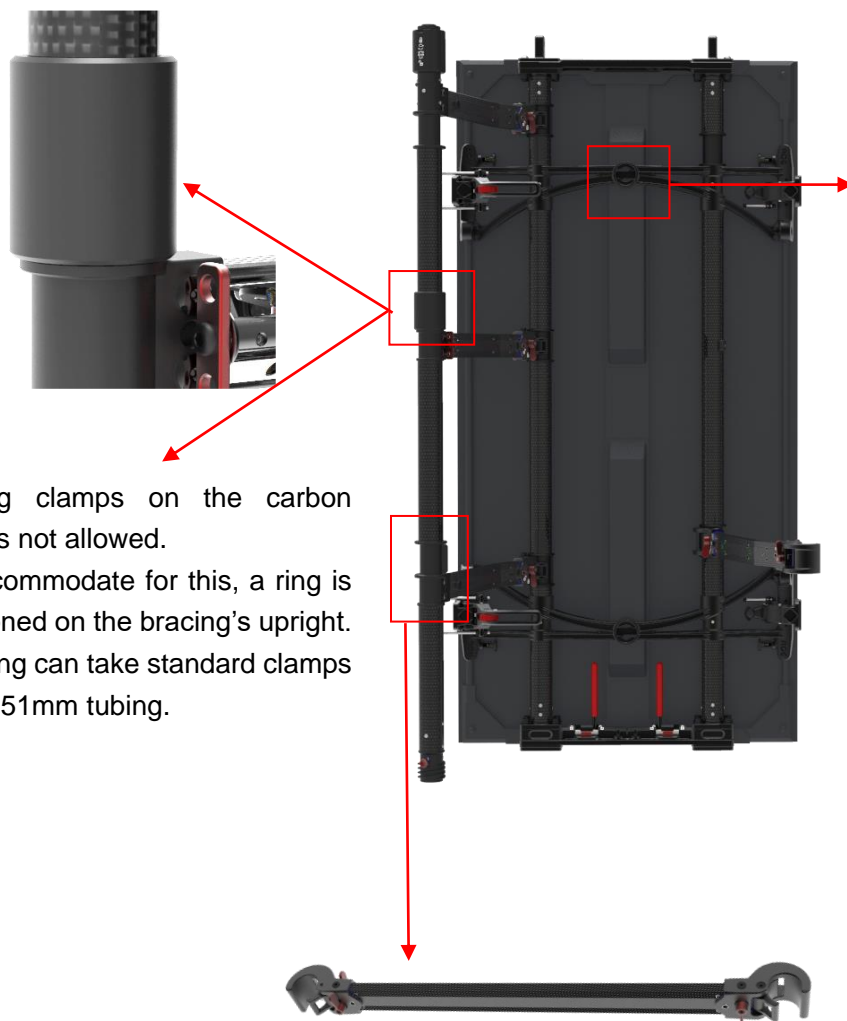


The red levers need to be pulled backwards and moved sideways (outwards) to lock frames top to bottom.

Make sure the red markings are not visible, otherwise frames are not locked.



## 2.4 Alternative Bracing



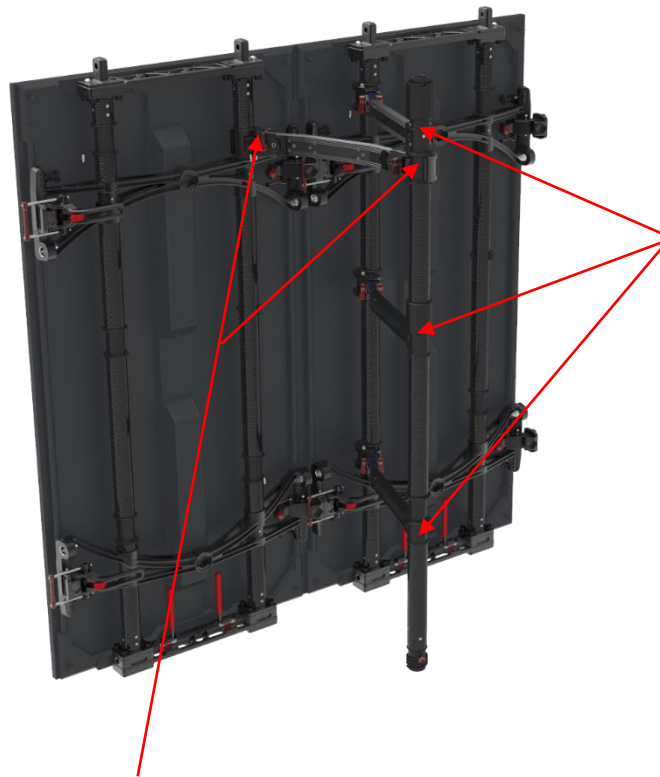
A keyhole lock is provided to connect with ROE standard rear bridge stacking accessory.

