



Mechanical Models

# SPACE SHUTTLE

*Space Exploration*

**ROKR**



LKA02

Assembly Instruction

## **WARNING:**

Not suitable for children under 3 years old.

The product shall only be used with a transformer for product or a power supply for it.

The product shall be used with the power supply supplied, if the transformer is supplied with the product.

The transformer or power supply is not a toy or model.



Misuse of transformer can cause electrical shock.

The power supply used with the electric toy shall be regularly examined for damage to the supply cord, plug, enclosure or other parts, and in the event of damage, it shall not be used until the damage has been repaired.

Do not connect the wire to output socket.

The product is not to be connected to more than the recommended number of power supplies.

If the product contains motor, motor may be a hot component. Do not touch it to avoid burns while operating.

This product is only to be connected to equipment bearing either of the following symbols:  or 

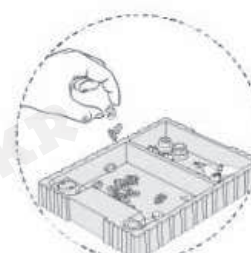
This product does not need liquid cleaning, and please clean the product with clean soft cloth.

The product contains functional sharp points or edges, and it should be used carefully to avoid injury. Children should be accompanied by adults while assembling.

The instruction must be retained since it contains important information



Polish the edges with sandpaper if there are burrs on pieces or it's hard to insert.



Put small parts into the box to prevent loss.











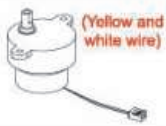
Remove the part by pressing its back to reduce burrs.











## FAQs:



Problem	Cause	Solution
1. How to solve the fracture of parts?	<ol style="list-style-type: none"><li>Parts are fragile and applied with too much force.</li><li>Some parts are marked with pressure application point. Do not press non-pressure application point or at the end of the long pieces.</li></ol>	<ol style="list-style-type: none"><li>Take off the pieces carefully.</li><li>Some fragile pieces have spare ones to replace.</li><li>Contact our customer service for free replacement parts.</li><li>Adhesive can be used if the decorative part (non-drive function part) breaks.</li></ol>
2. It's hard to assemble parts. What should I do?	<ol style="list-style-type: none"><li>Some parts related to transmission will be slightly tight, and tools can be used to assist in pressing.</li></ol>	<ol style="list-style-type: none"><li>Check for assembling errors.</li><li>Press with Tool.</li></ol>



**Part list** (Tips: suggest to put the parts in a box to prevent loss.)

Bag No. 1										
Item	Screw M2	Screw M2	Paster	Screw M3	Steel shaft	Steel shaft	Lampshade	Square steel shaft	Plier	Motor (Large terminal)
Item number	P1	P2	P3	P4	P5	P6	P7	P8	P9	P10
Illustration										
Quantity	18	15	1	5	2	1	1	1	1	1

Bag No. 2						Bag No. 3				
Item	Motor (Small terminal)	Lamp board + Switch	Contact switch	Circuit board	Lamp string + Dual switch	Shaft sleeve	Cover 1	Cover 2	Motor gear	Motor gasket
Item number	P11	P12	P13	P14	P15	P16	P17	P18	P19	P20
Illustration										
Quantity	1	1	1	1	1	6	1	1	1	1


Item	Wax	Sandpaper stick
Item number	P21	P22
Illustration		
Quantity	1	1

**Icon Illustration**

U9<sup>+</sup> "+" means the part has spare ones

 Part P20 in Bag No.3

 Special attention in assembly

 Wax the yellow parts

 Printed side

 Blank side

 Complete 2 same parts

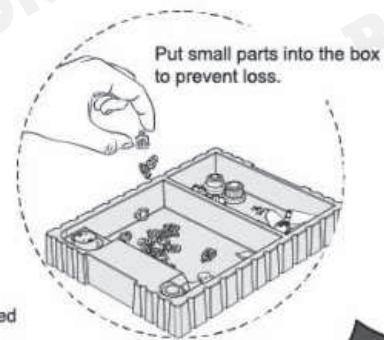
 Remove protective film

 Step 1

 Step 2

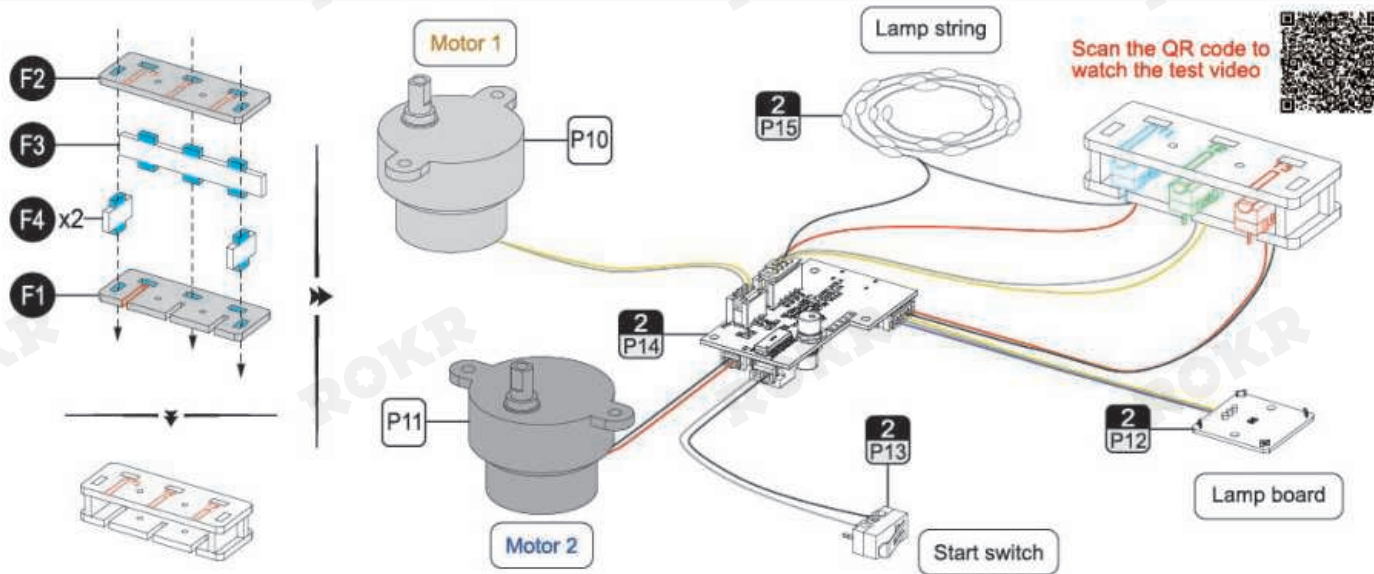
 Assembly tips

 Perspective changed



1

F1  
F2  
F3  
F4 x2  
P10  
P11  
2 P12  
2 P13  
2 P14  
2 P15

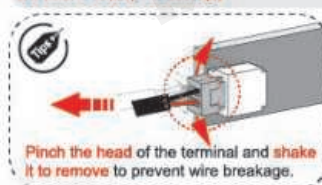


### Power-on test 1 (Remove electronic parts after testing.)

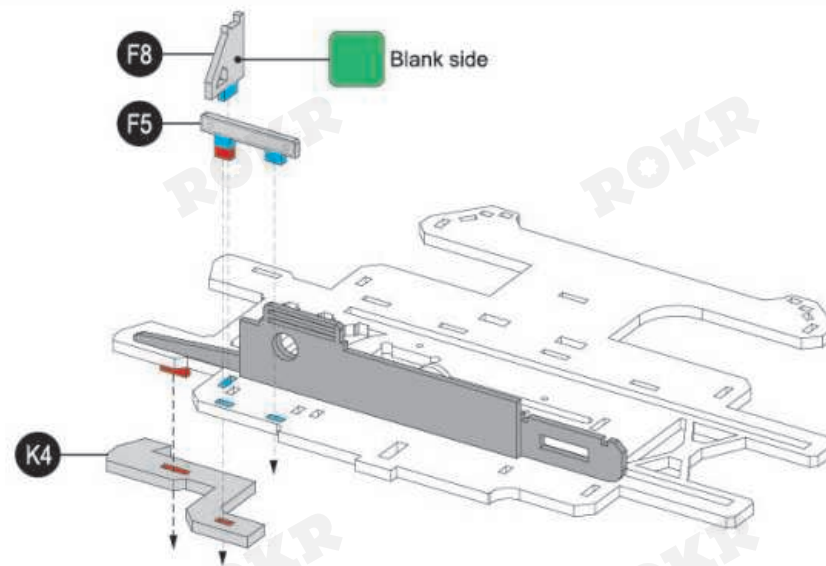
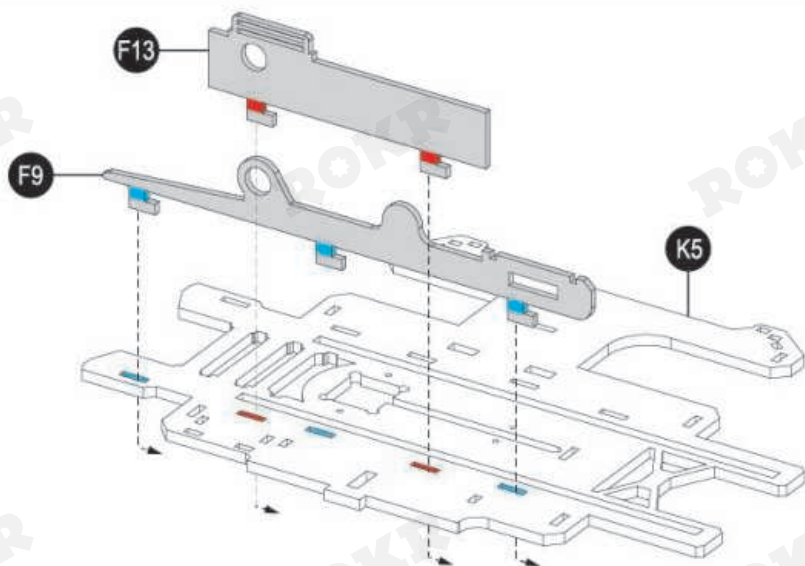
#### Program running effect:

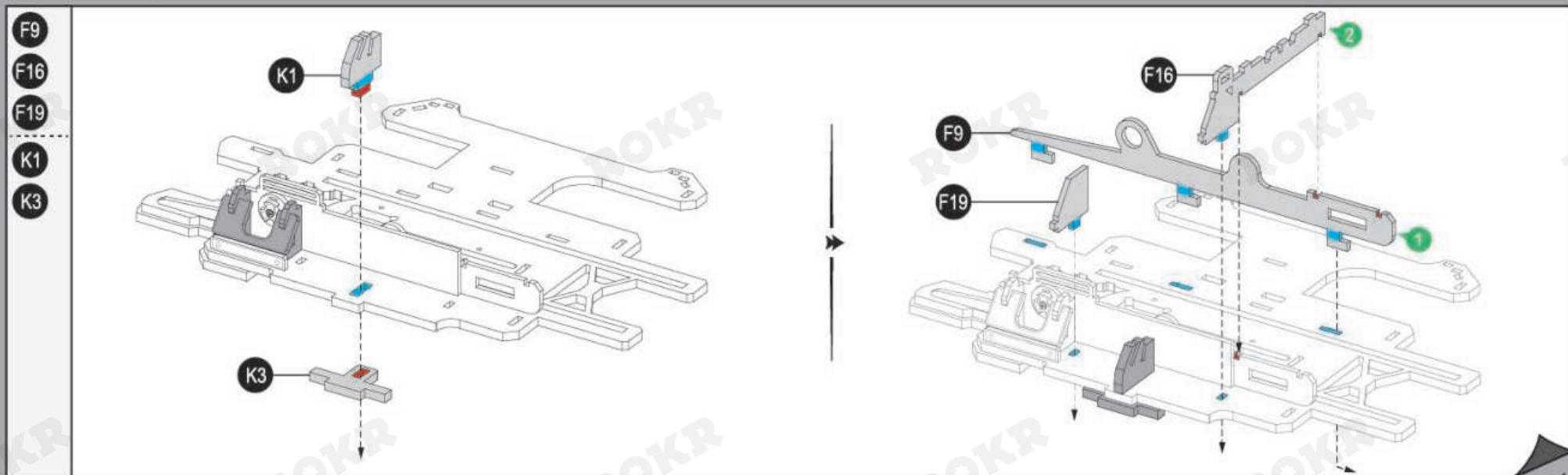
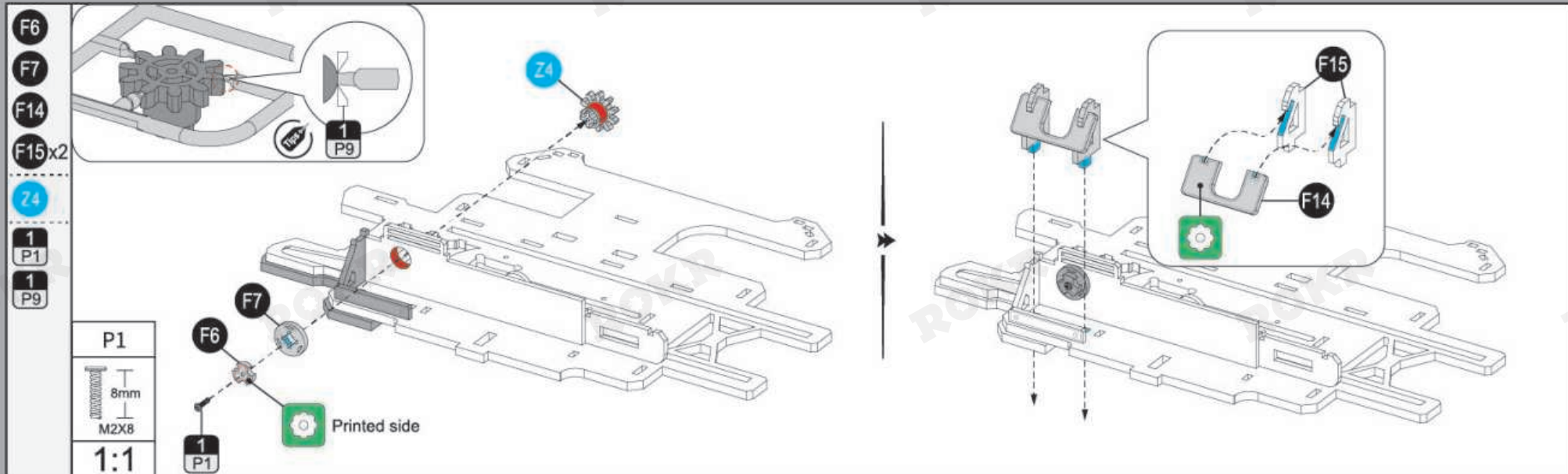
1. After connecting the power, the lamp string is always on.
2. Touch the start switch once, motor 1 run temporarily (about 0.5 seconds), motor 2 run temporarily (about 2 seconds).
3. Touch the start switch again, motor 2 continues to run clockwise.
4. Pull out the switch T3 and insert it again, motor 2 stops running and motor 1 runs continuously clockwise.
5. Pull out the switch T2 and then insert it again (the operation will be completed within 5 seconds, otherwise the motor will enter the protection state and automatically stop, and need to reconnect the power supply for testing), motor 1 stops running, the lamp string and lamp board flash, and after that, the lamp string become always on.)

(If a switch is accidentally knocked out, it can be reconnect the power supply for testing.)



F5  
F8  
F9  
F13  
K4  
K5







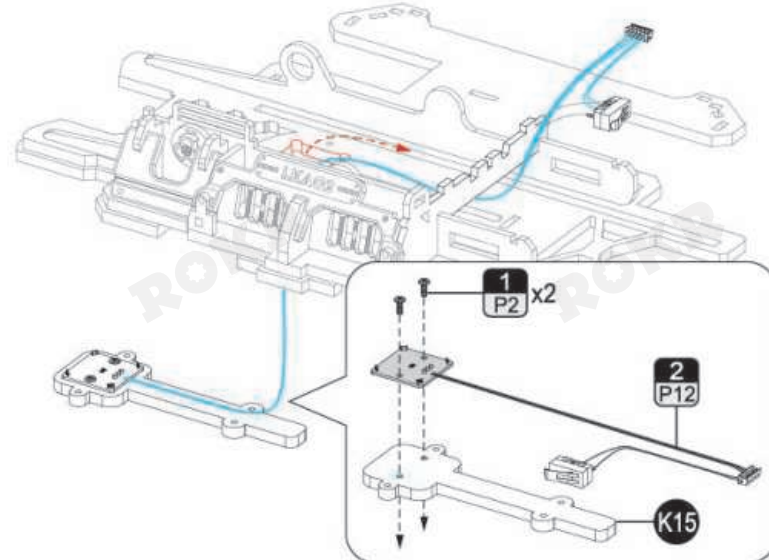
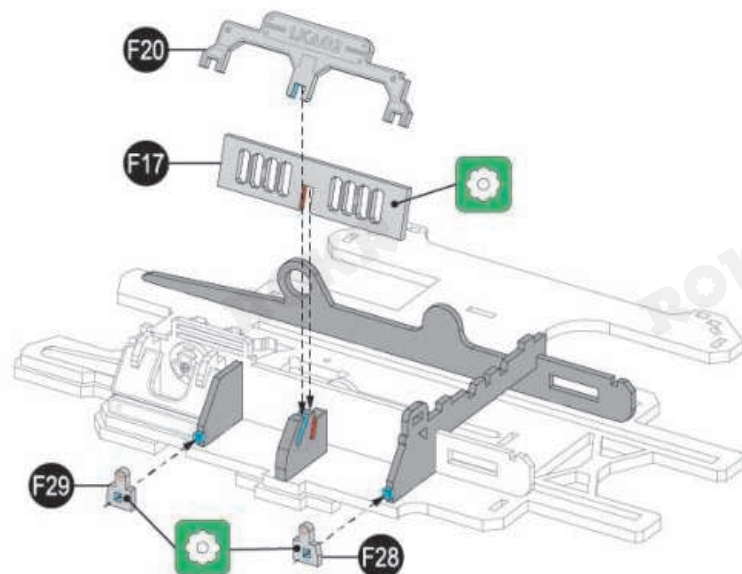
F17

F20

F28

F29

K15

1  
P2 x22  
P12

P2

 5mm  
M2X5

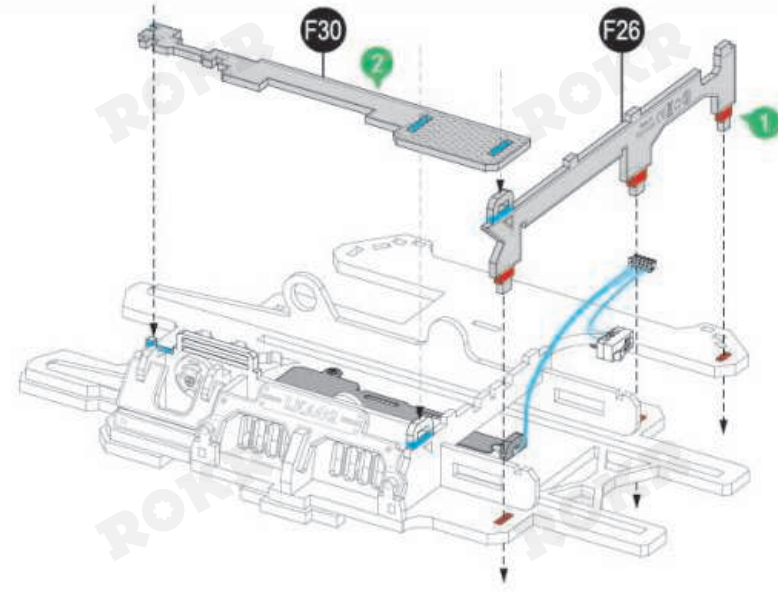
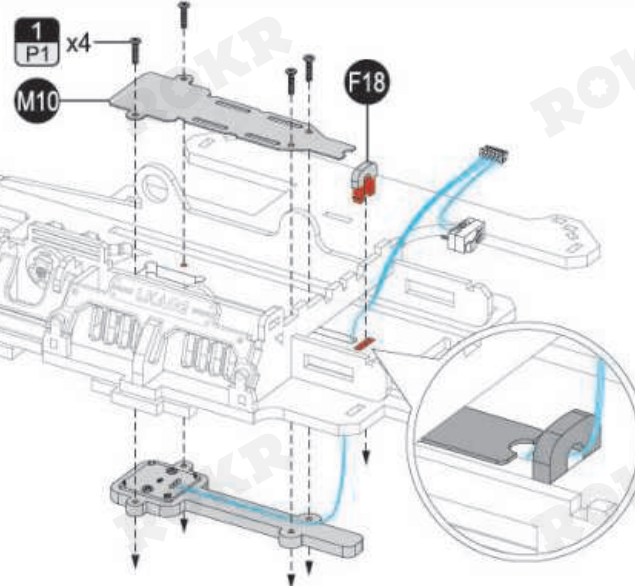
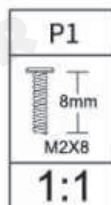
1:1

F18

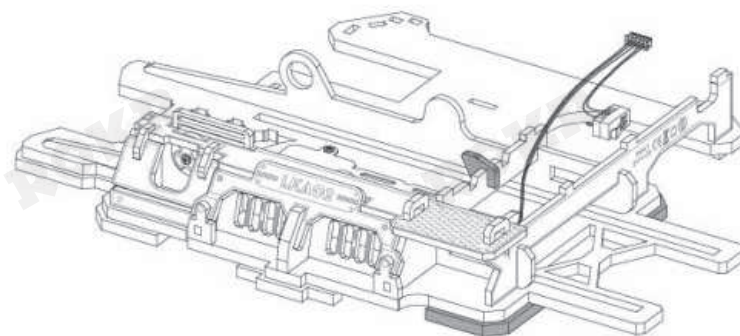
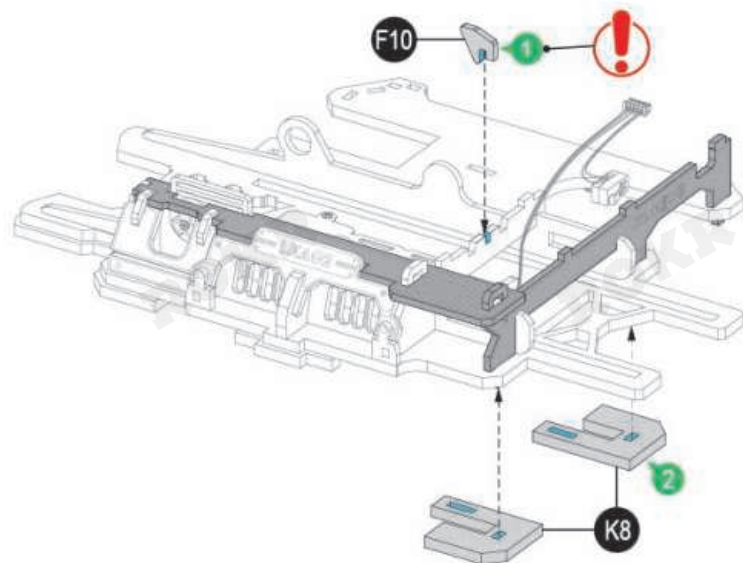
F26

F30

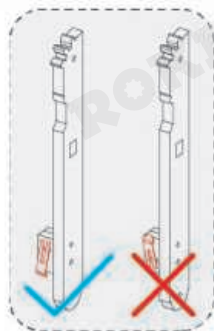
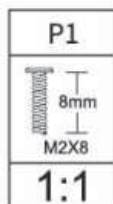
M10