Placing clamps on the carbon parts is not allowed. To accommodate for this, a ring is positioned on the bracing's upright. This ring can take standard clamps for 48-51mm tubing.

Baby arm clamps to upright part

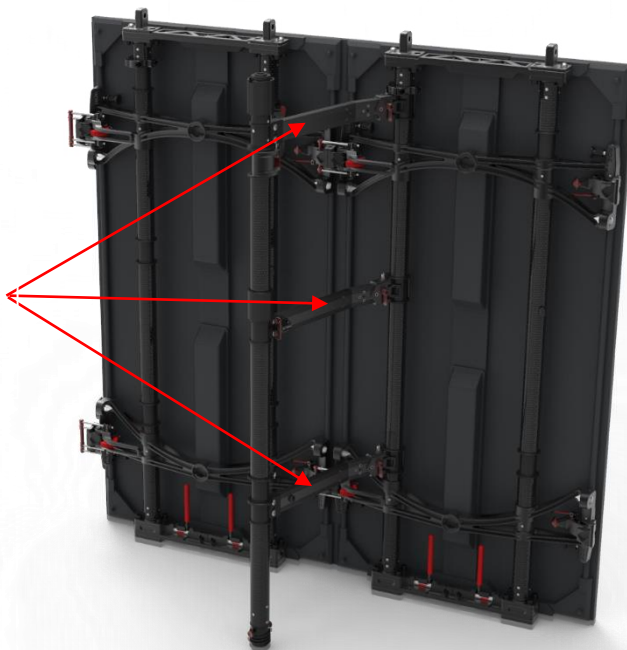
## 2.5 Position Ladder

### 2.5.1 B racing Position



Bracing ladder is placed between frames. To install, click ladder clamps in

Click the arm in the top slots.



Only use the steps in the ladder to climb the LED wall.

## 2.5.2 Transport Position



To put in transport position, click ladder clamps in the 3 slots.



Click arm in closed position

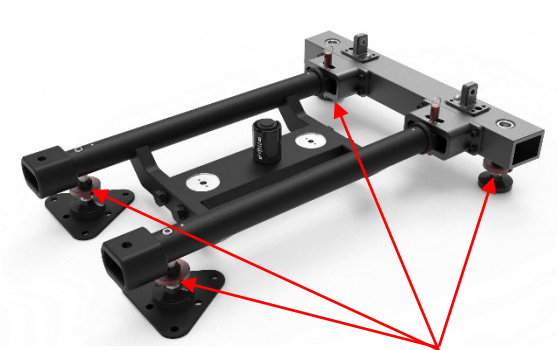
### 3. Stacking System



Bracing can also be used in a stacking configuration.

+10, 0, -10 degree

Angle is set with both side locks and base stands.



Height is set with adjustment rings.