1  
P1 x4

F10  
K8 x2



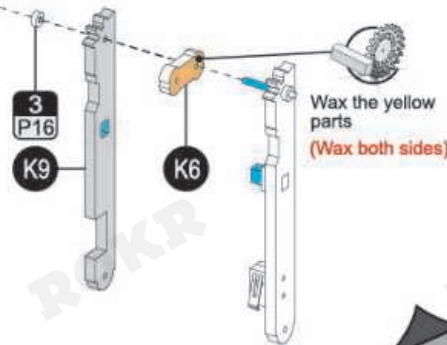
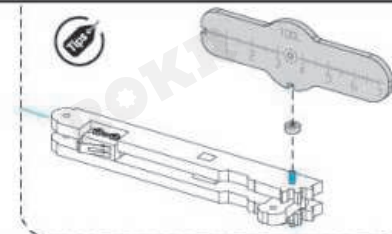
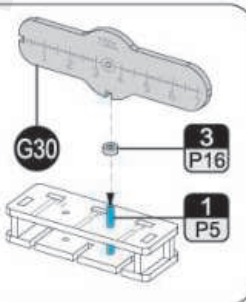
G30  
K6  
K9  
K10  
K12  
1 P1 x2  
1 P5  
3 P16 x2



1 P1 x2

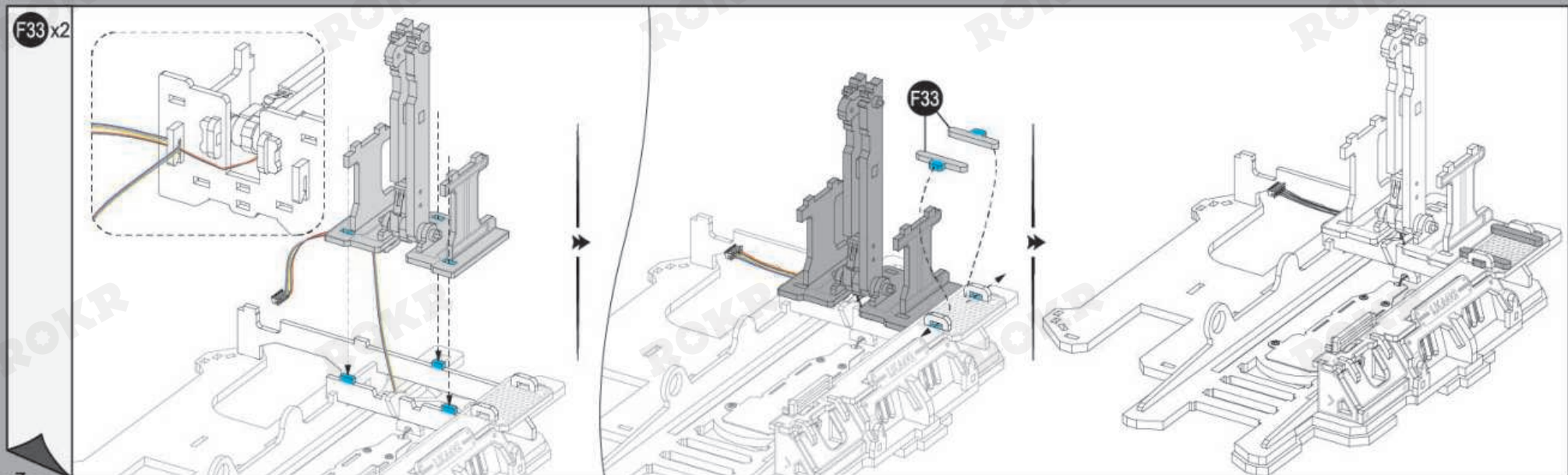
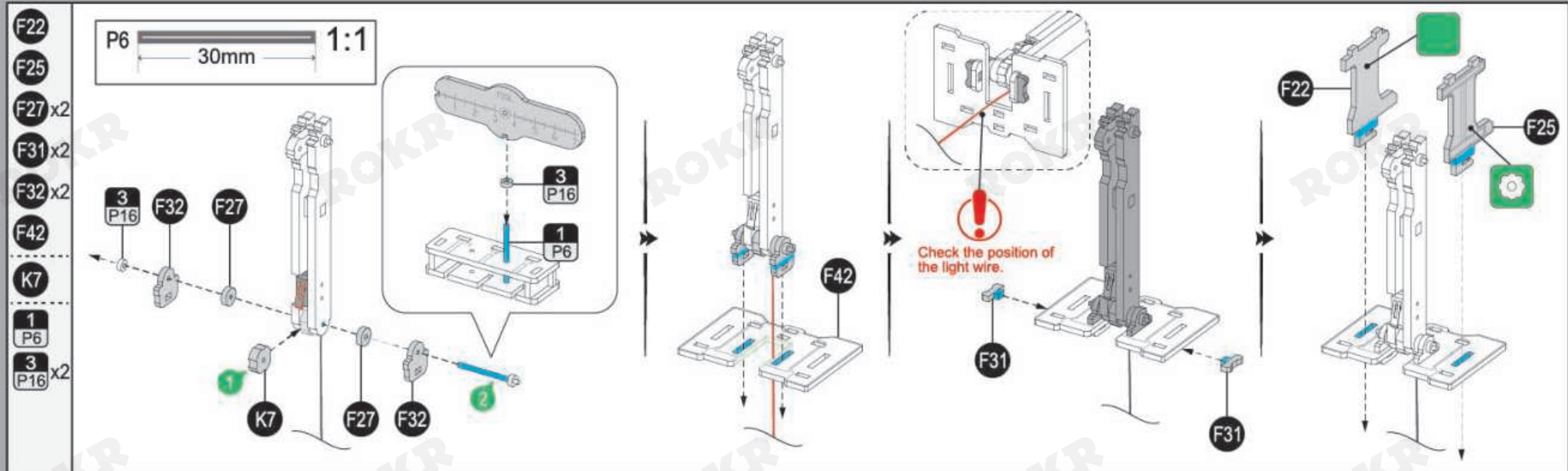


P5 20mm 1:1



Wax the yellow parts  
(Wax both sides)







2

E2

F11x2

F12x2

F23

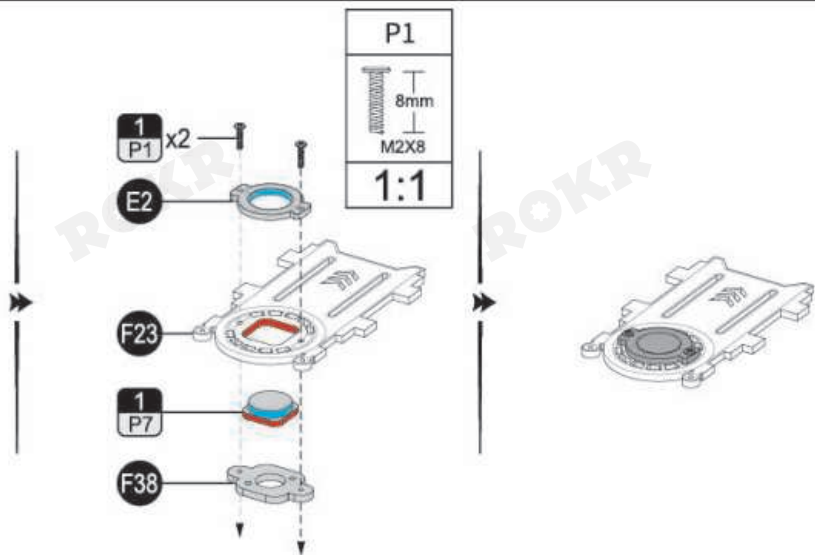
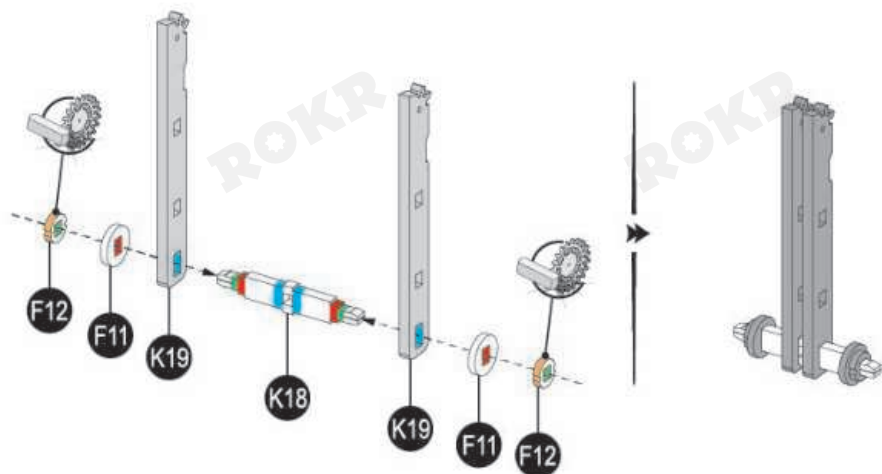
F38

K18

K19x2

1  
P1x2

1  
P7



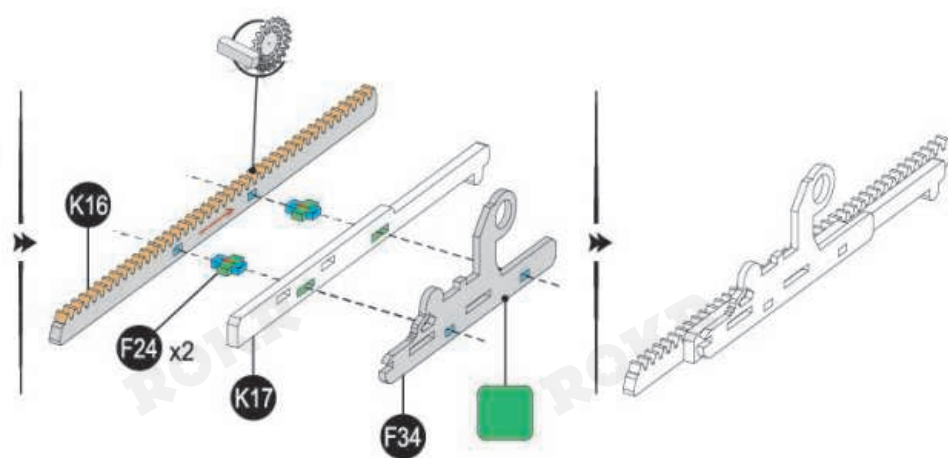
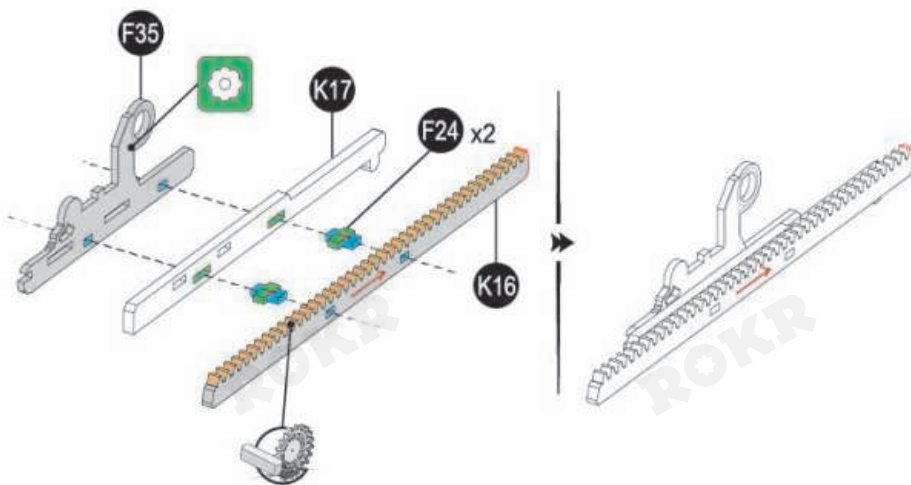
F24x4

F34

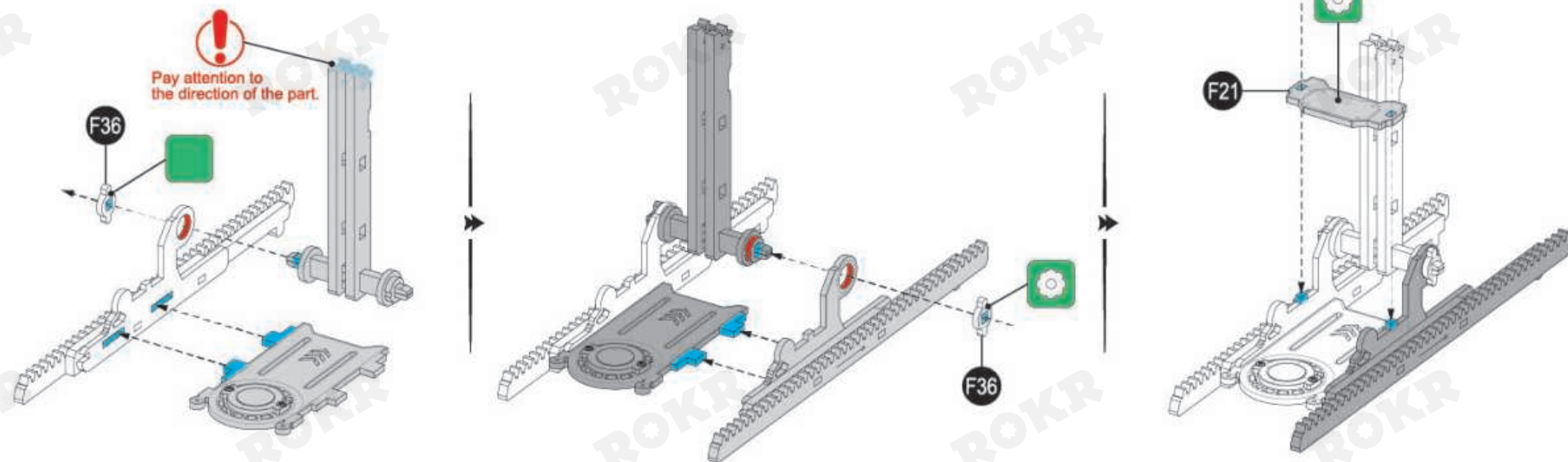
F35

K16x2

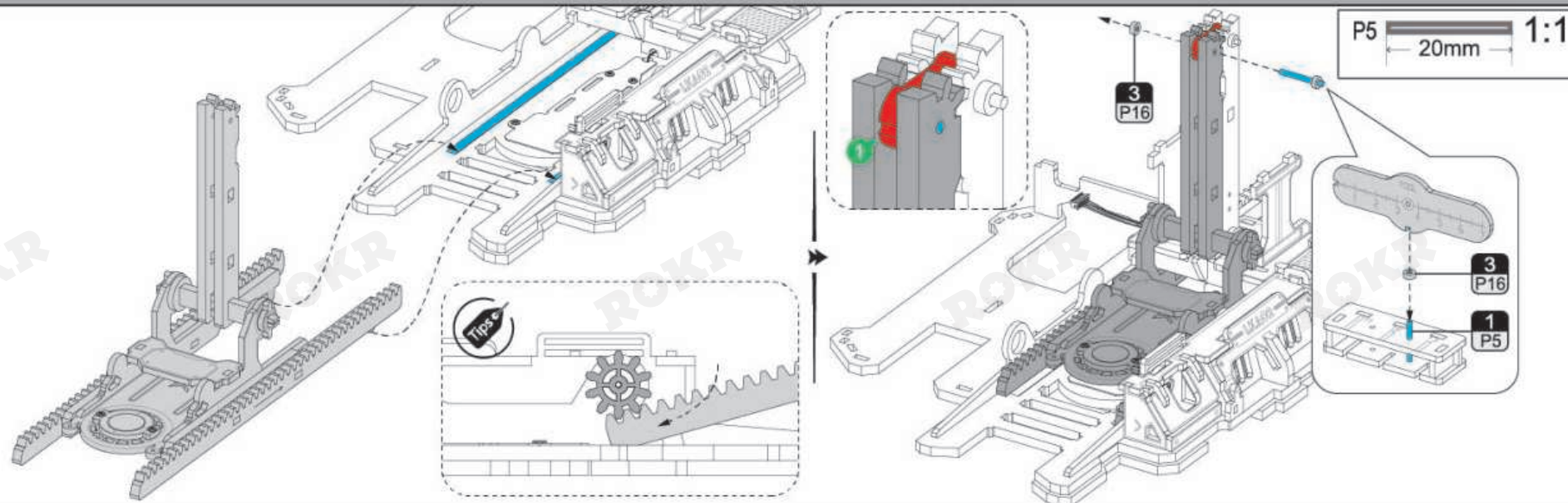
K17x2



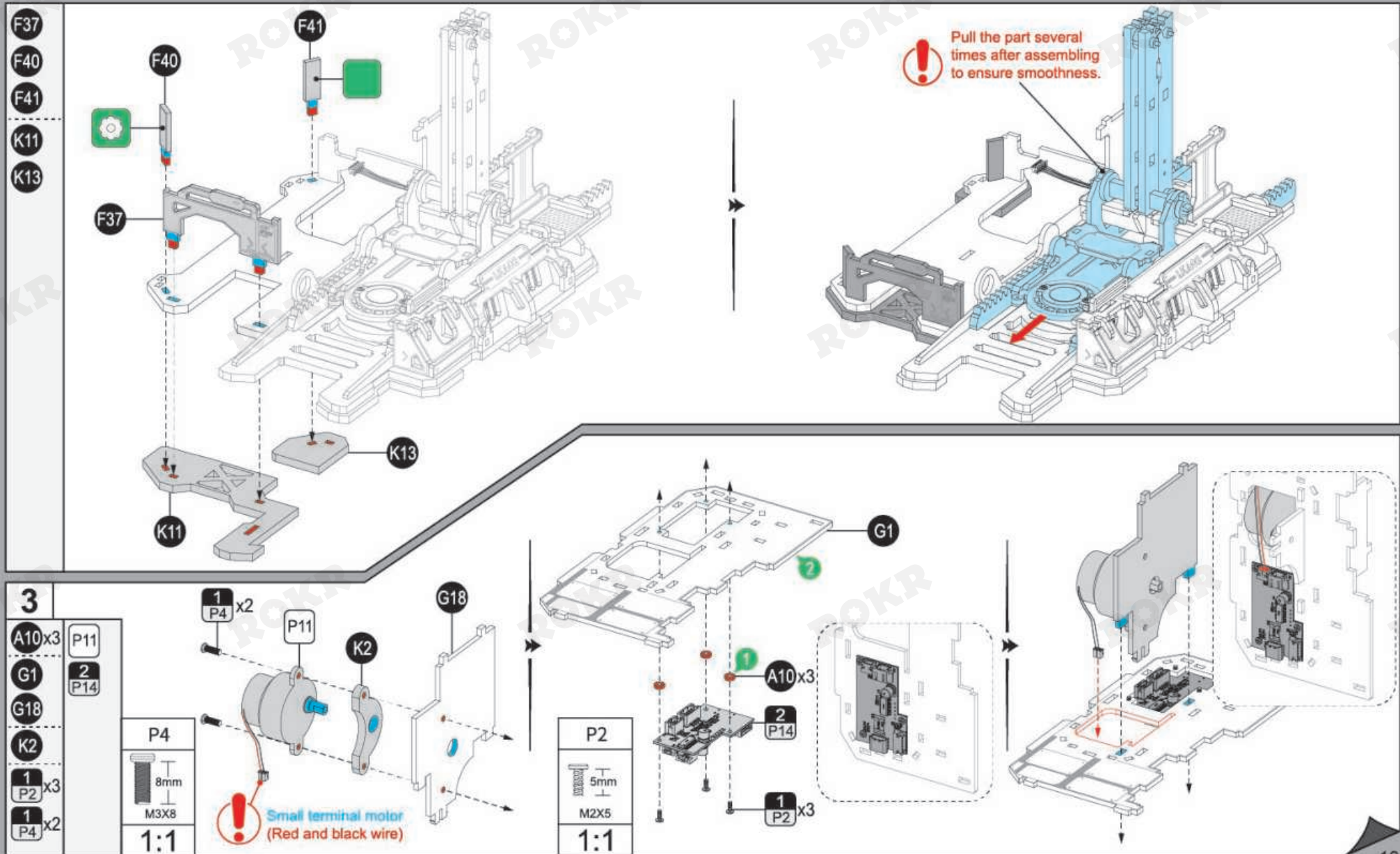
F21  
F36 x2

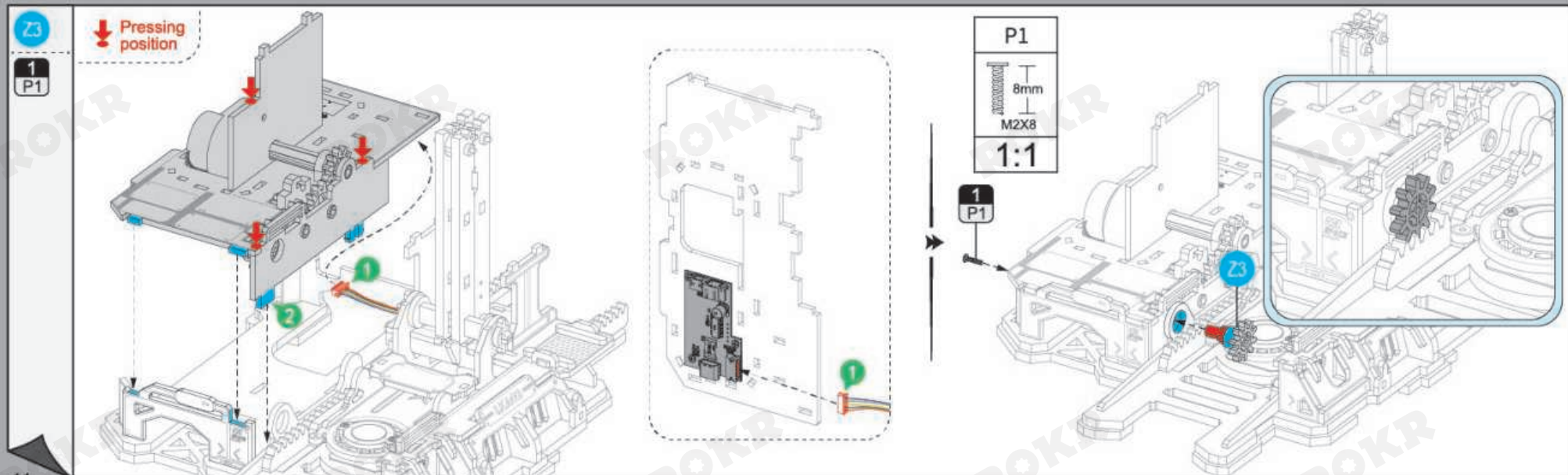
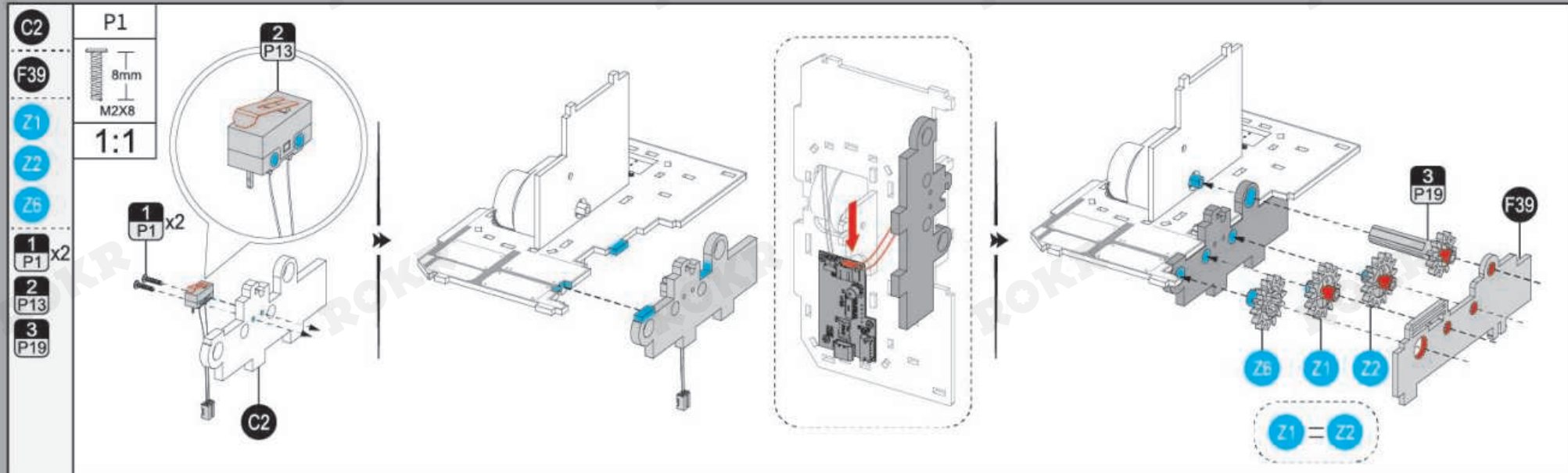


1  
P5  
3  
P16 x2

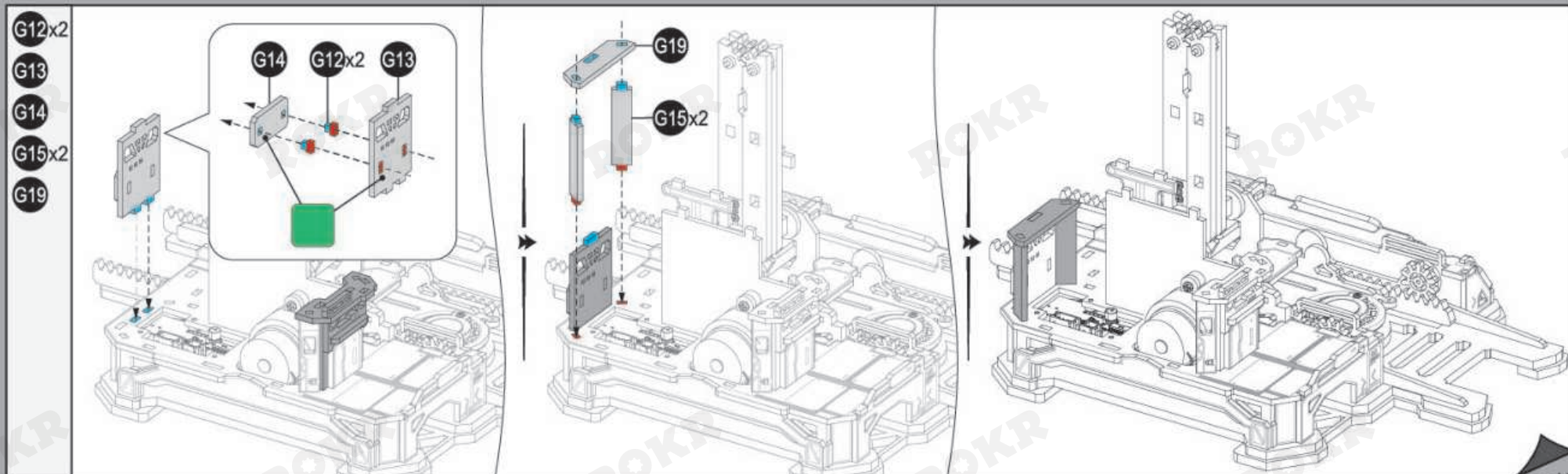
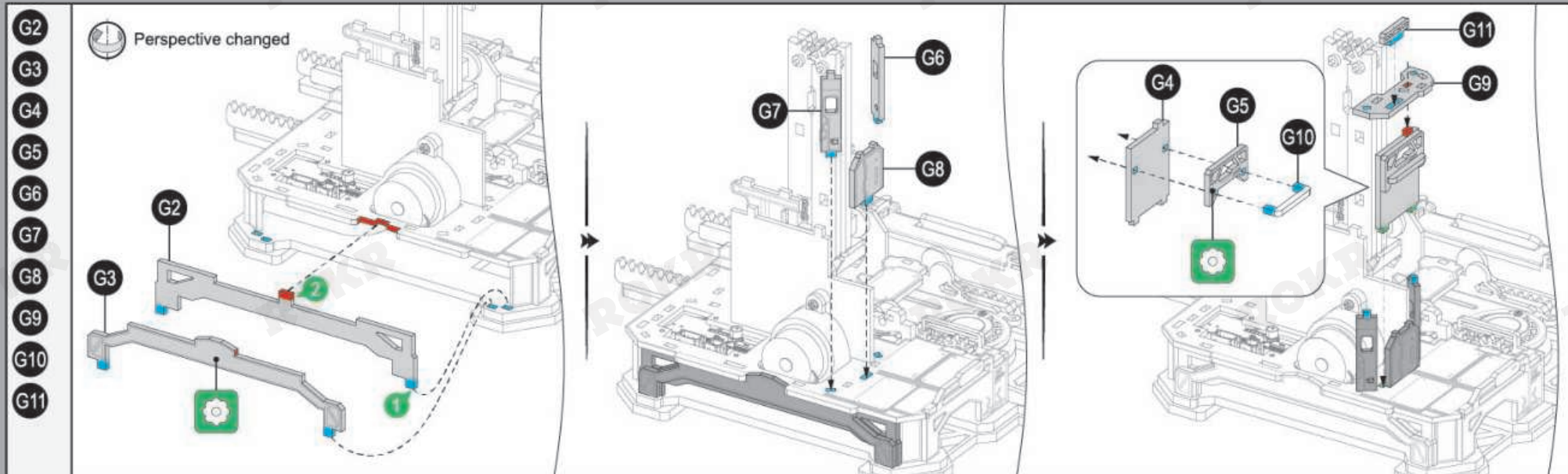












4

G16x2

G17

G20

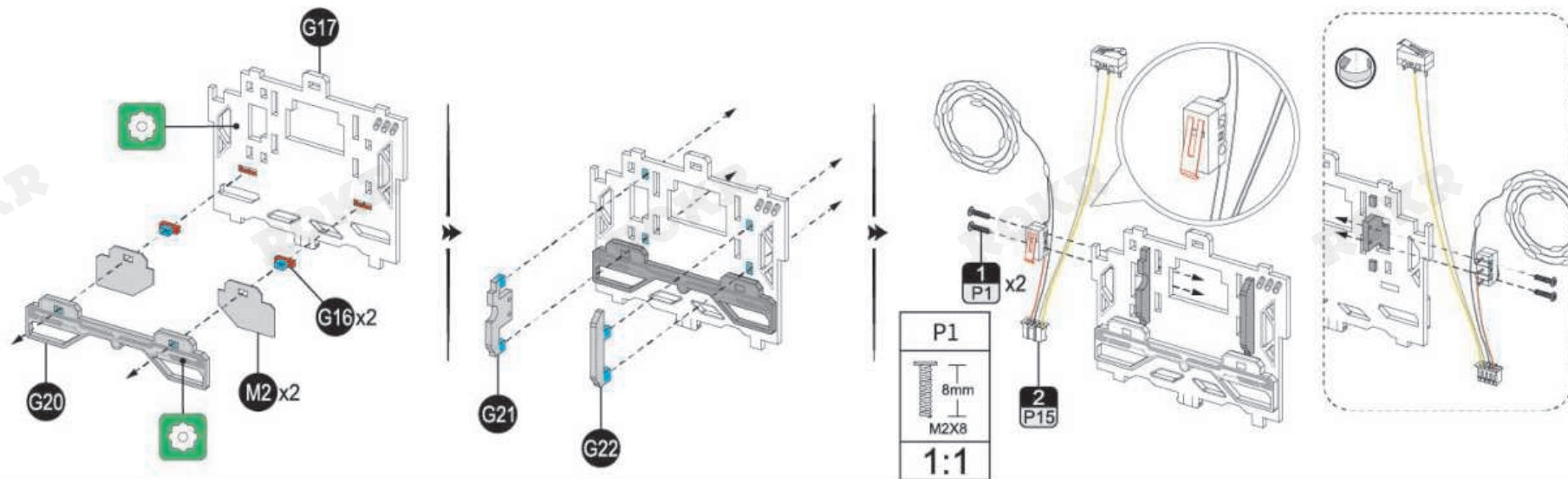
G21

G22

M2 x2

1 P1 x2

2 P15



C5

C7 x2

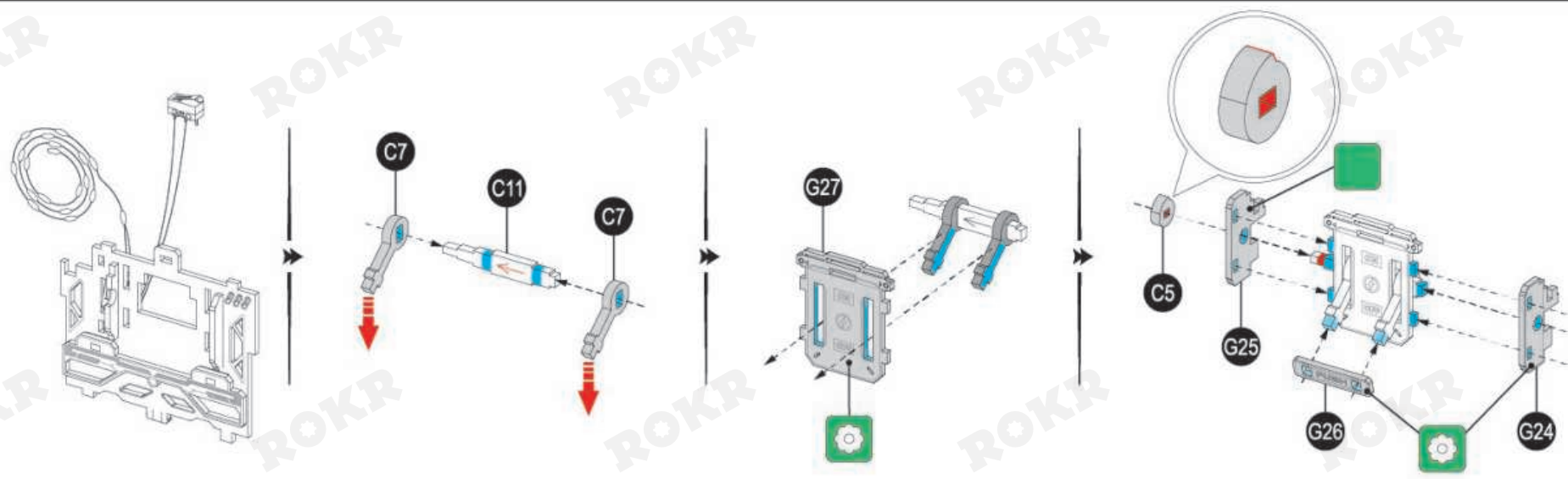
C11

G24

G25

G26

G27



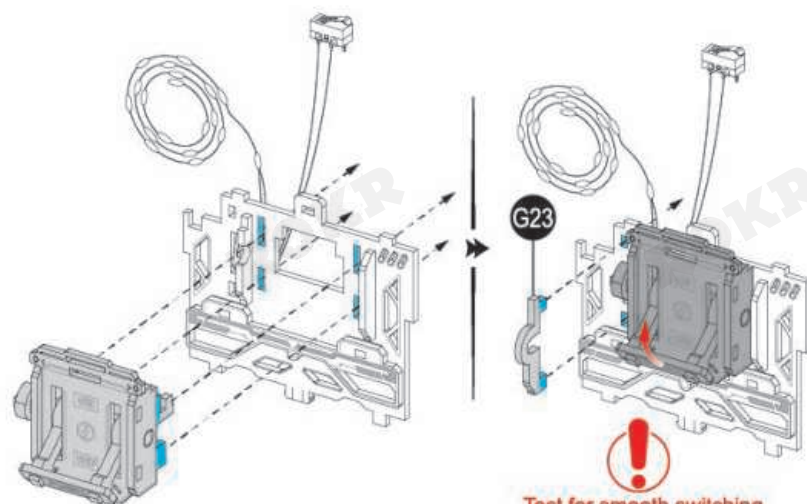


G23

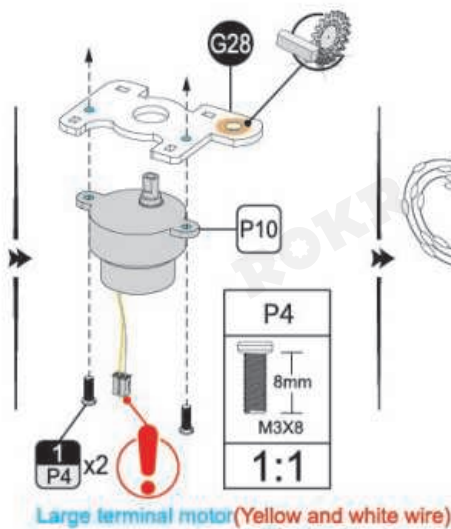
G28

1  
P4 x2

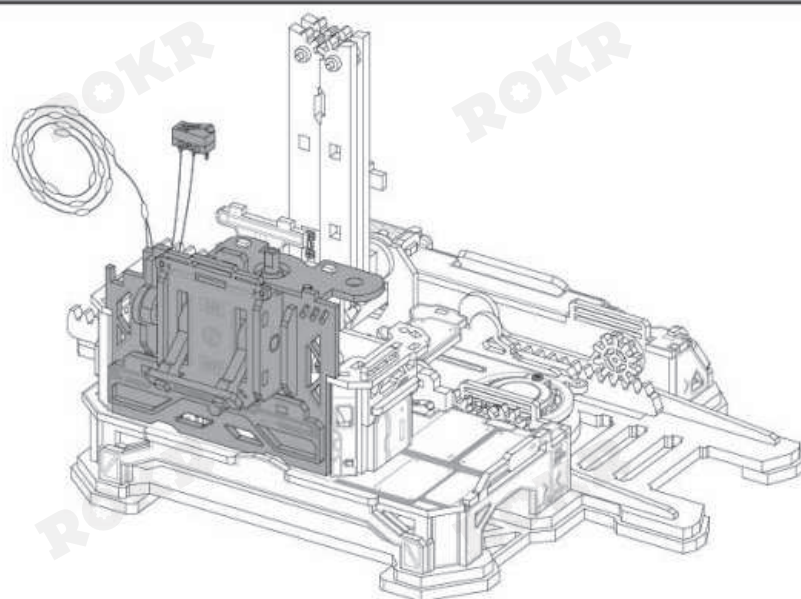
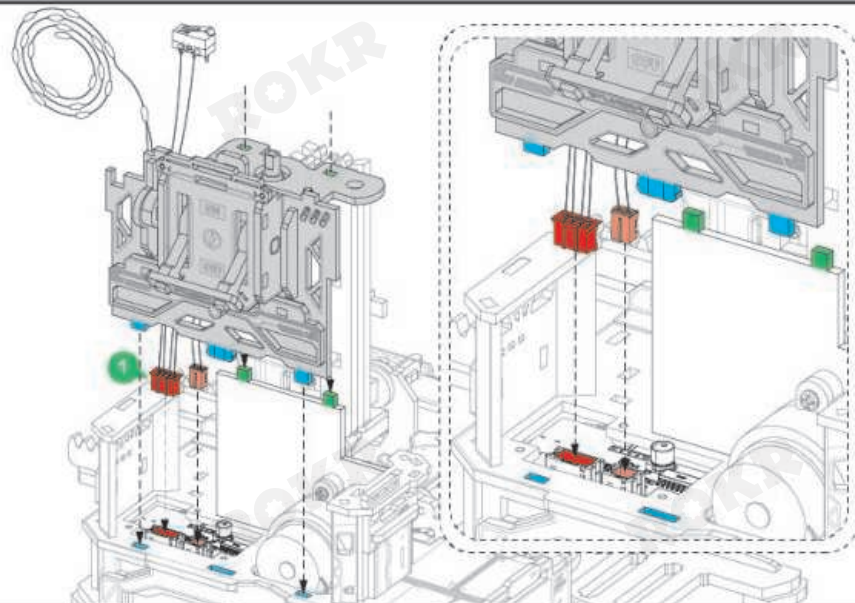
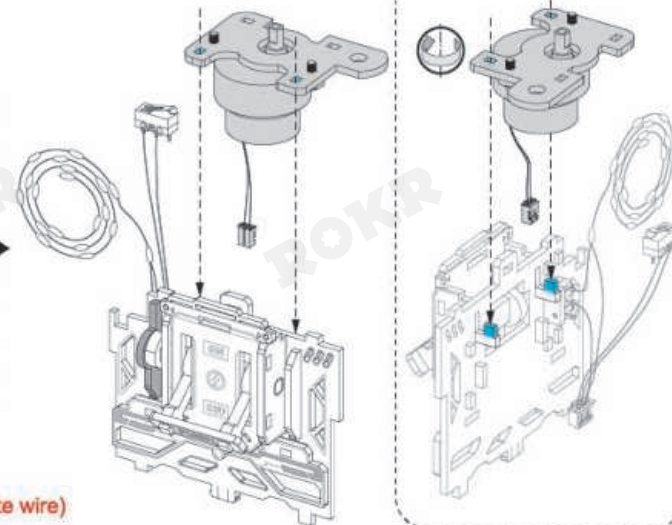
P10

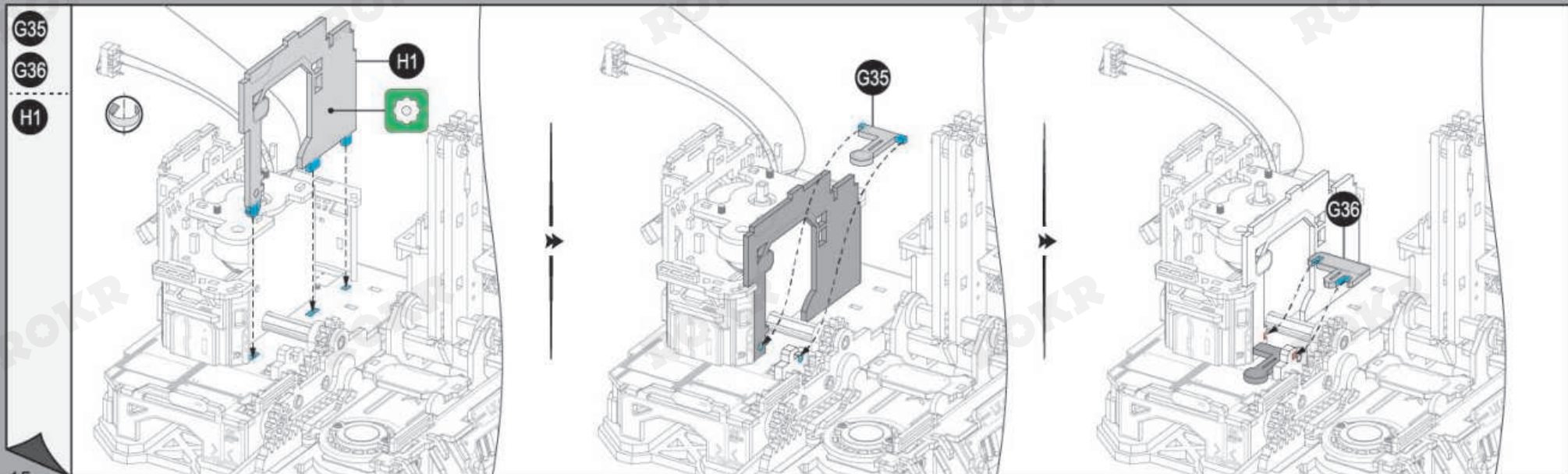
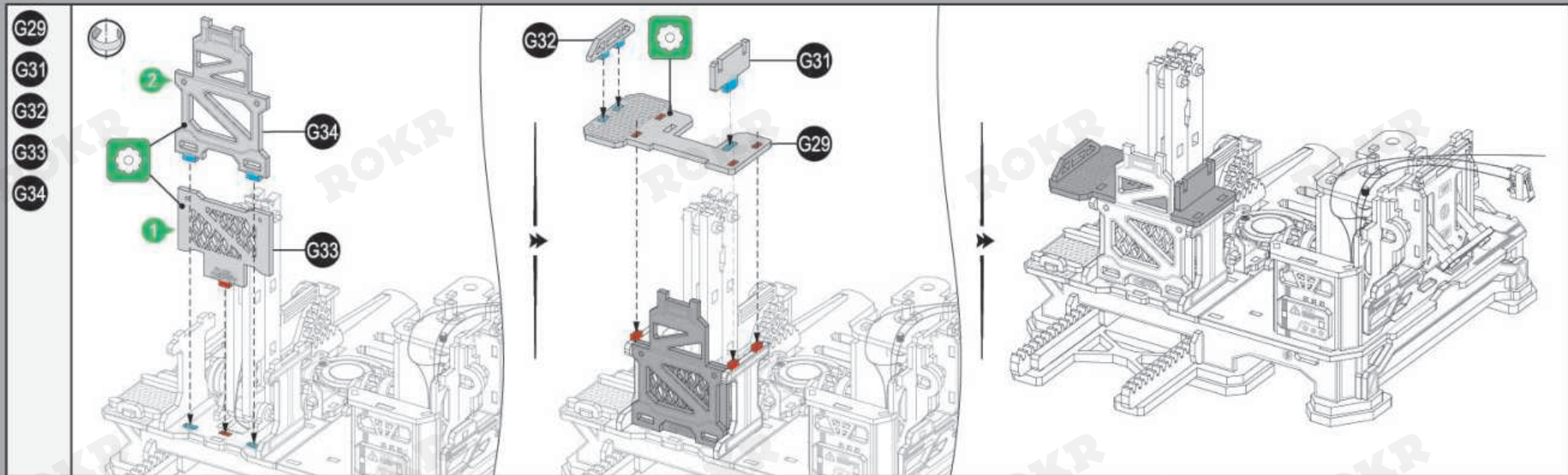


Test for smooth switching

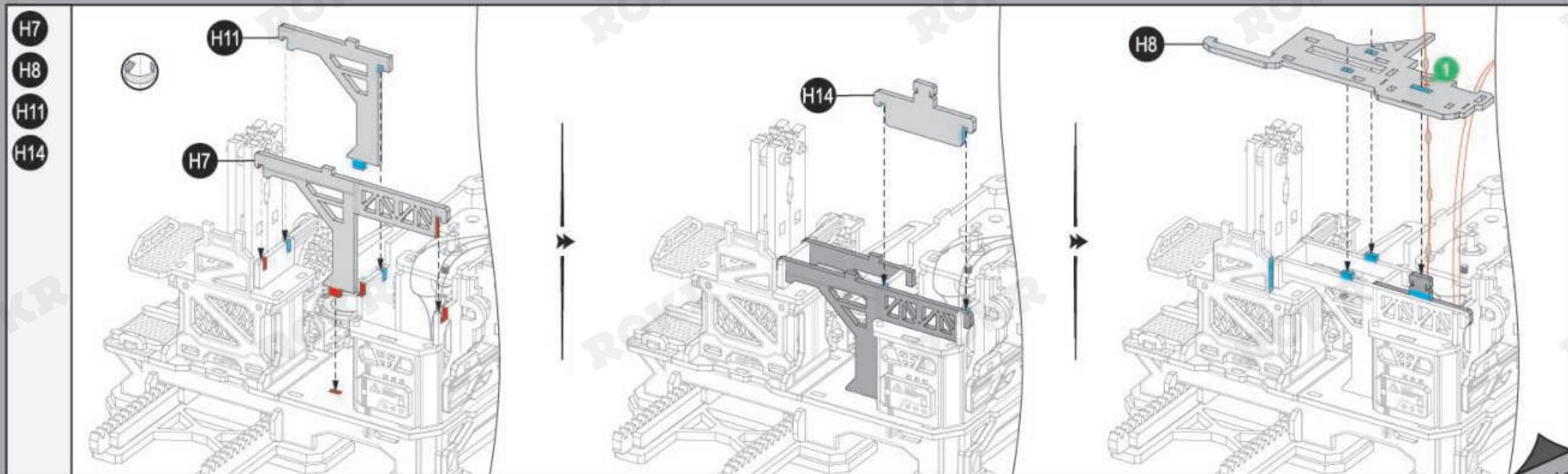
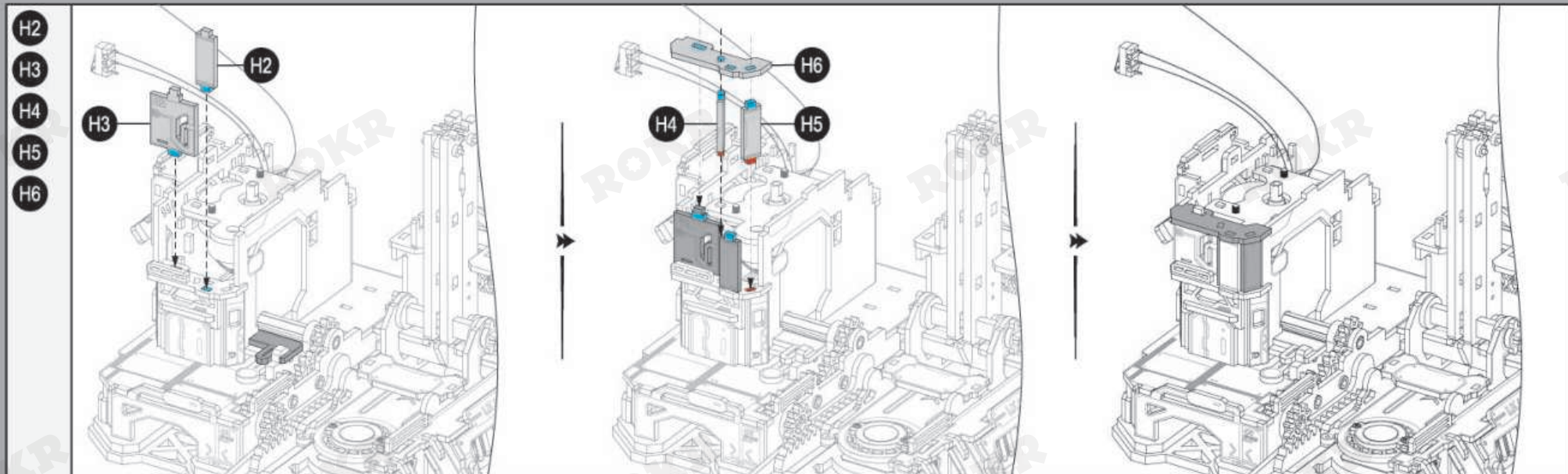