### 4. Rigging System

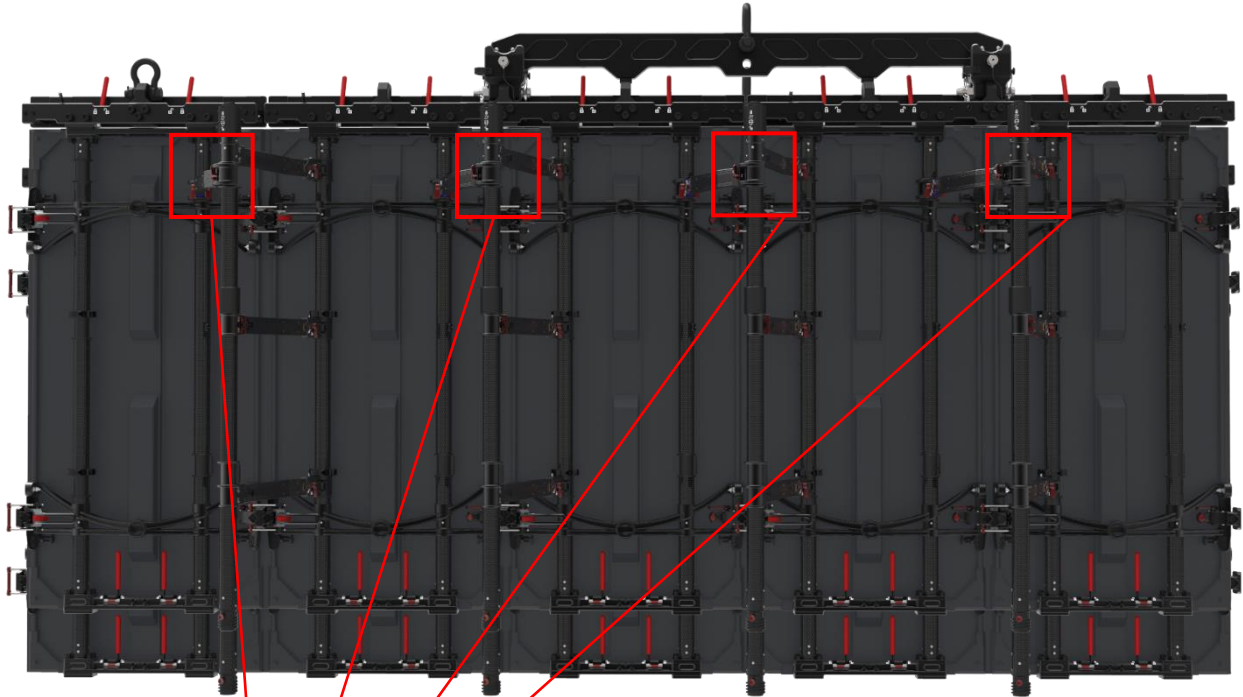


#### Allowable wind [m/s] / height

Height	Max. allowable (3-sec gust) [m/s]	Height	Max. allowable (3-sec gust) [m/s]
10 frames	20.00	6 frames	21.71
8 frames	20.76	5 frames	22.98

Load type	Bracket	Max height [#frames]	Max height [m]	Limiting factor
Only self-weight	Any	25	30	Kingpin
Self-weight + climbing	Any	21	25.2	Kingpin
Self-weight, climbing, falling	Any	21	25.2	Kingpin

### 5. Safety during Cabling

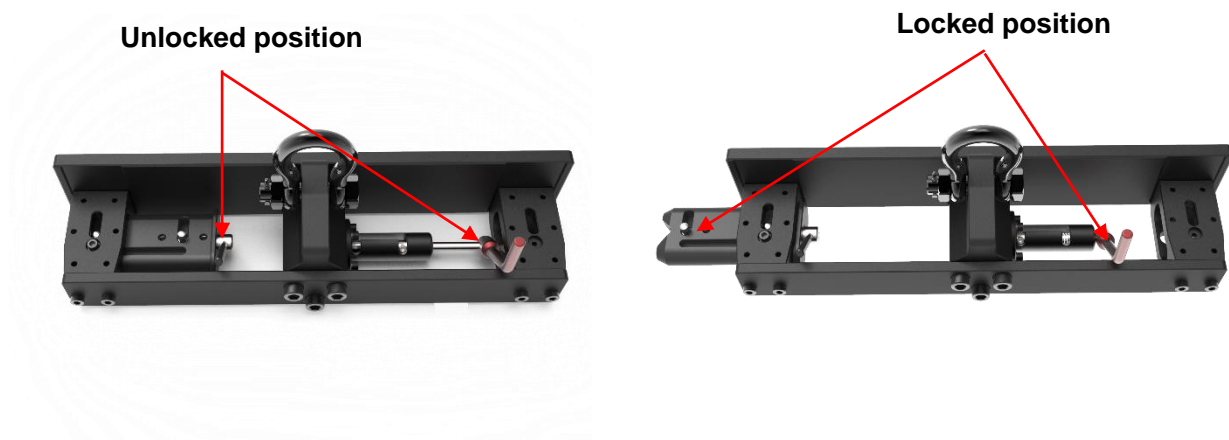


Connection point for safety hook.