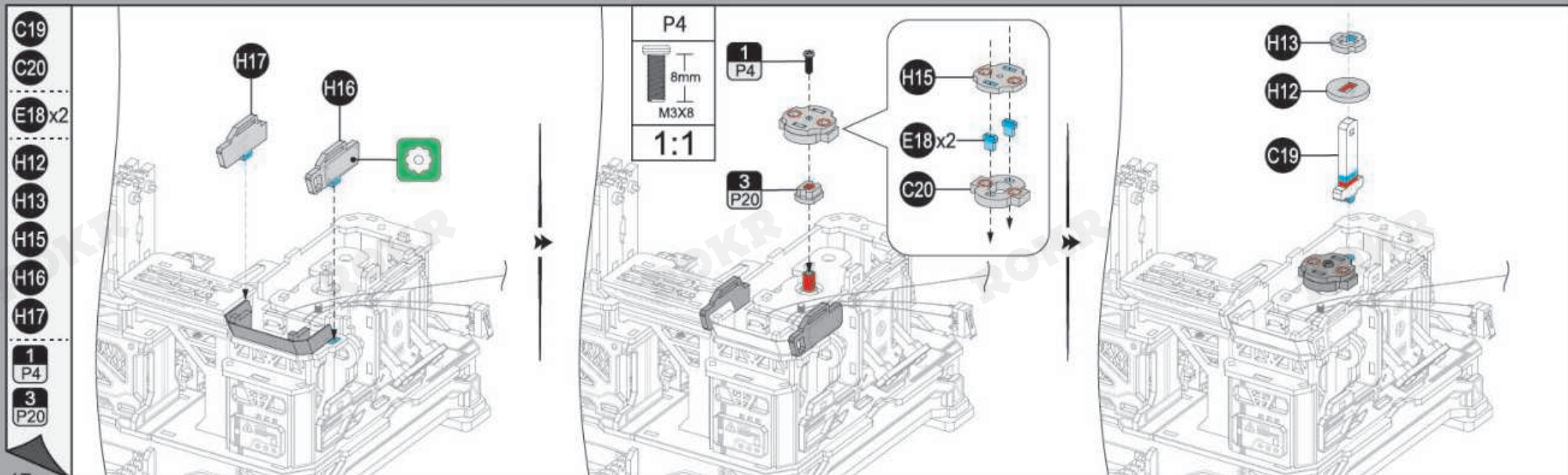
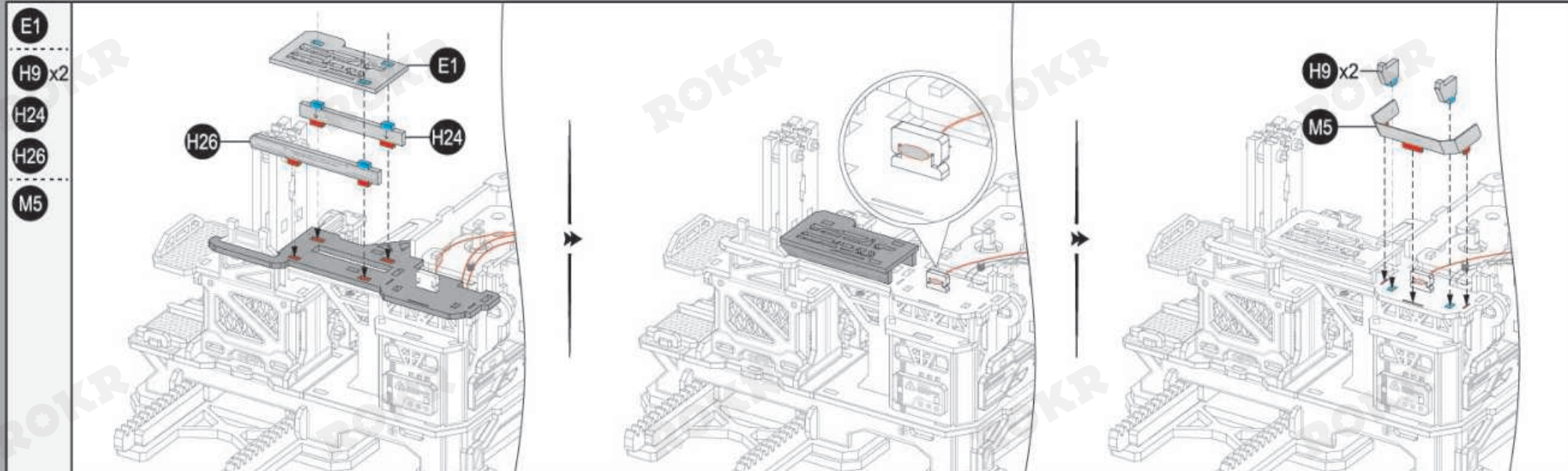
Large terminal motor (Yellow and white wire)





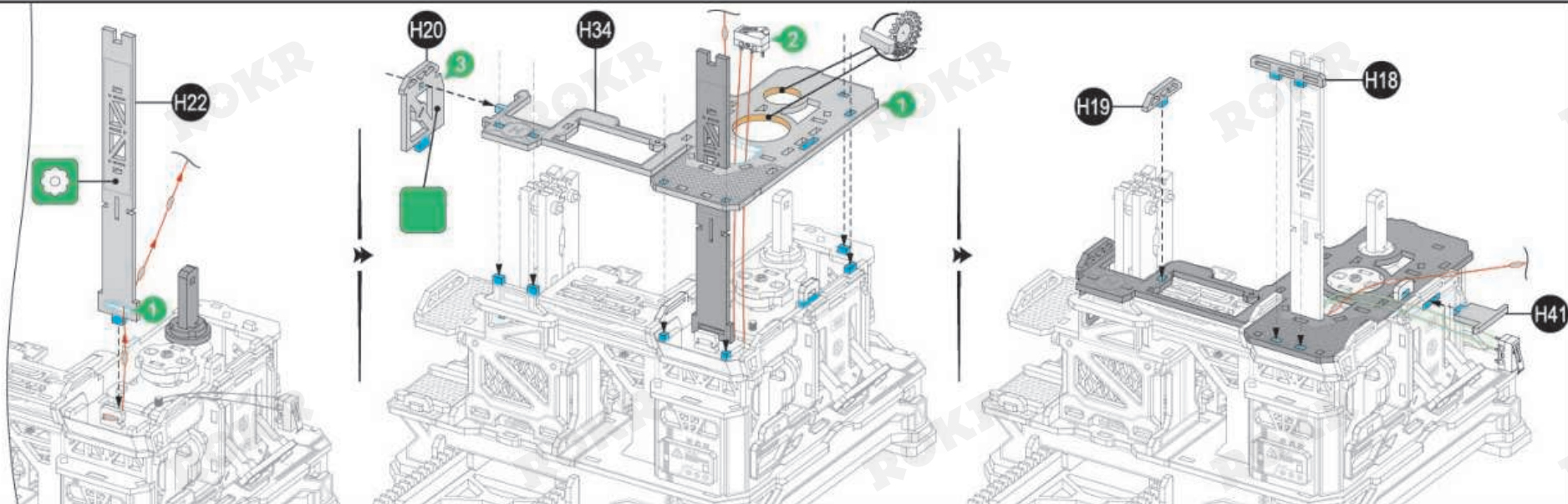




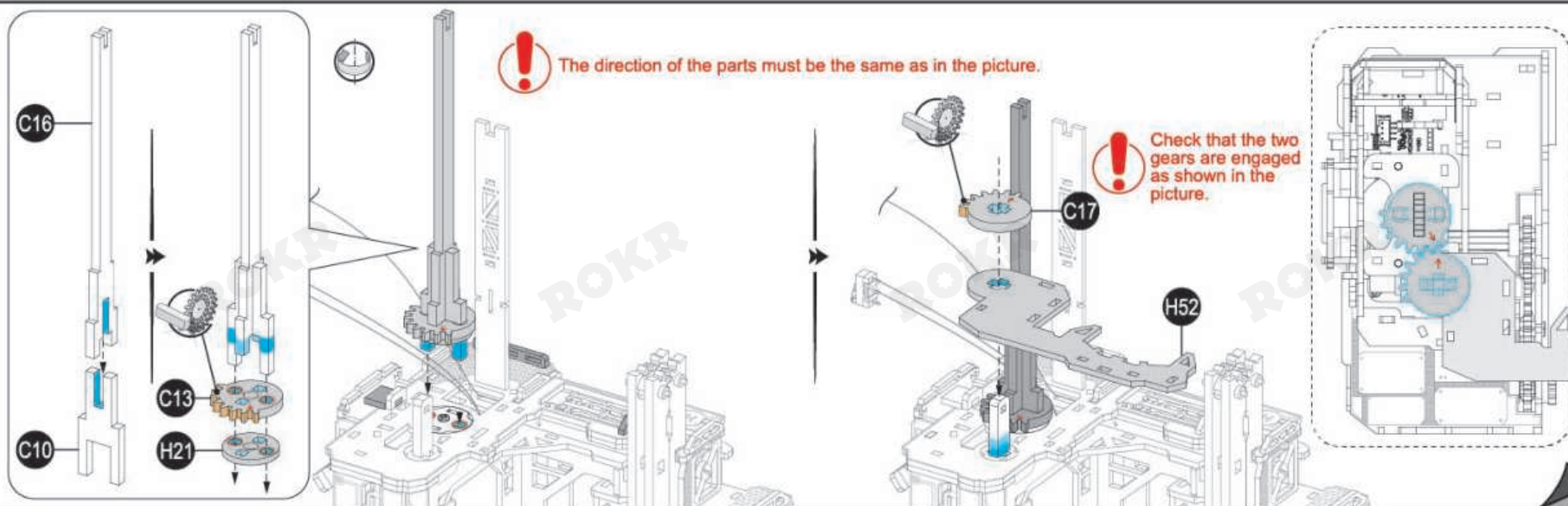


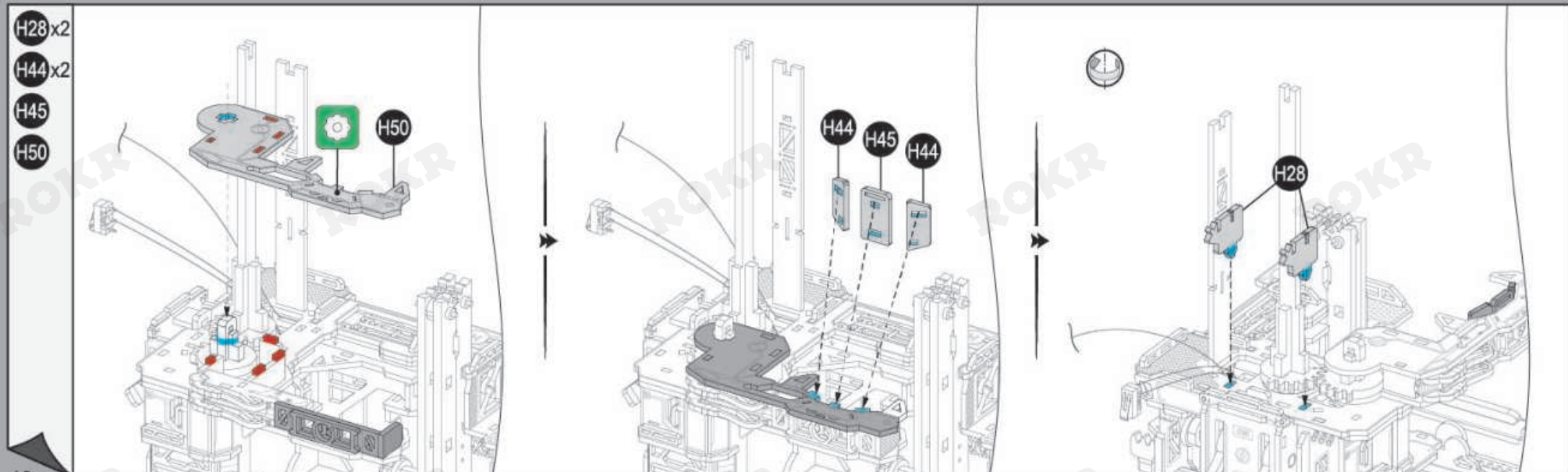
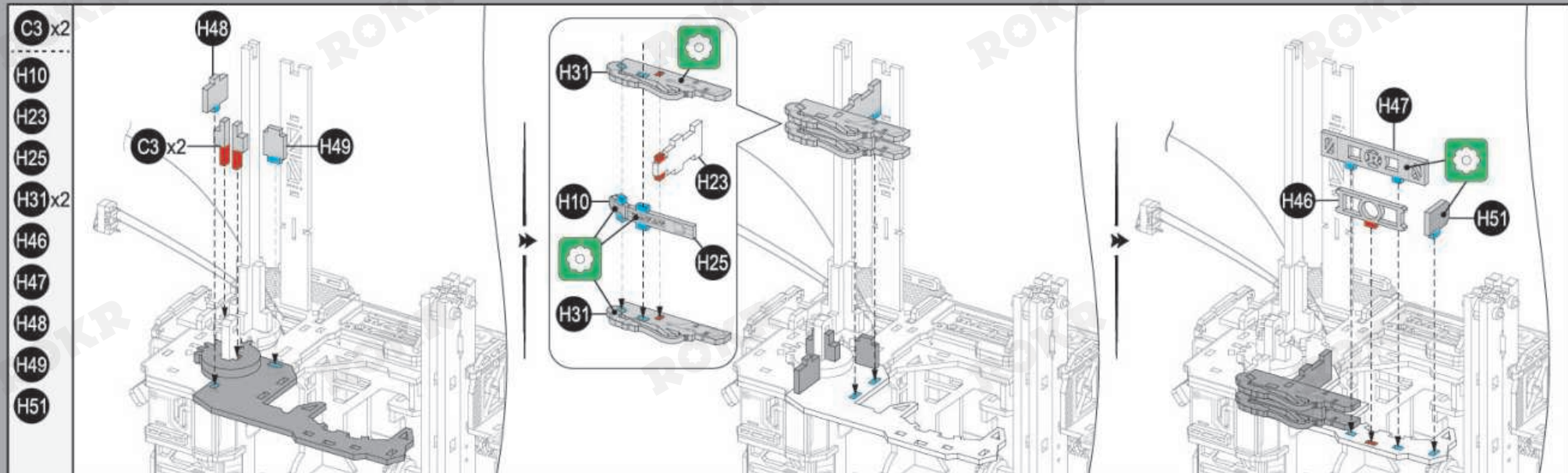


H18  
H19  
H20  
H22  
H34  
H41

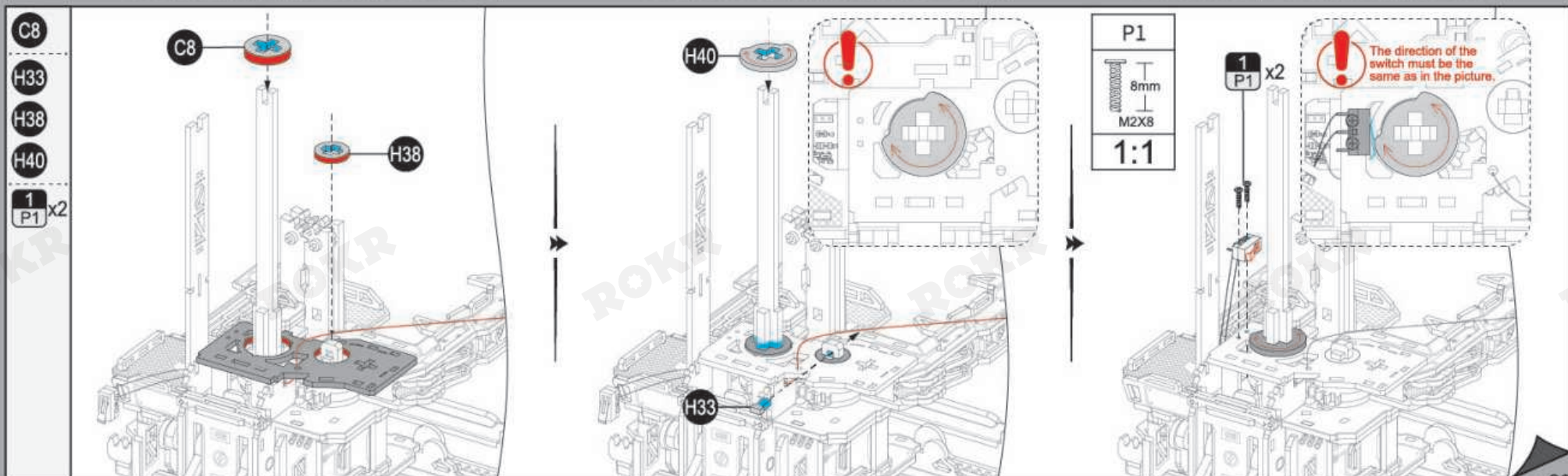
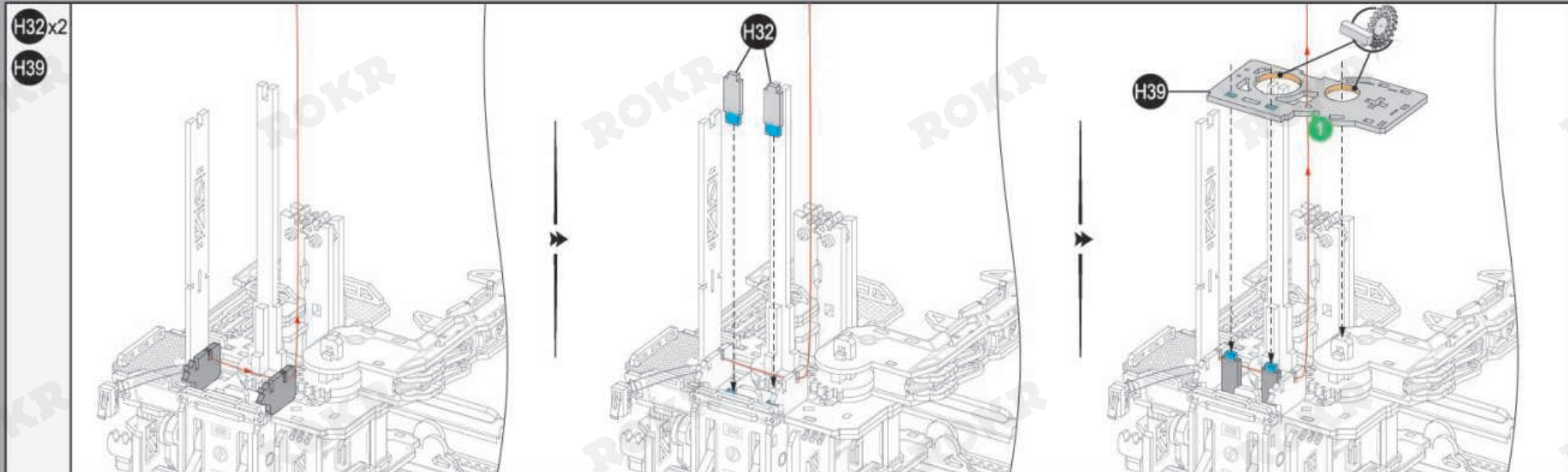


C10  
C13  
C16  
C17  
H21  
H52

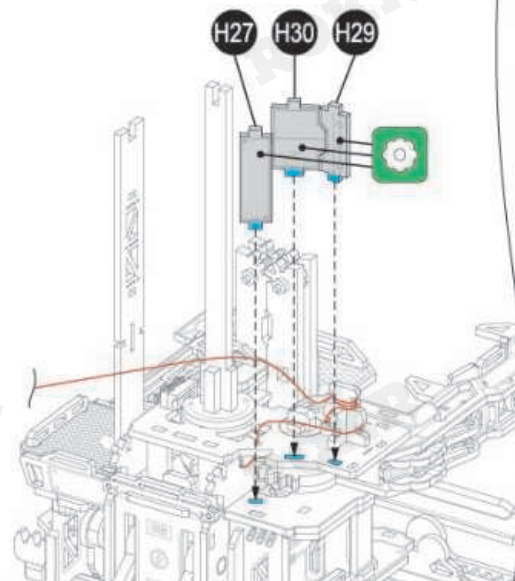
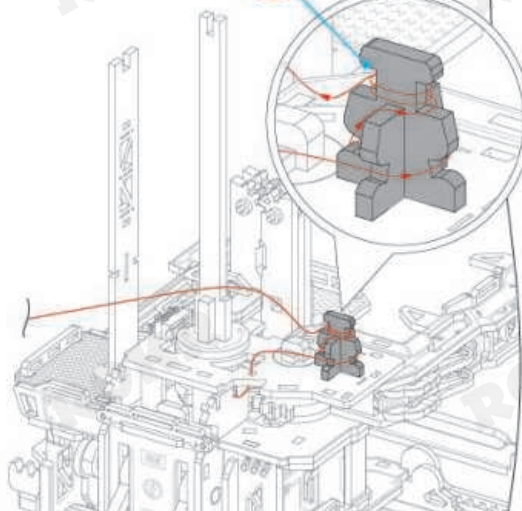
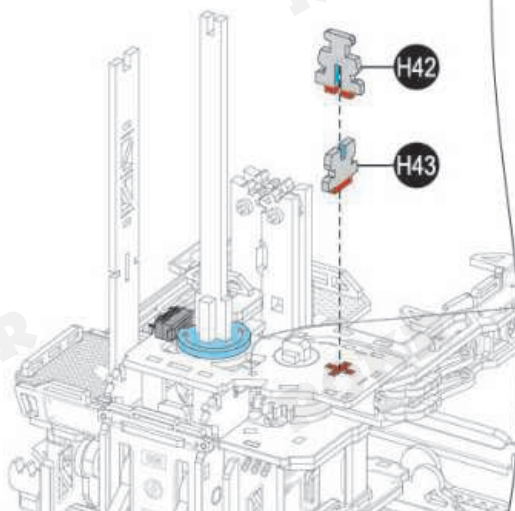




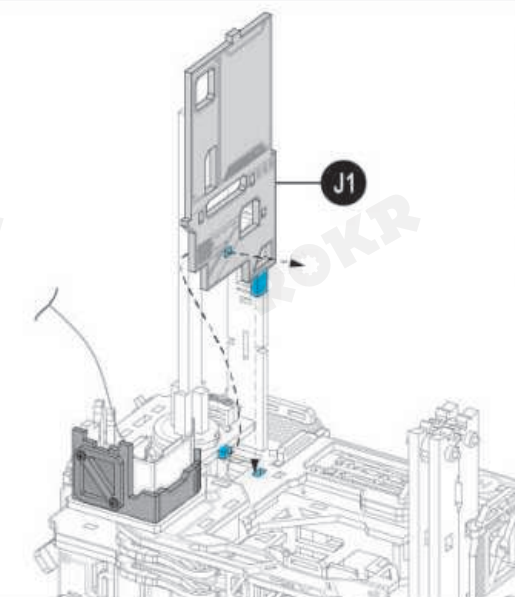
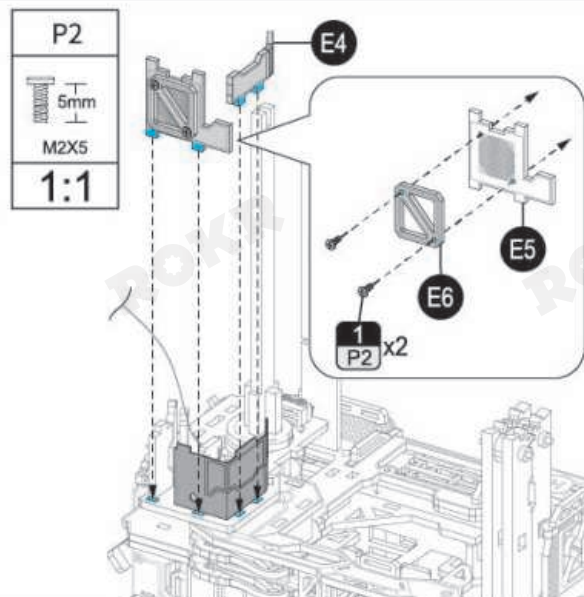
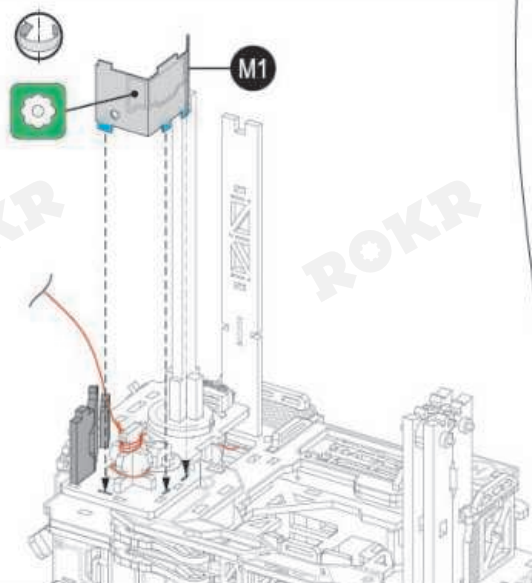




H27  
H29  
H30  
H42  
H43

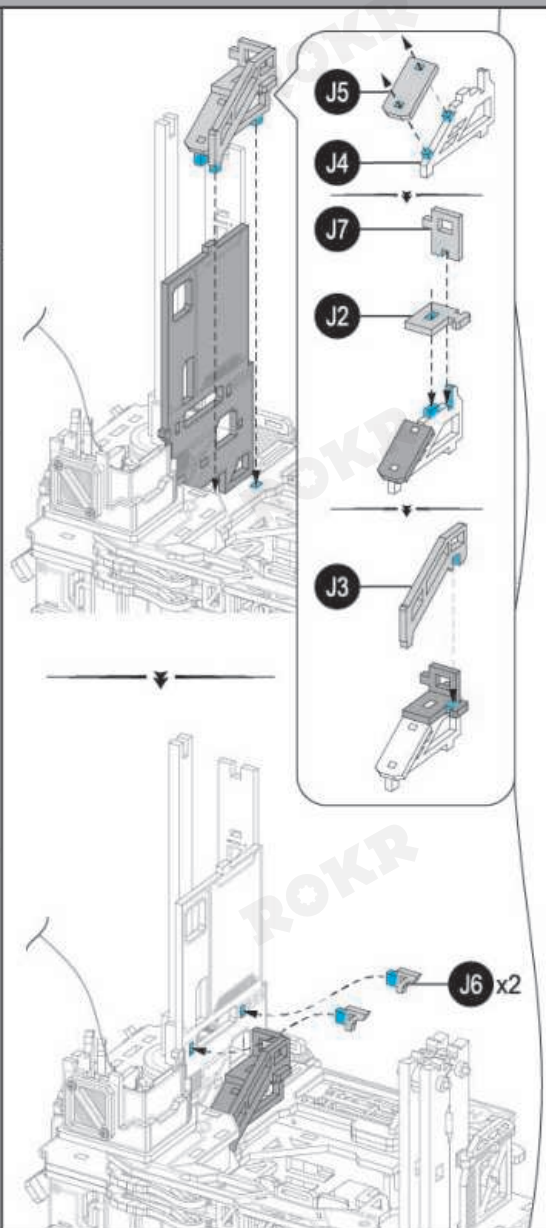


E4  
E5  
E6  
J1  
M1  
1 P2 x2





J2  
J3  
J4  
J5  
J6 x2  
J7

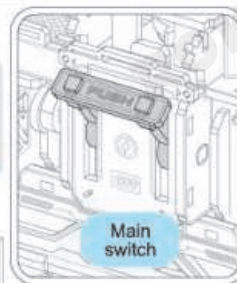


## Power on test 2:

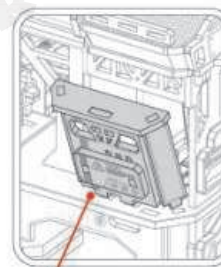
### Program running effect:

1. Turn the main switch on after connecting to the power supply, the lamp string is always on.

(Before testing, be sure to **check the switch state** and whether the direction of the parts is the same as the direction shown in the picture.)



Main switch

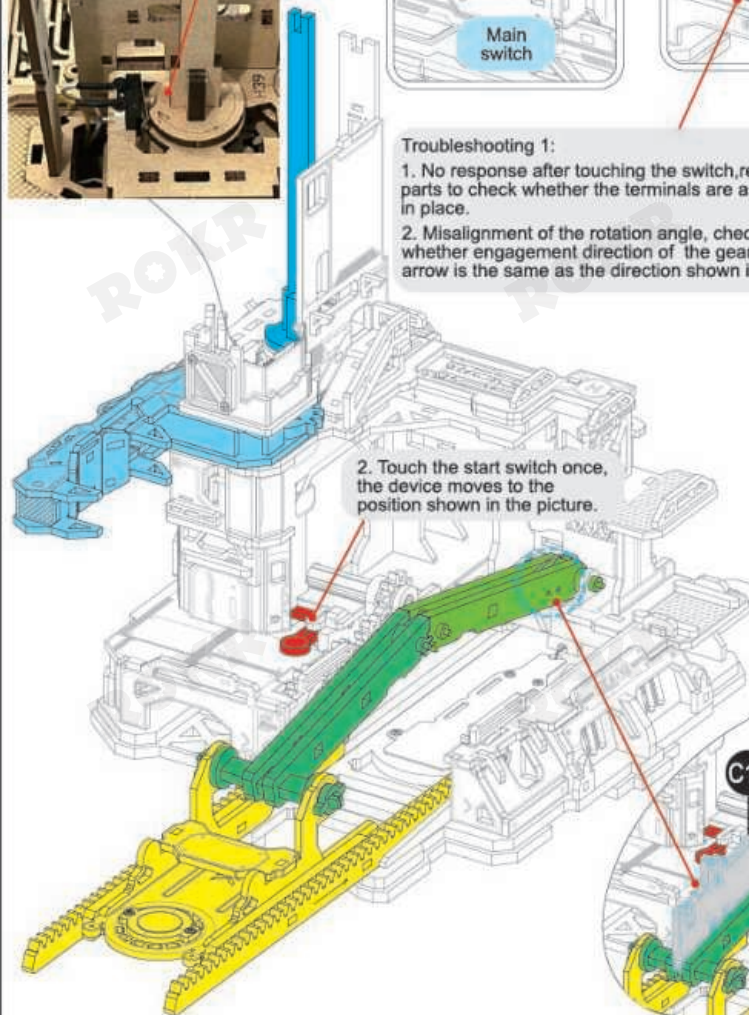


3. Touch the start switch once again, the device is reset and the light beads flash.

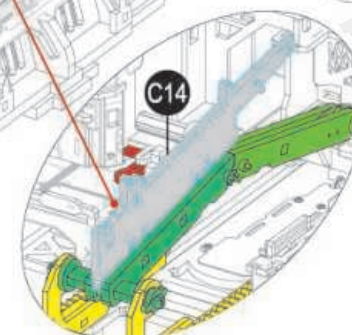
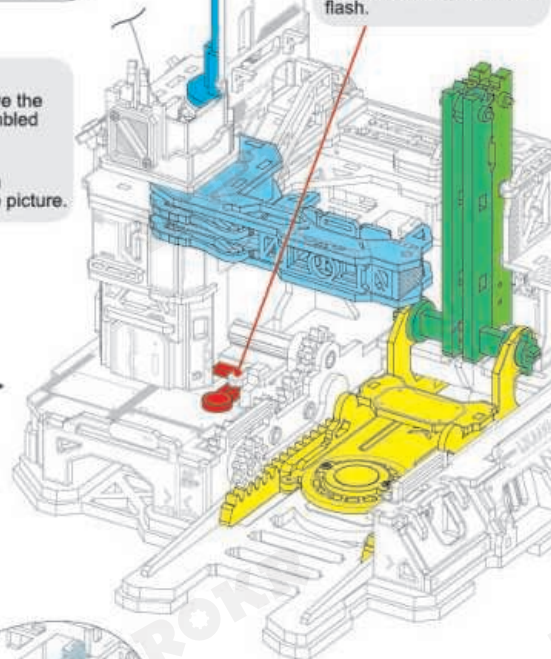
### Troubleshooting 1:

1. No response after touching the switch, remove the parts to check whether the terminals are assembled in place.

2. Misalignment of the rotation angle, check whether engagement direction of the gear with arrow is the same as the direction shown in the picture.



2. Touch the start switch once, the device moves to the position shown in the picture.

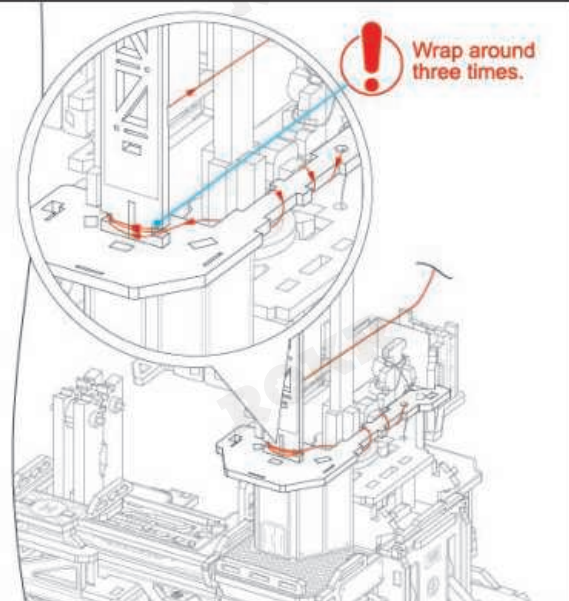
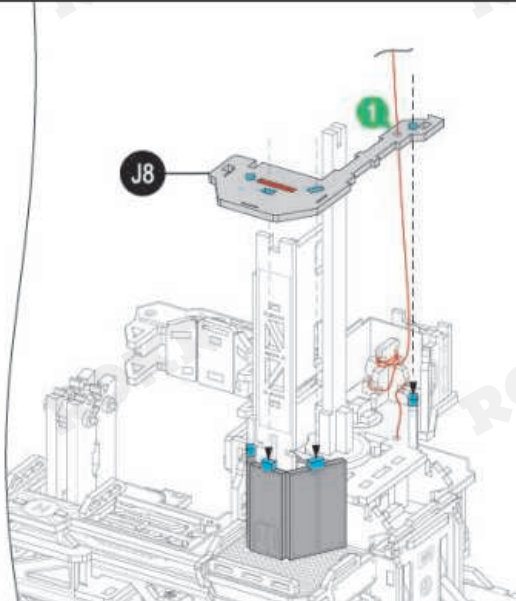
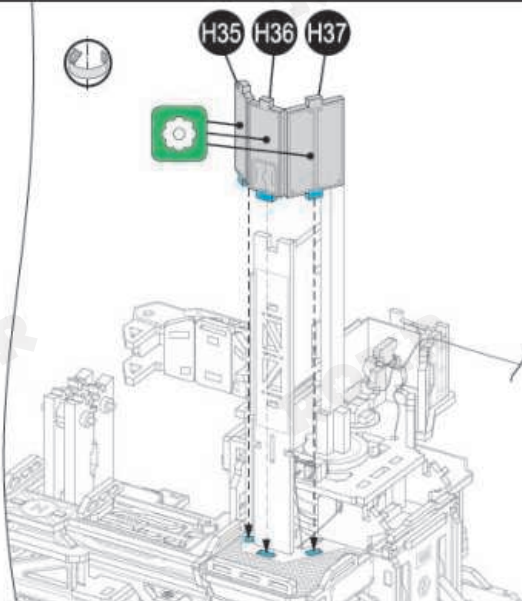


C14

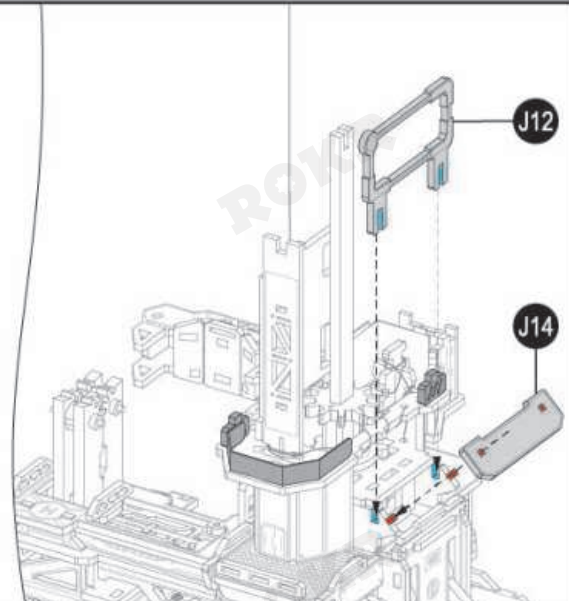
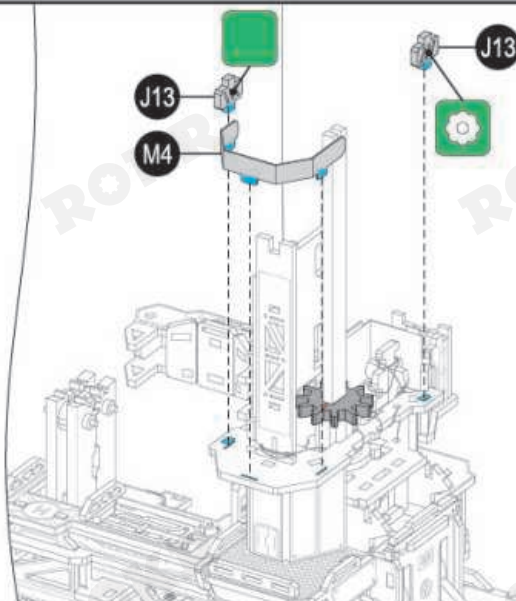
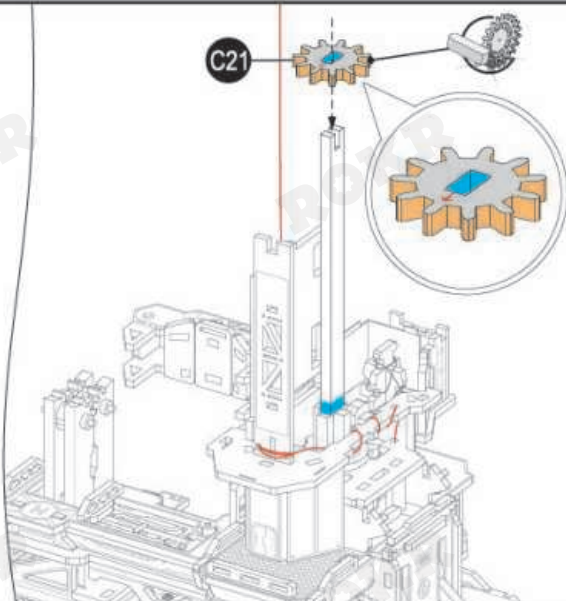
### Troubleshooting 2:

1. If the **switch** shown in the picture is inaccessible during the test, the part **C14** can be inserted first to assist in the test, and then **removed after testing**.

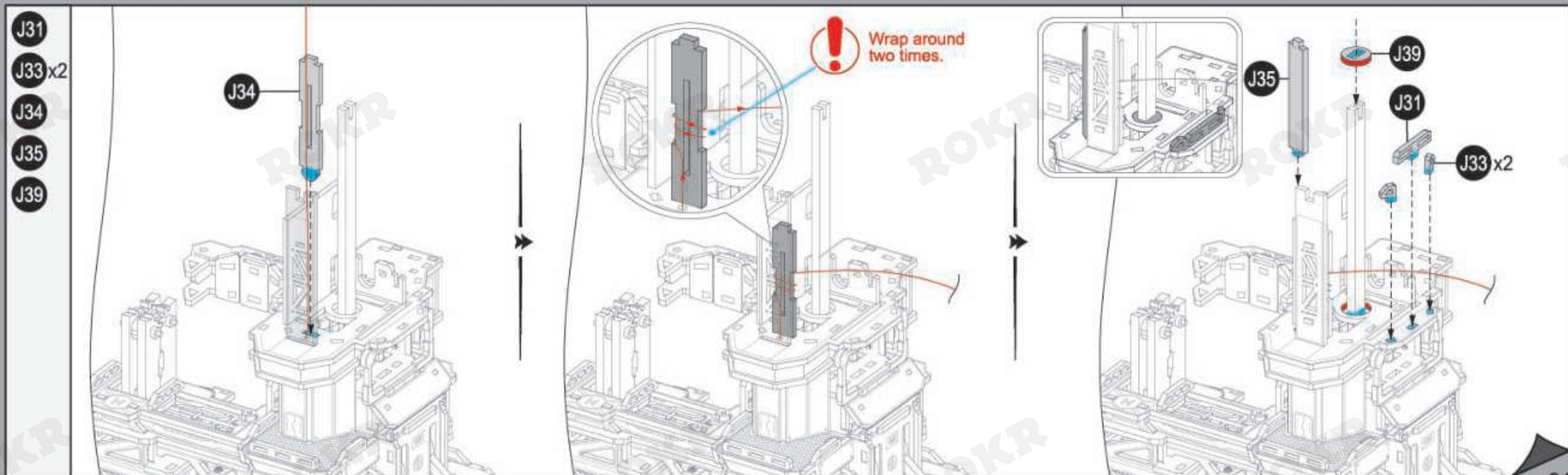
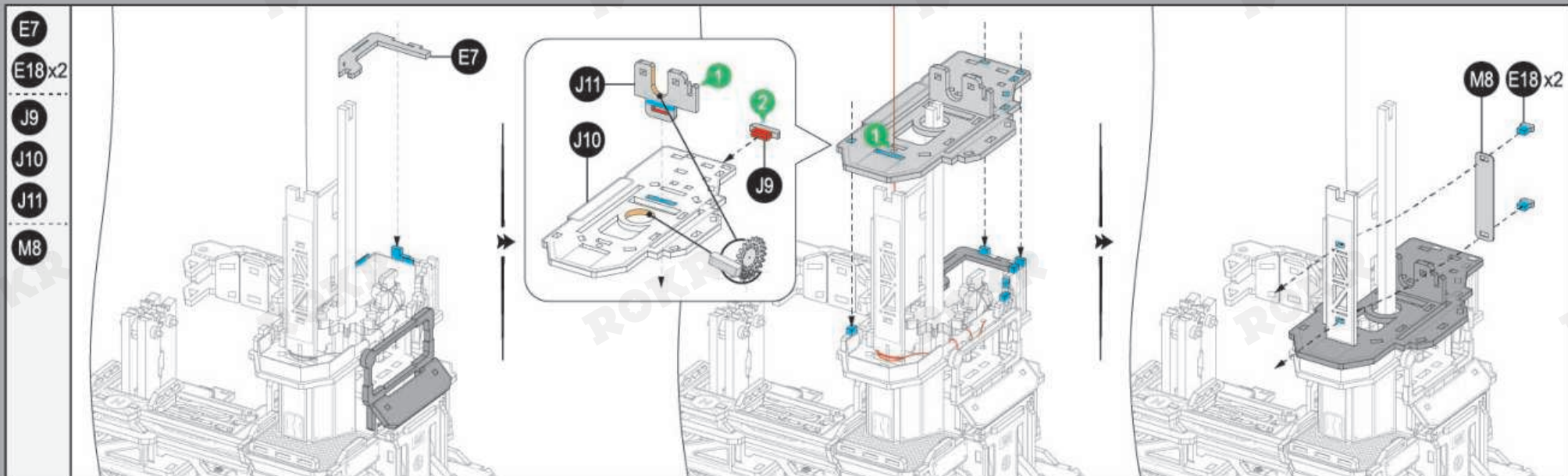
H35  
H36  
H37  
J8