Where ladder and bracing arm connect.

## 6. Brackets

### 6.1 Hanging Bracket



### 6.2 Coupler Bracket



The coupler bracket can only be used with the 2 wide hanging brackets.

To install, the shackles on the header bars need to be removed.

The coupler bracket is connected to the existing center pickup holes with locking pins.

## 7. Dolly and Storage



LED should always face inside!

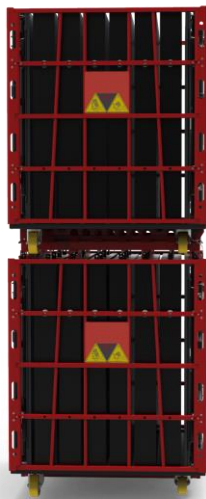


1537mm high



Pay attention when moving double stacked frames up a ramp.

See safety label on the dolly!

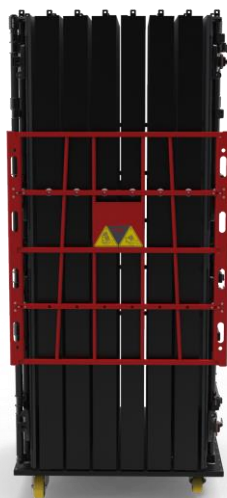


2862mm high

Double stacked dollies are only for storage.

**Max 2 high stack.**

**Wheels get damaged if higher.**



2629mm high

## 8. Storage and Truck Pack



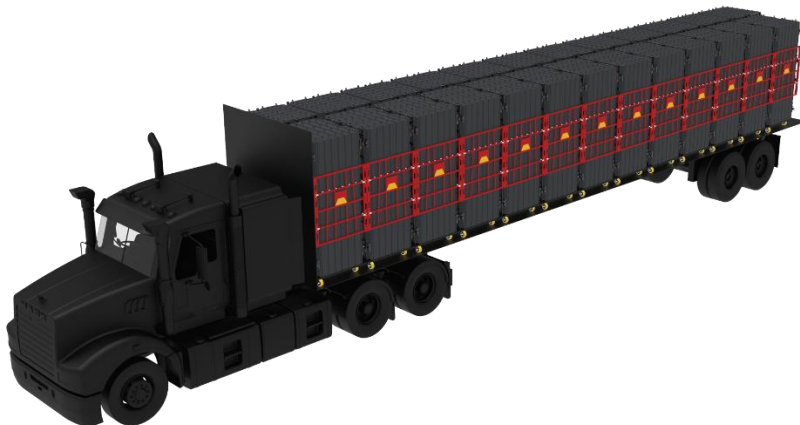
For storage on site, the stackers can also be used to neatly stack the dolly floors.



Side covers can be stored on an empty dolly floor.



EU mega box trailer  
44 dollies, frames double stacked  
Or  
506.88 sqm



53' US truck  
48 dollies frames double stacked  
Or  
552.96 sqm

### 9. Parts



**Full Frame**

1200 x 600mm  
8 kg



**Full bracing**

4.2 kg



**Half Frame**

600 x 600mm  
5.2 kg



**Half bracing**

2.5 kg



**1-Wide bracket: 6.4kg**



**2-Wide bracket: 12.6kg**



**Coupler bracket: 30kg**



**Full dolly:**

1150 x 1277 x 1537mm (with stackers)

504kg

1150 x 1277 x 1429mm (no stackers)

490kg

**Empty dolly:** 85kg



**Dolly Stackers:** 14kg/set



**Baby arm:**

640 x 50 x 60mm

0.875kg



**Stacker base truss:**

680 x 463 x 184mm

12.55kg



**1W base stand:**

600 x 180 x 180mm

6.8kg

## 10. Contact Information

If you have any questions about the User Manual, please feel free to contact with ROE technical service team.

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