C21  
J12  
J13 x2  
J14  
M4



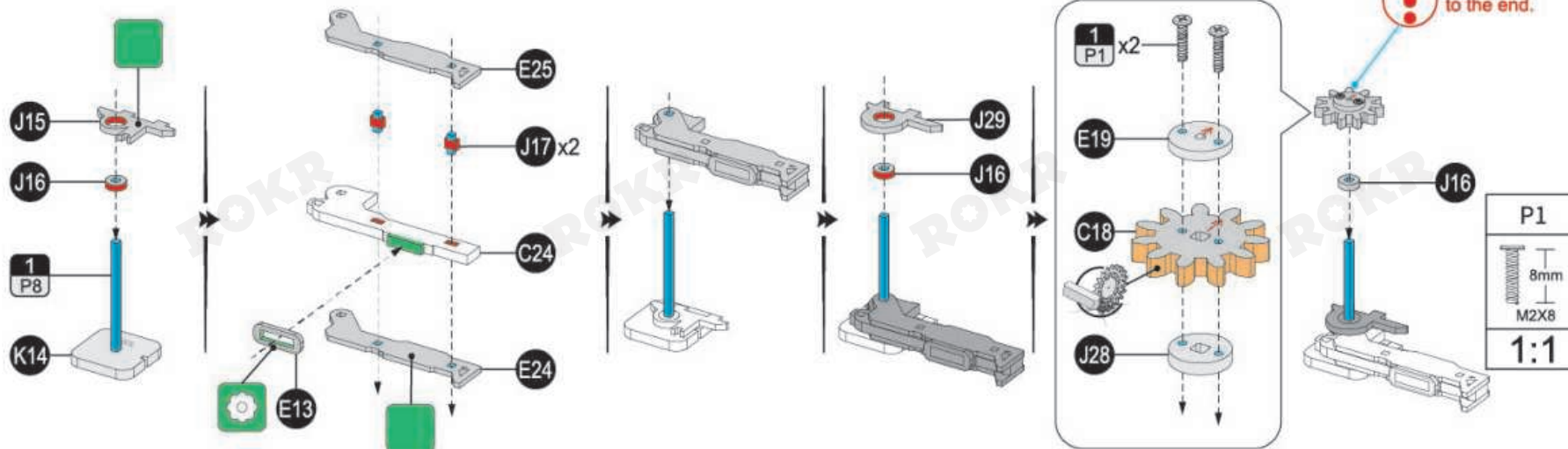




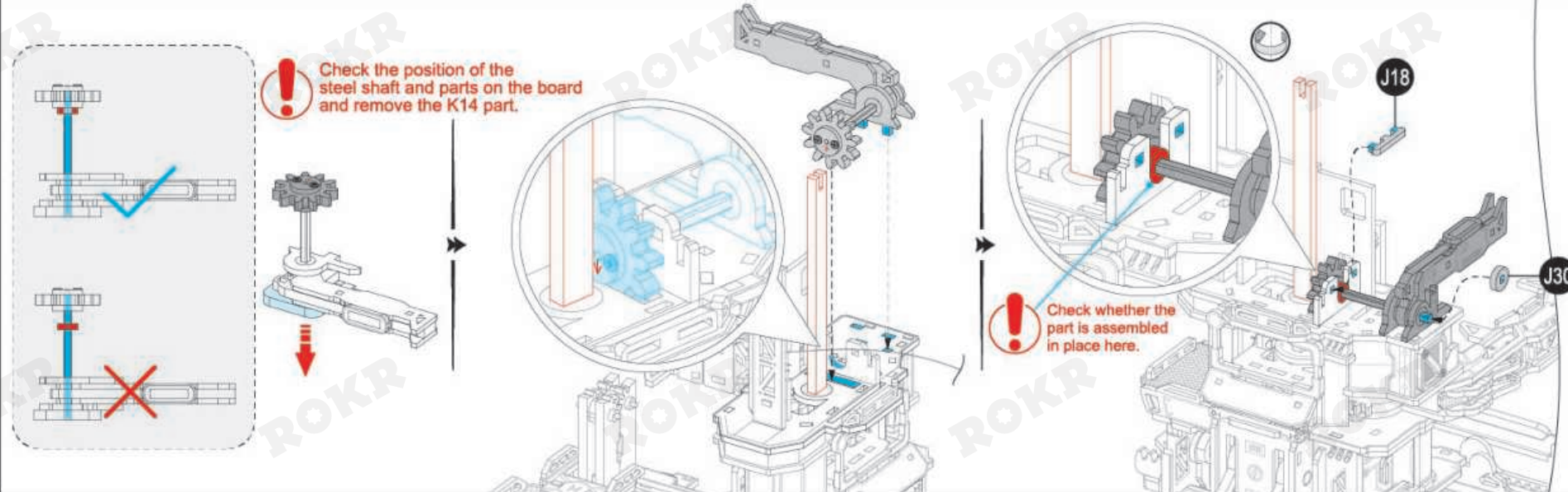
5

- C18
- C24
- E13
- E19
- E24
- E25
- J15
- J16 x3
- J17 x2
- J28
- J29

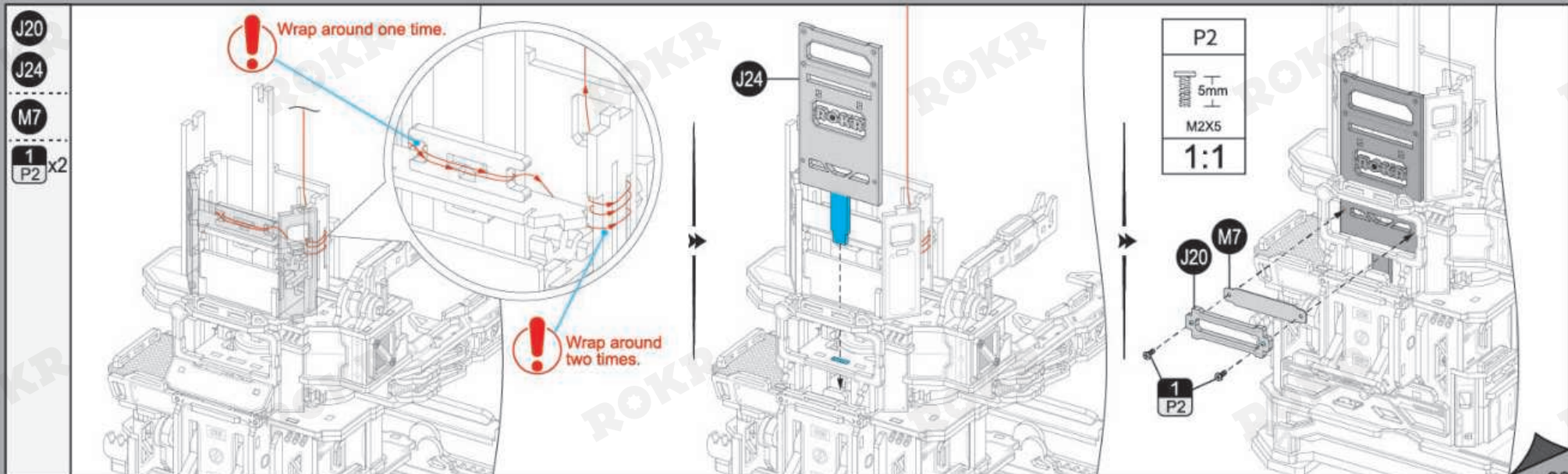
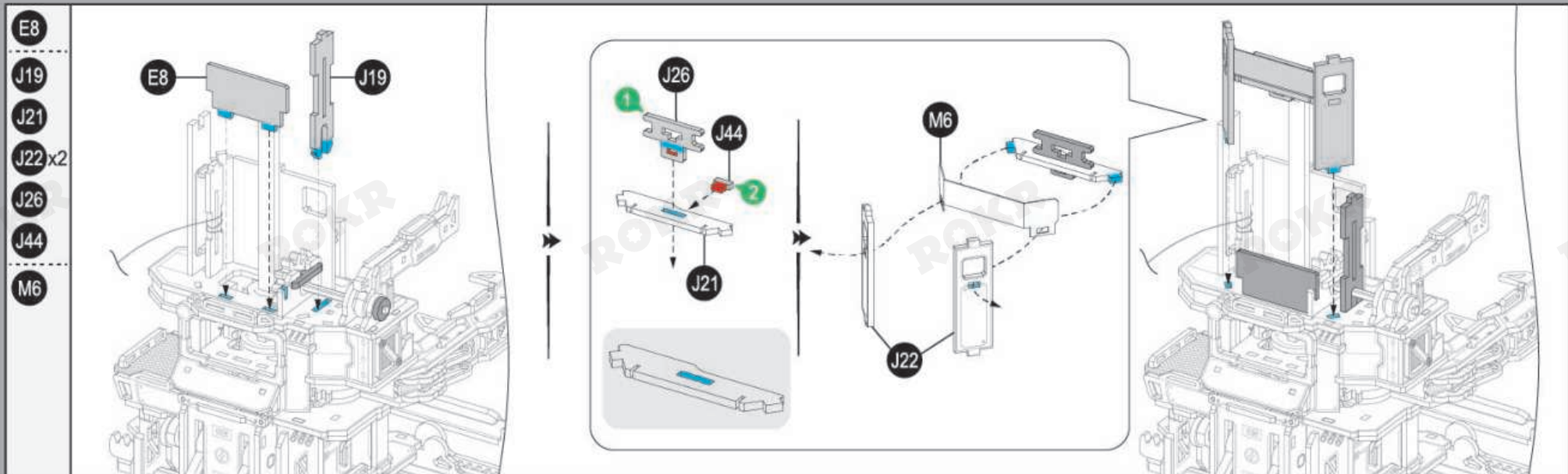
- K14
- 1 P1 x2
- 1 P8

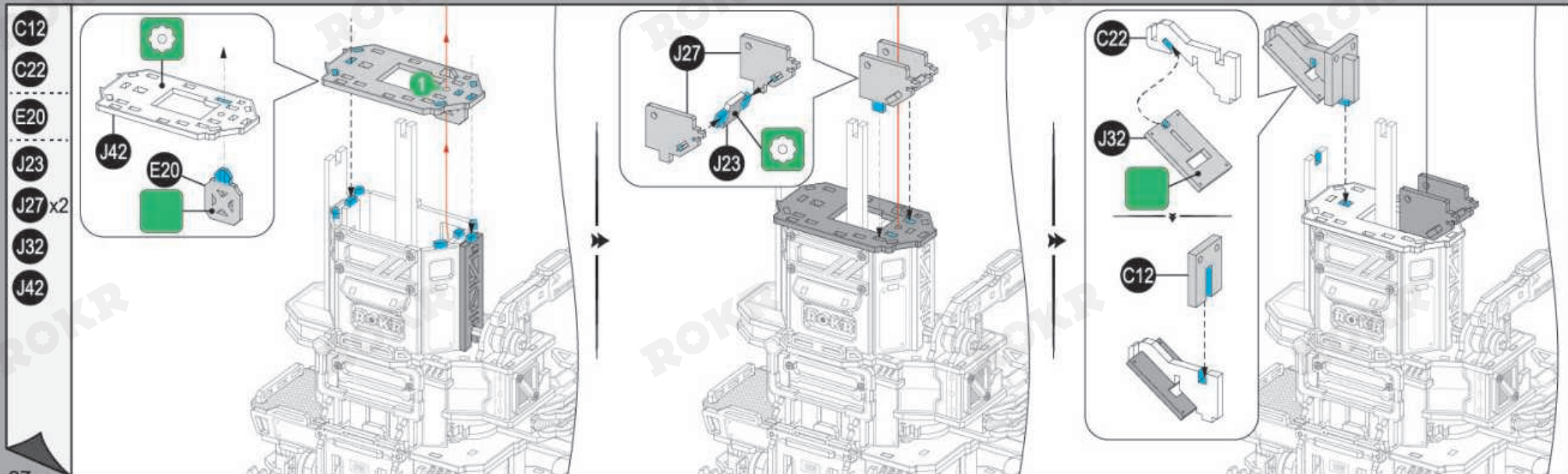
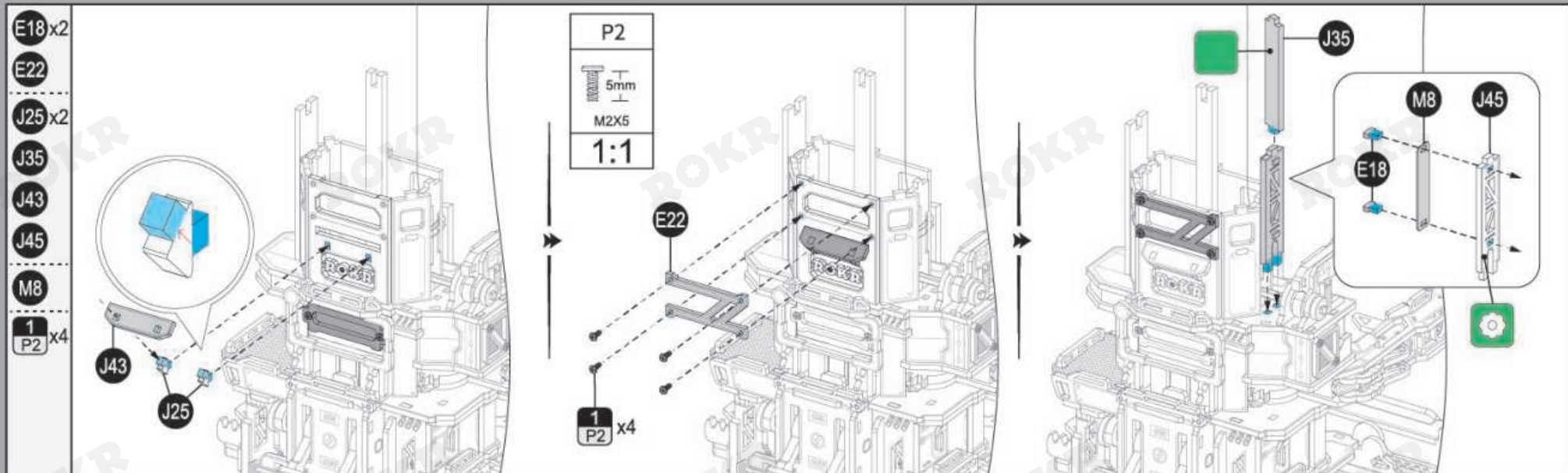


- J18
- J30

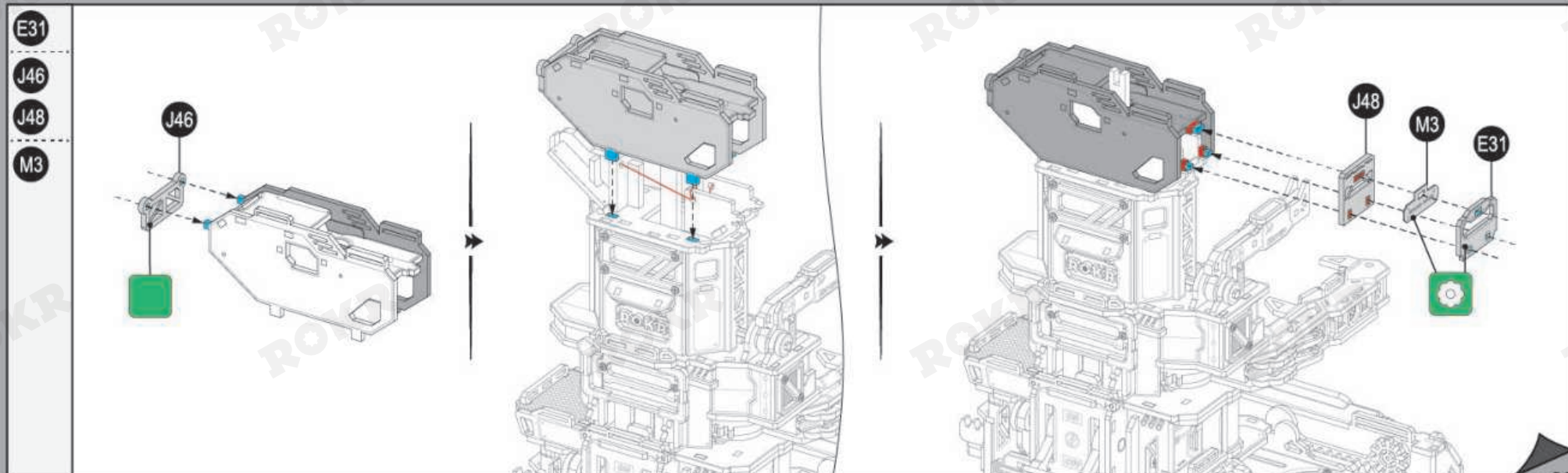
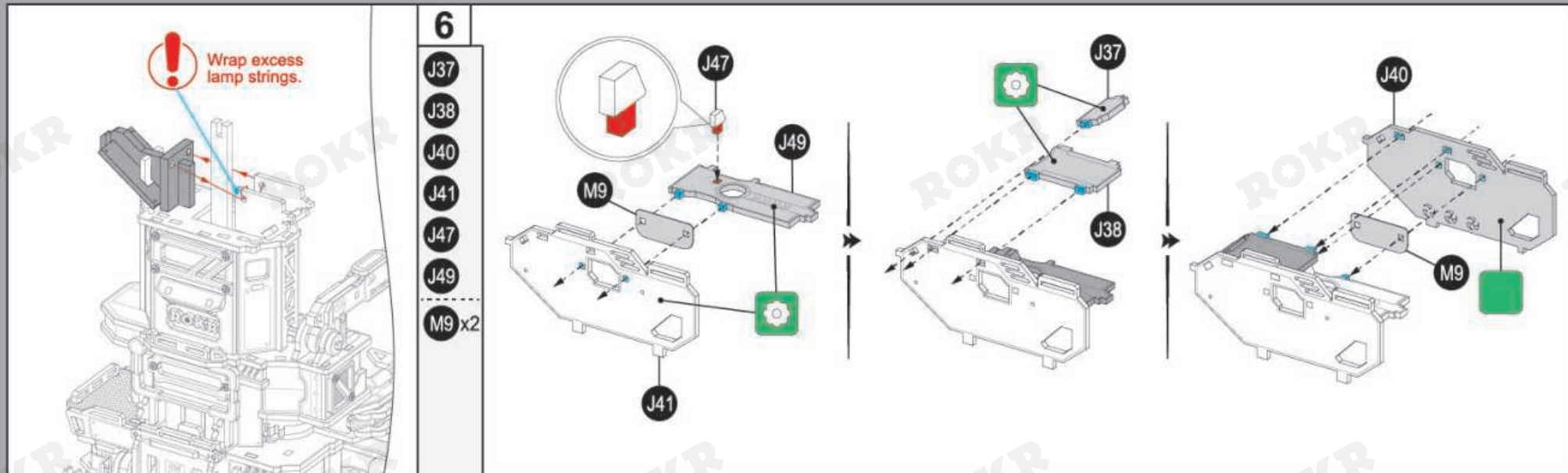








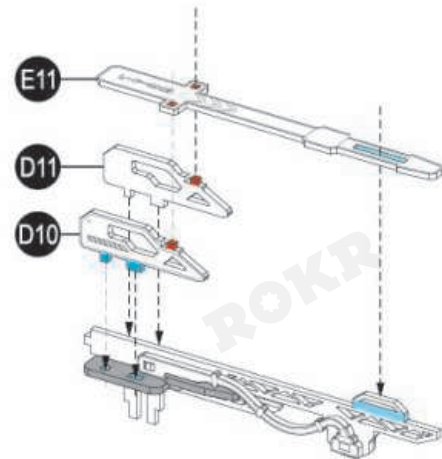
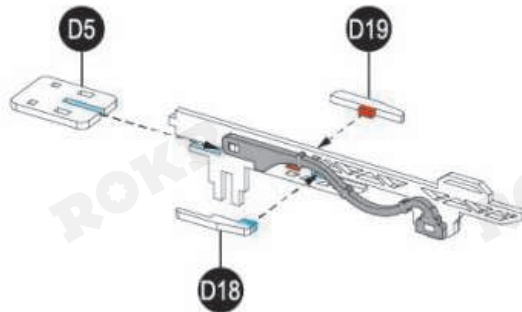
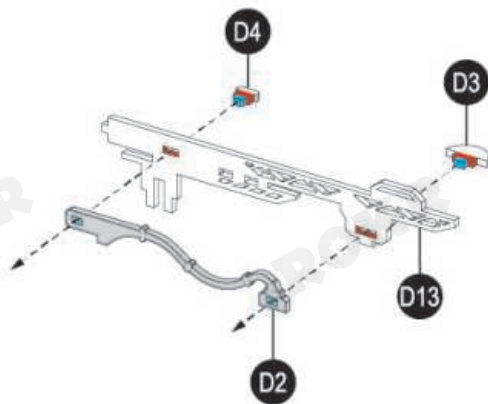
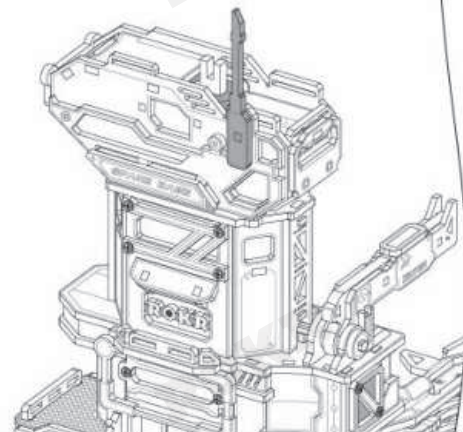
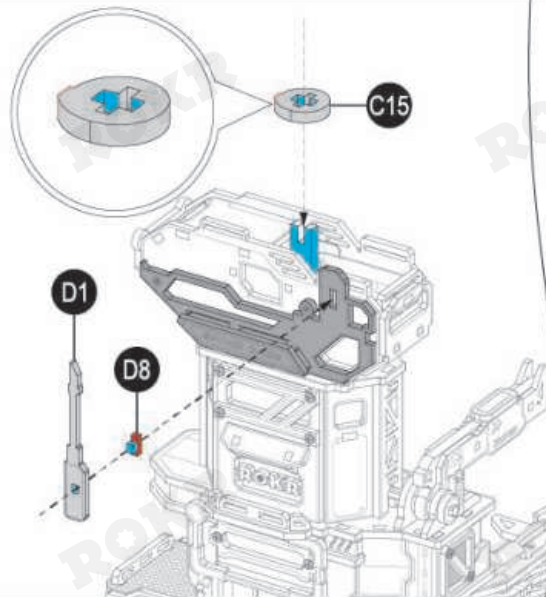
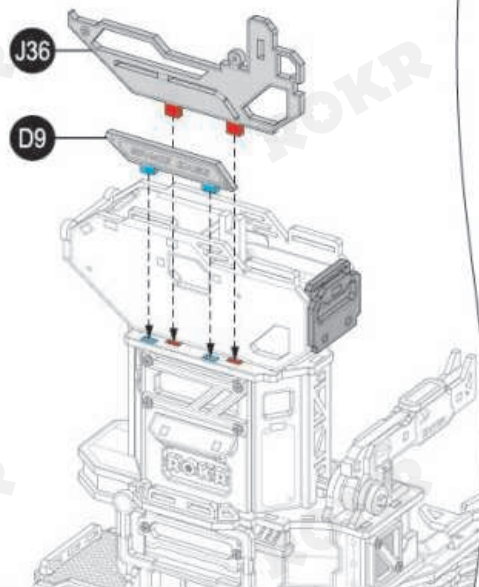




C15  
D1  
D8  
D9  
J36

7

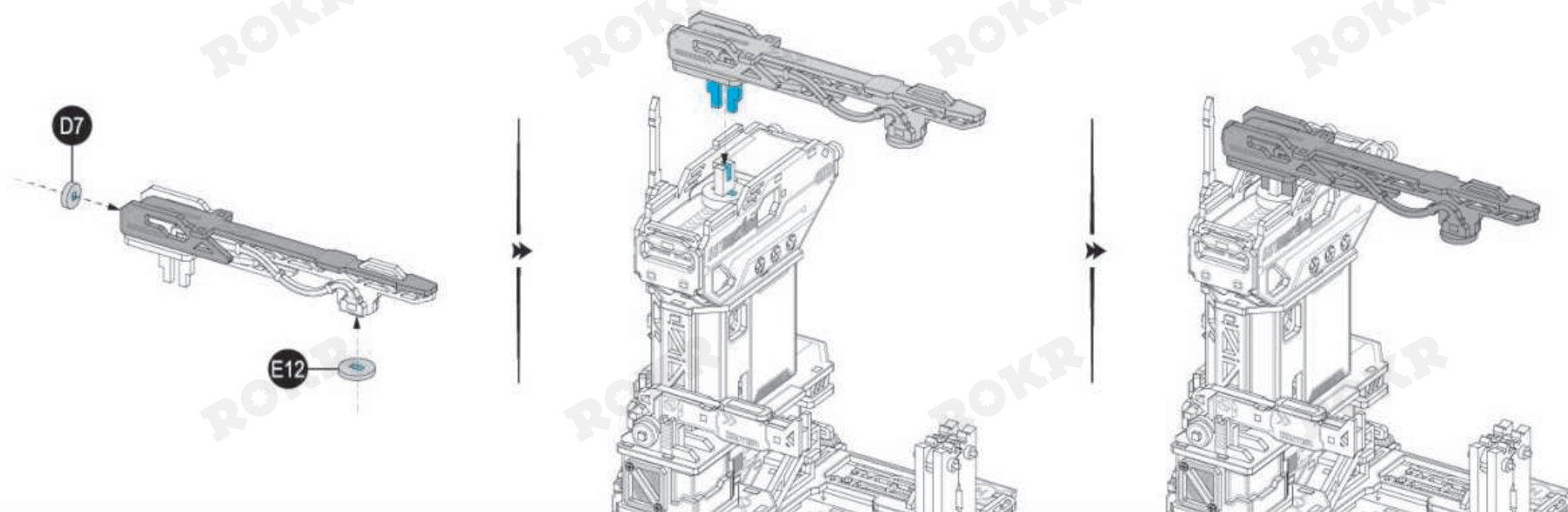
D2  
D3  
D4  
D5  
D10  
D11  
D13  
D18  
D19  
E11





D7

E12



8

C4

C6-a

C6-b

C9

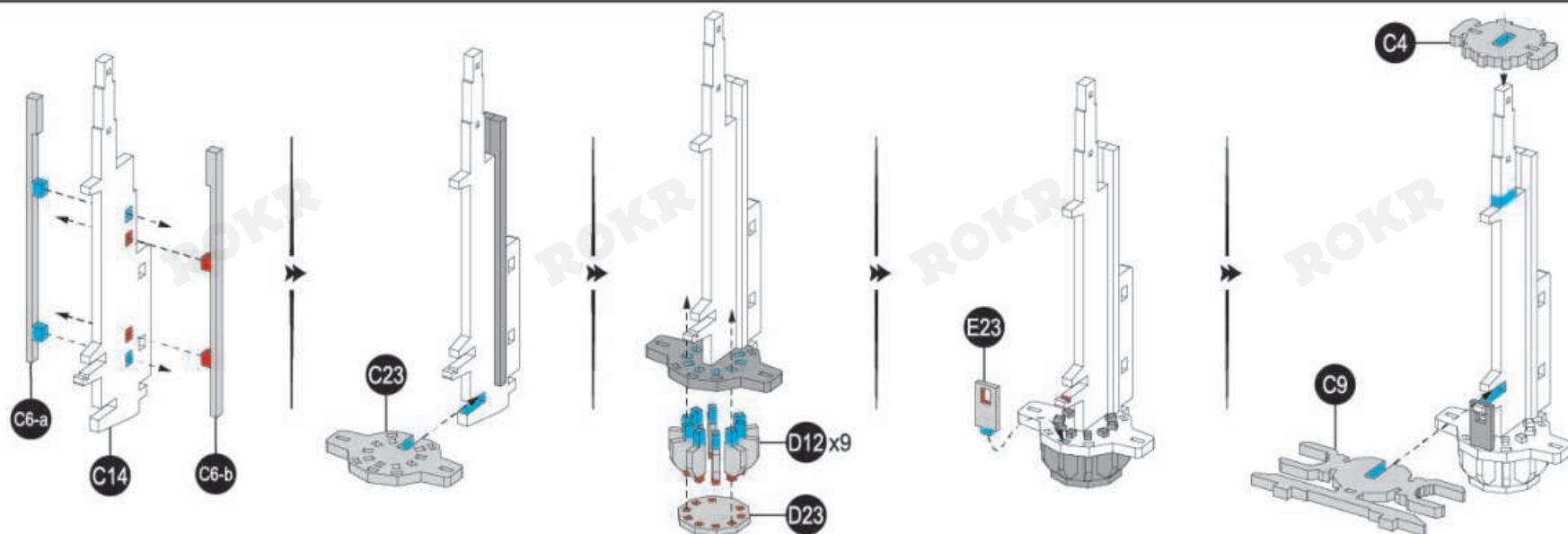
C14

C23

D12x9

D23

E23



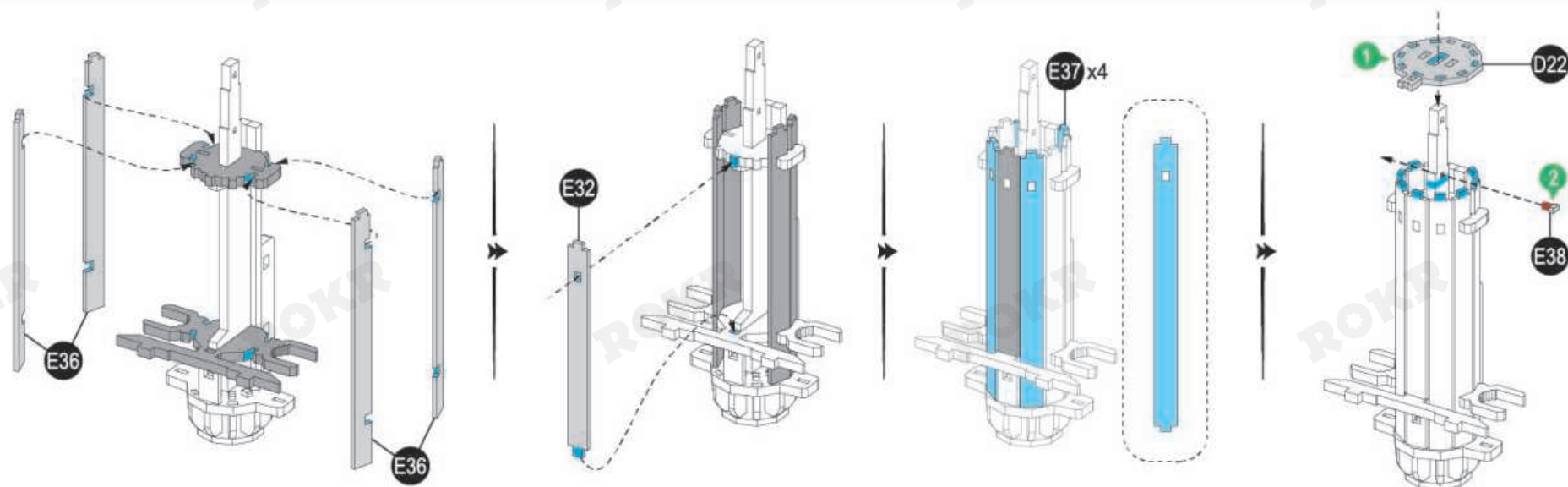
D22

E32

E36x4

E37x4

E38



D6 x2

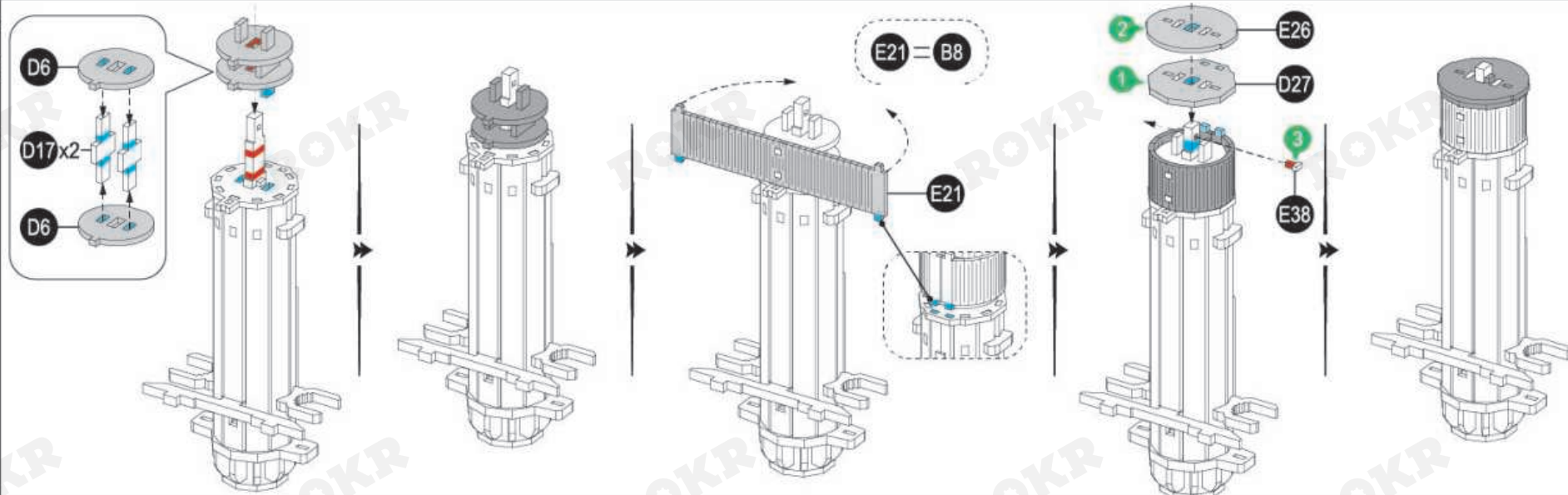
D17 x2

D27

E21

E26

E38





D20

D21

E9 x4

E10 x4

E28

E29

E29

E28

D20

D21

E9 x4

E9 ≠ E10

E10 x4

A1 x8

A9 x2

D24

E27 x2

E30

A9

A9

A1 x4

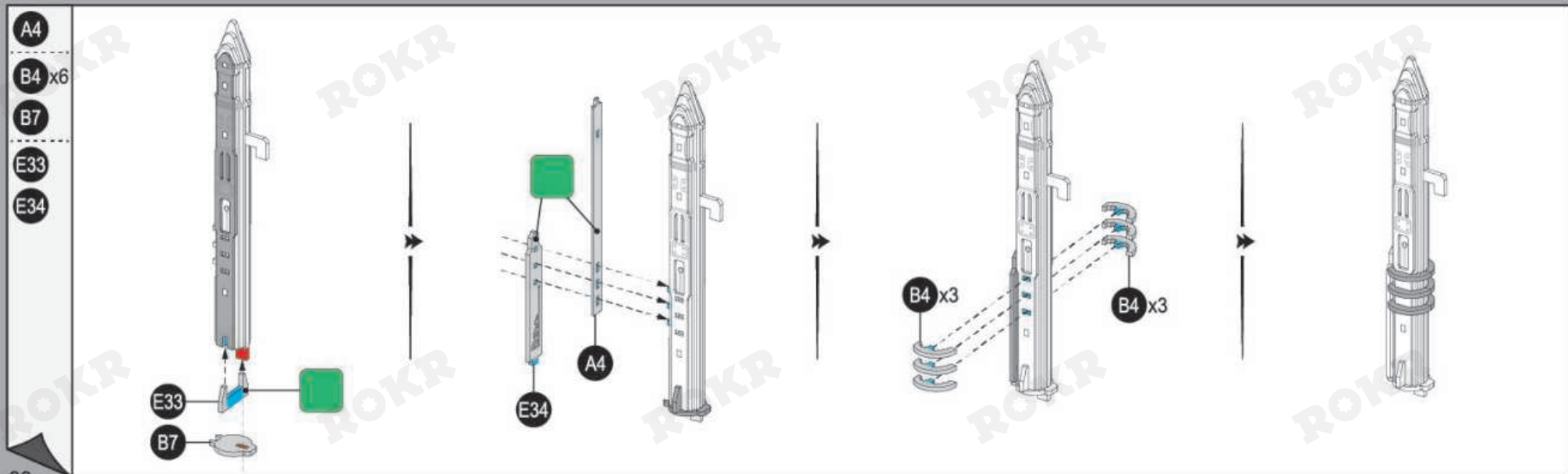
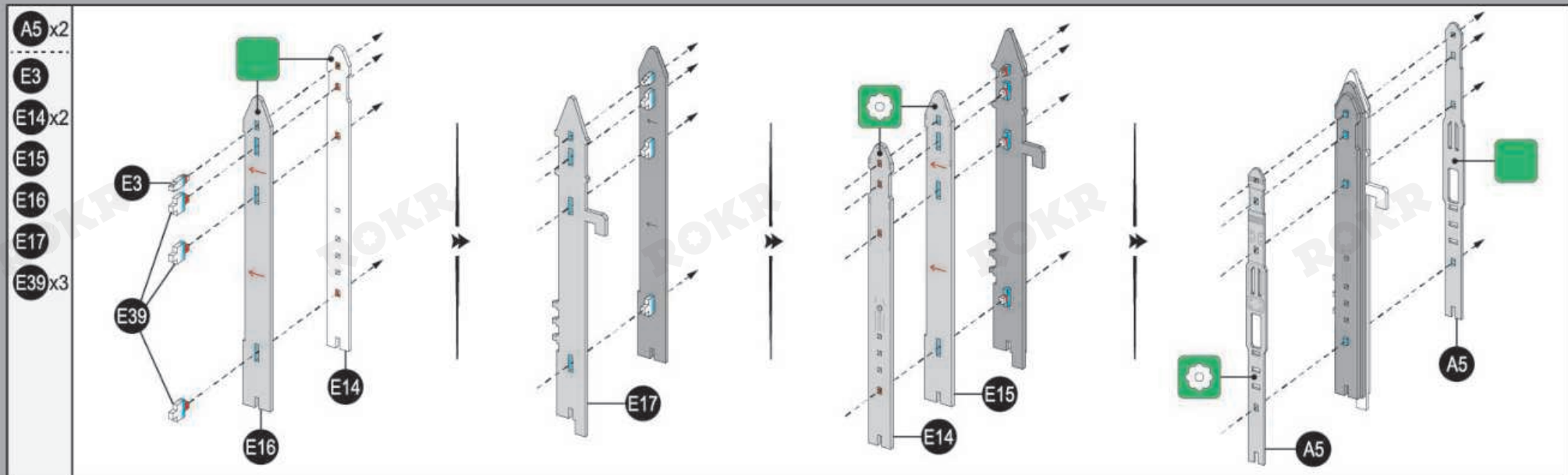
A1 x4

D24

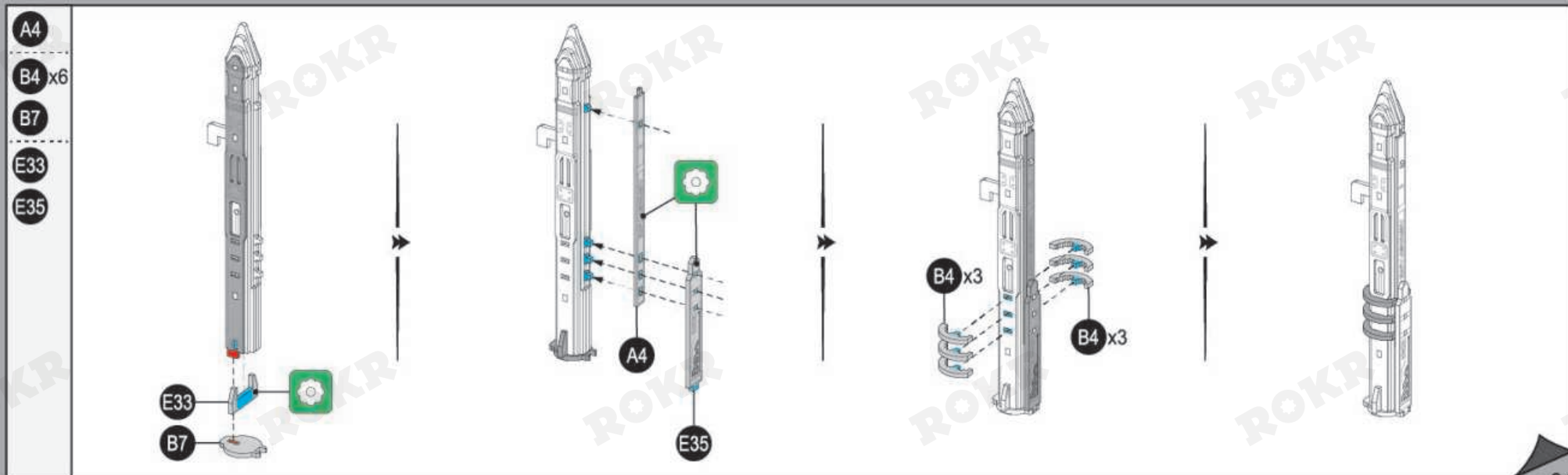
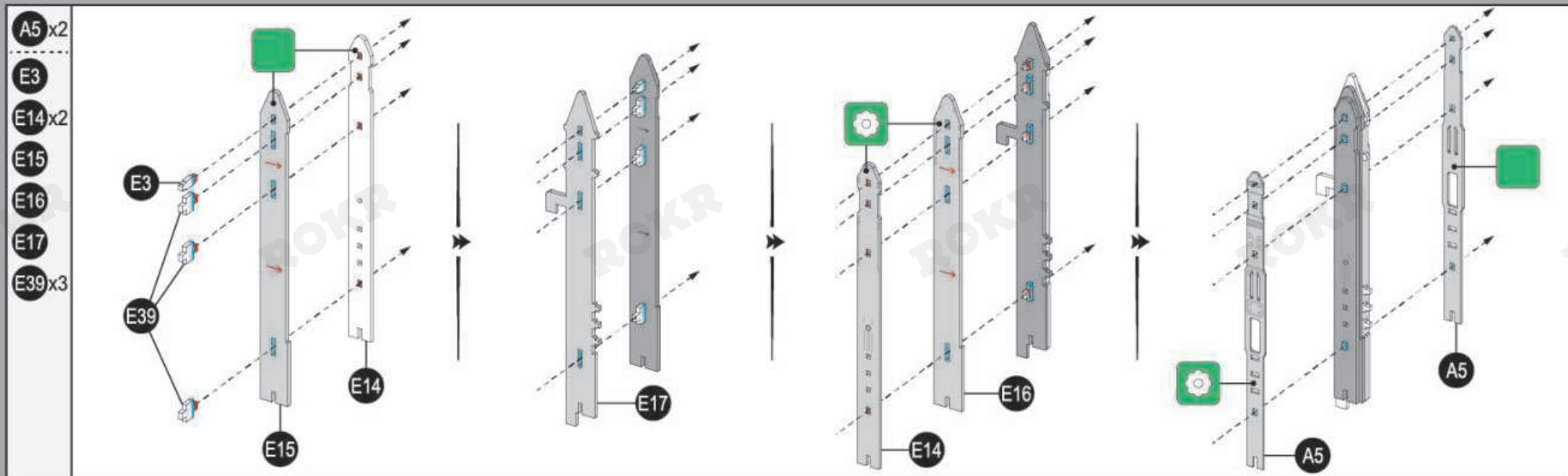
E27

E30

E27



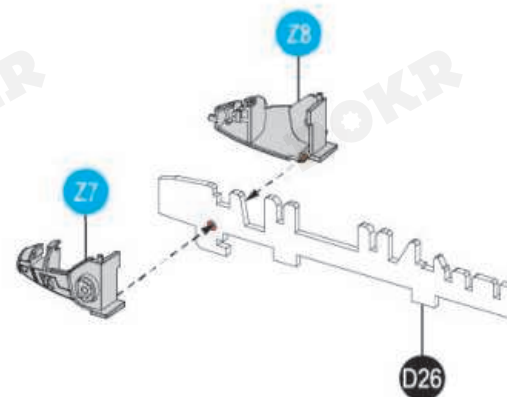
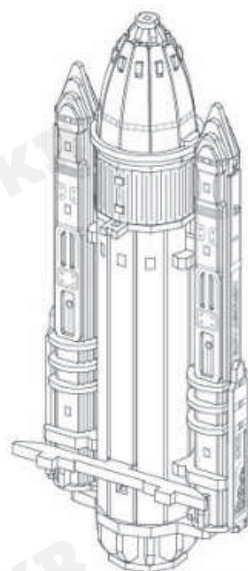
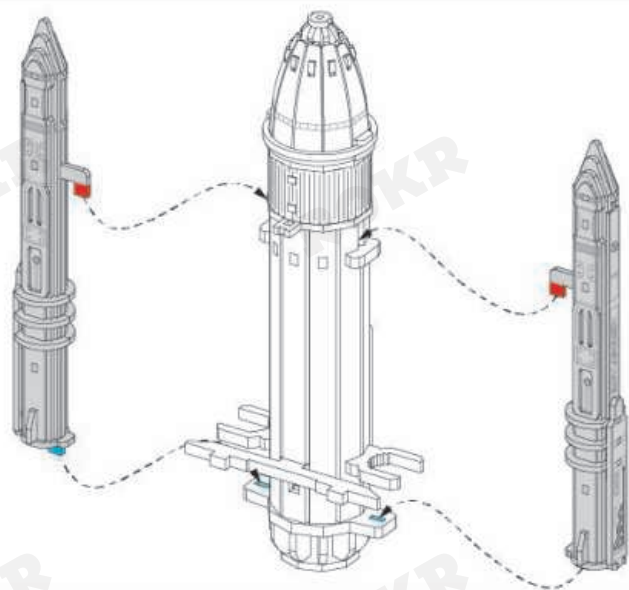




D26

Z7

Z8



D14

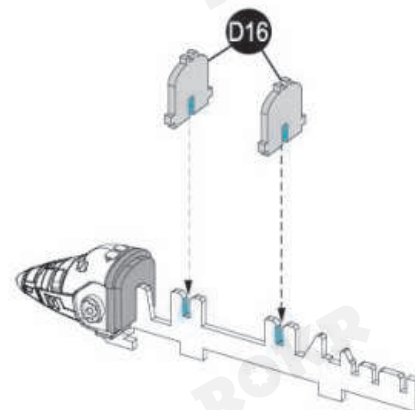
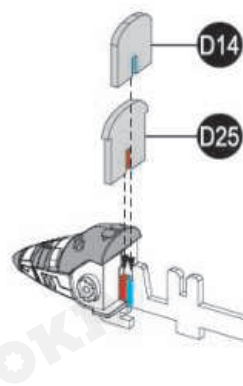
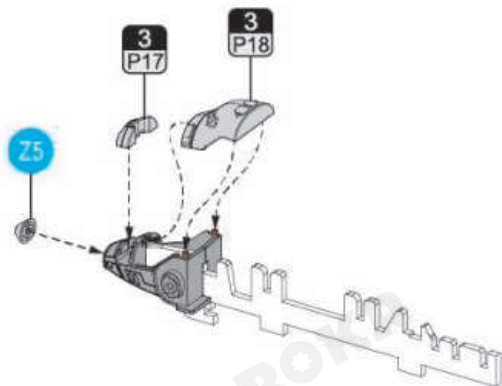
D16x2

D25

Z5

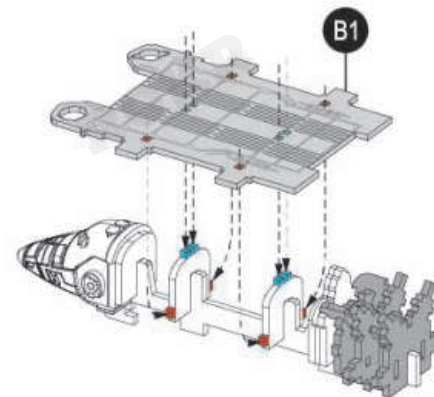
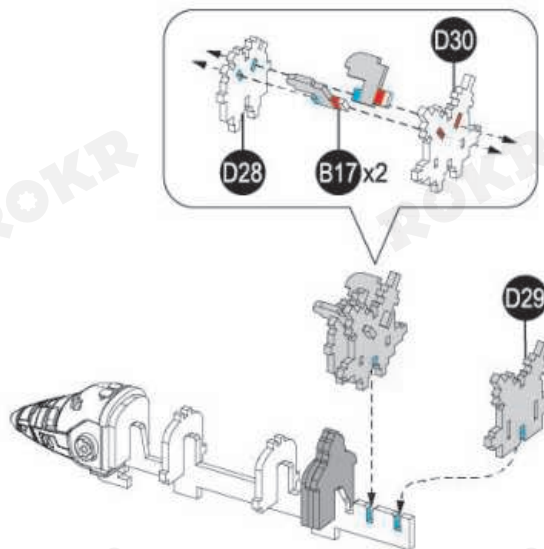
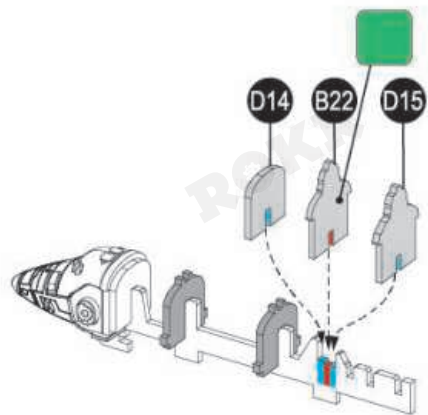
3 P17

3 P18

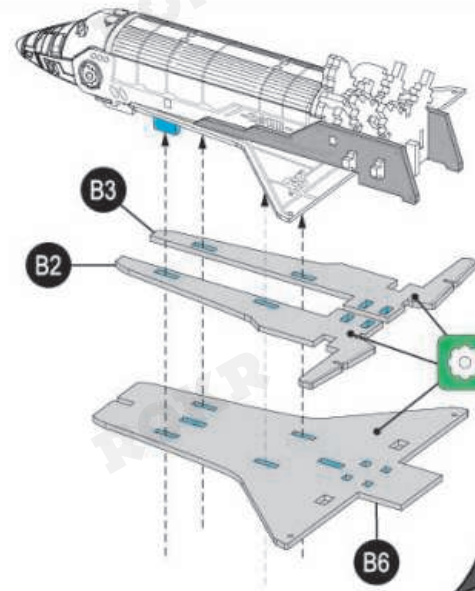
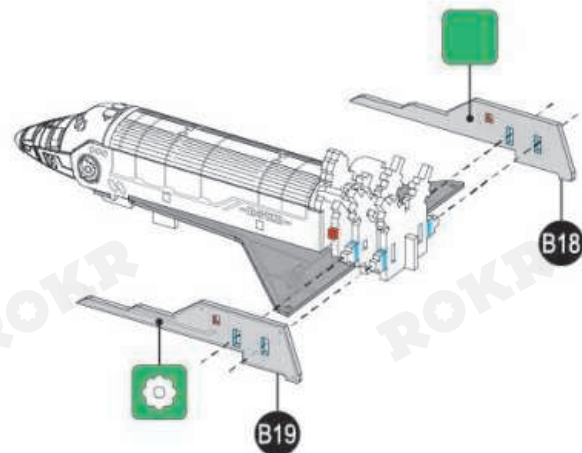
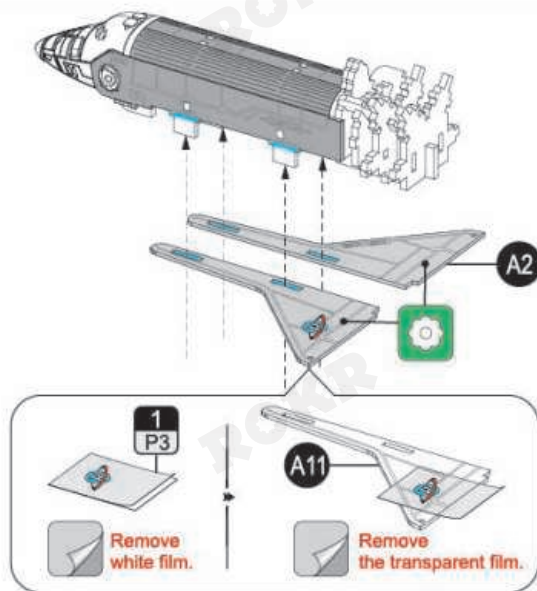




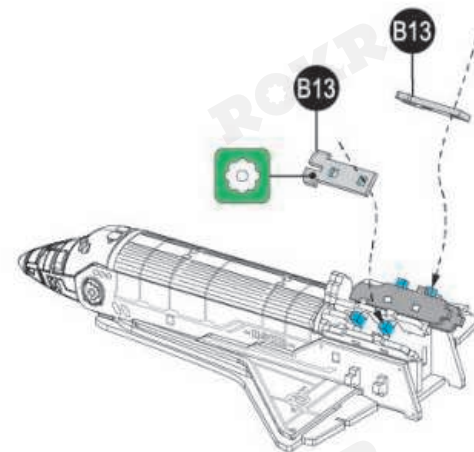
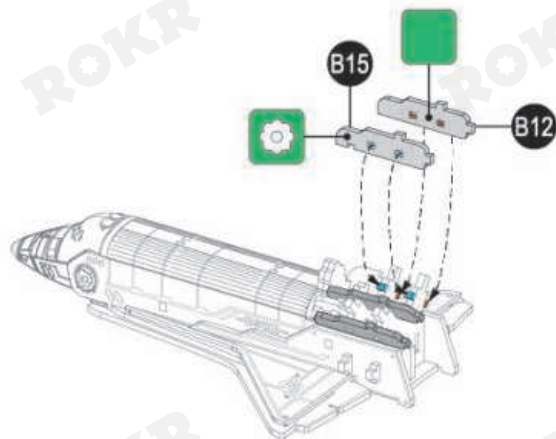
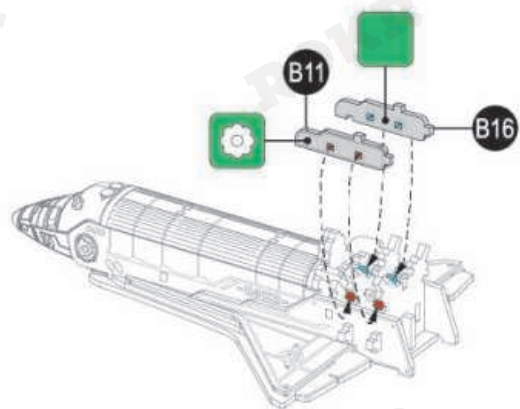
B1  
 B17x2  
 B22  
 D14  
 D15  
 D28  
 D29  
 D30



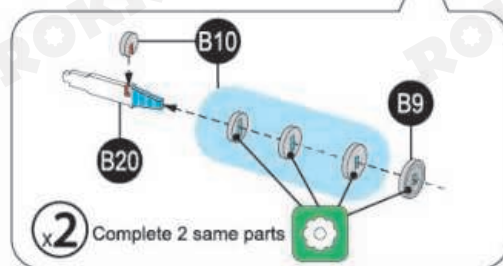
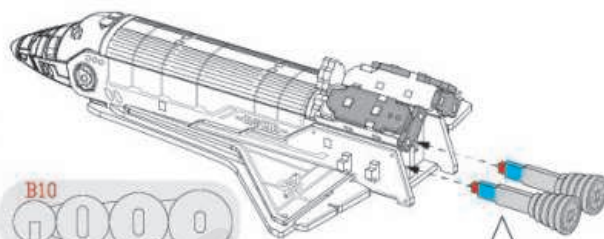
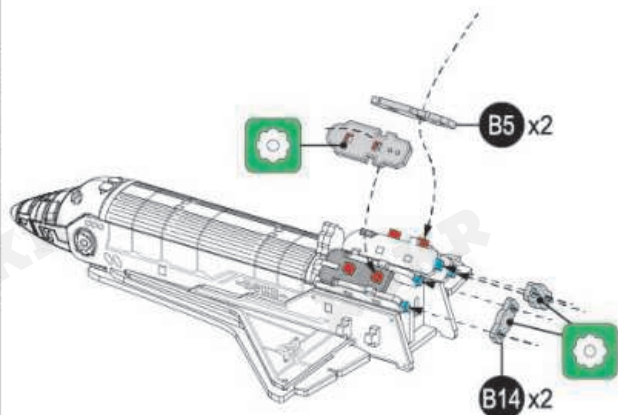
A2  
 A11  
 B2  
 B3  
 B6  
 B18  
 B19  
 1  
 P3



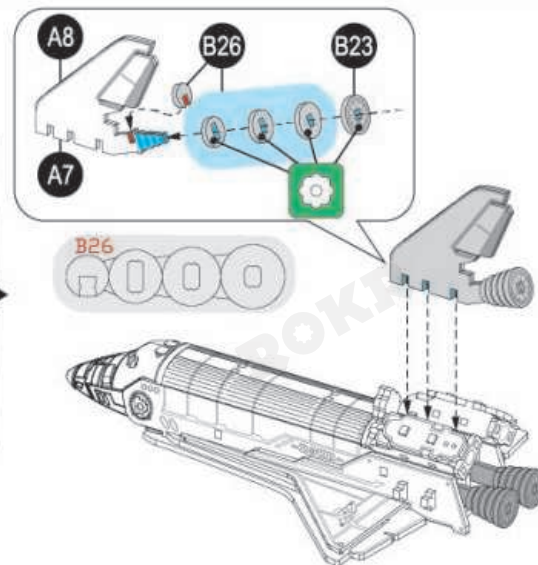
B11  
 B12  
 B13 x2  
 B15  
 B16



A7  
 A8  
 B5 x2  
 B9 x2  
 B10 x2  
 B14 x2  
 B20 x2  
 B23  
 B26

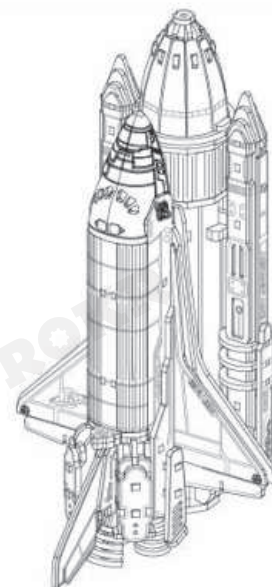
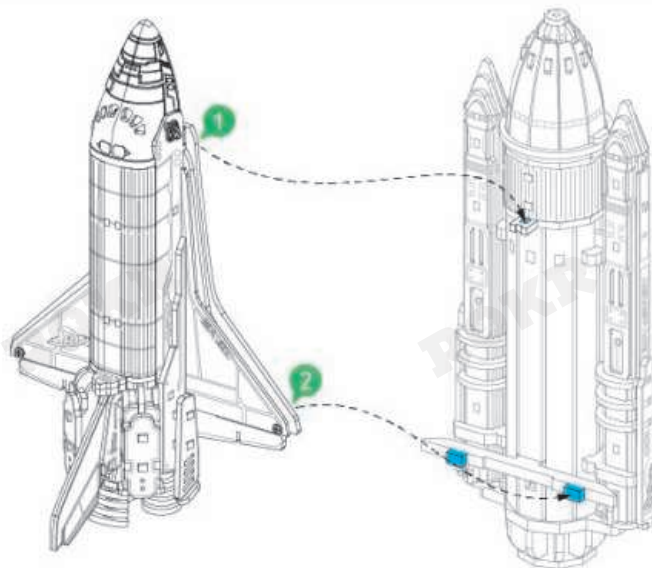
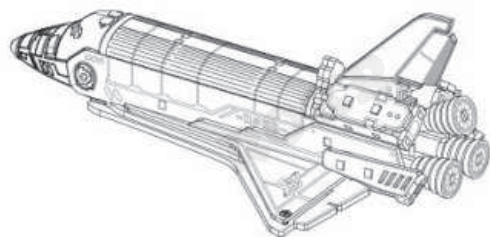
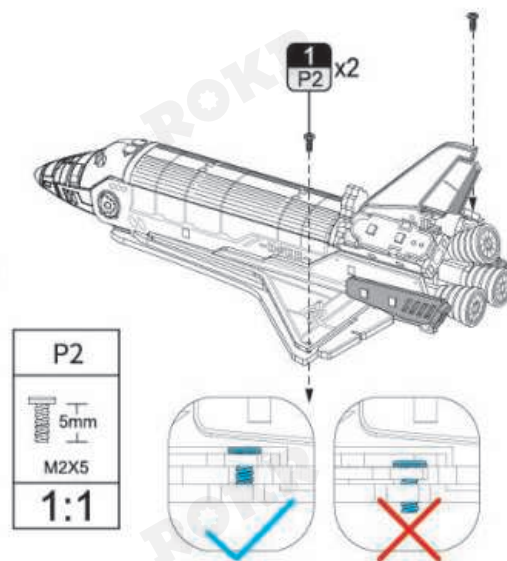
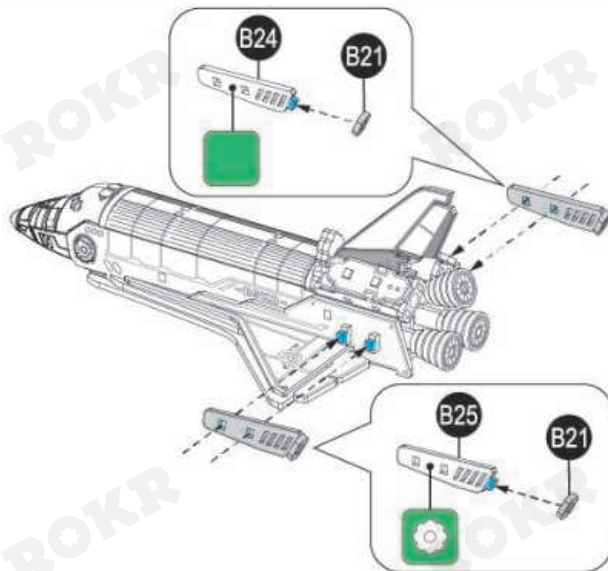
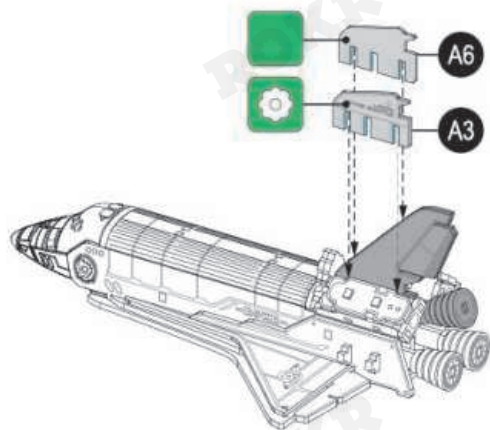


x2 Complete 2 same parts



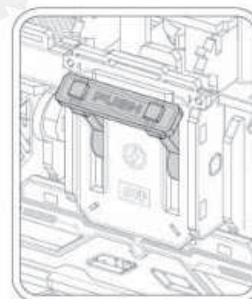


A3  
A6  
B21x2  
B24  
B25  
1  
P2x2



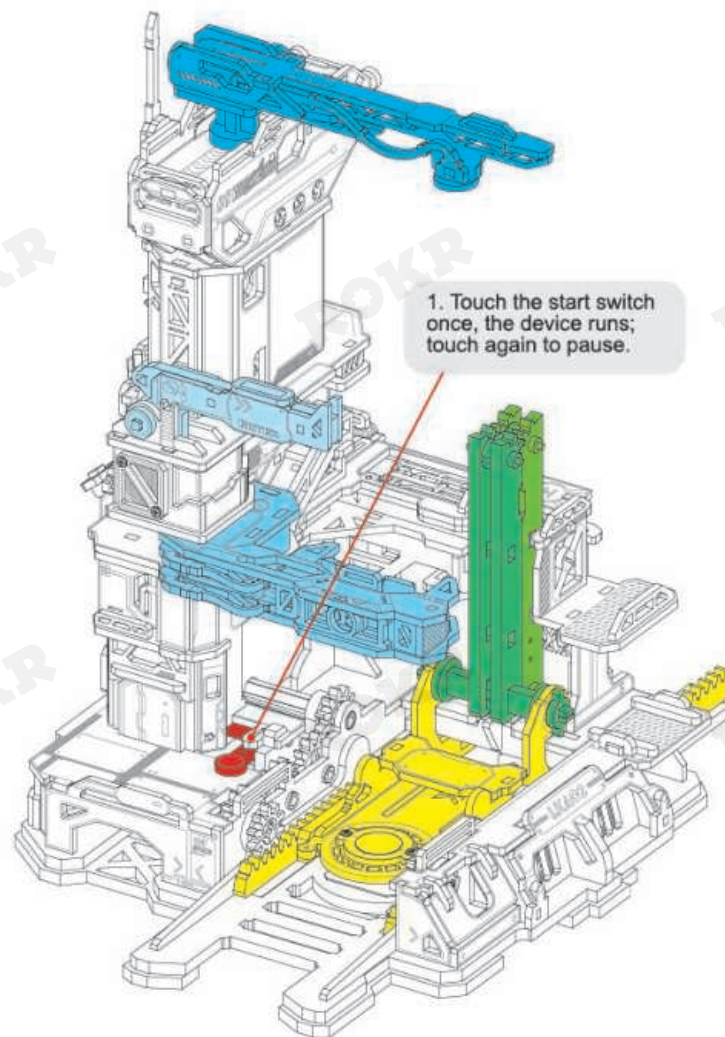


Do not rotate the parts  
forcefully to avoid motor damage.

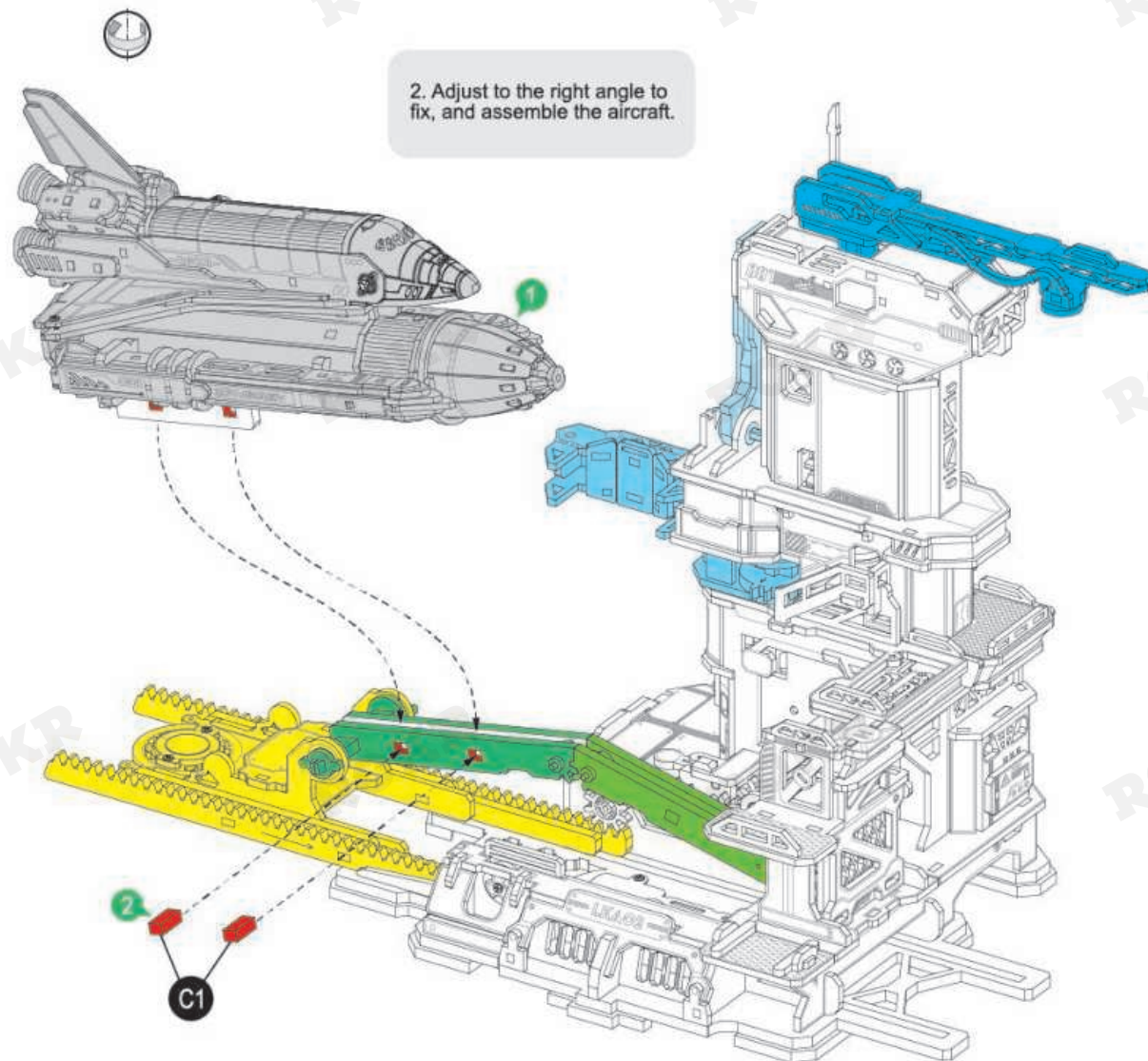


Switch on the main  
switch after connecting  
the power supply.

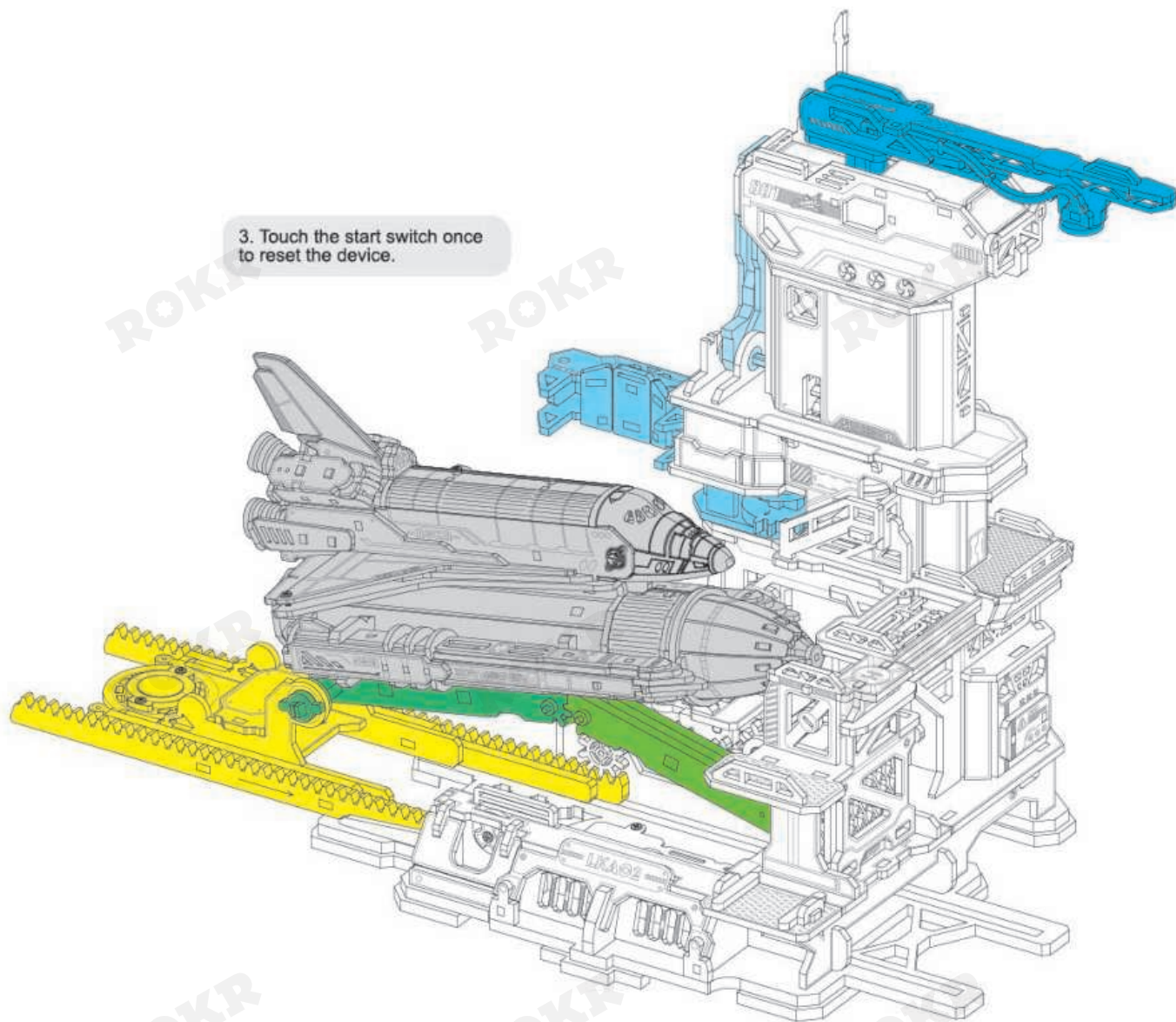
1. Touch the start switch  
once, the device runs;  
touch again to pause.



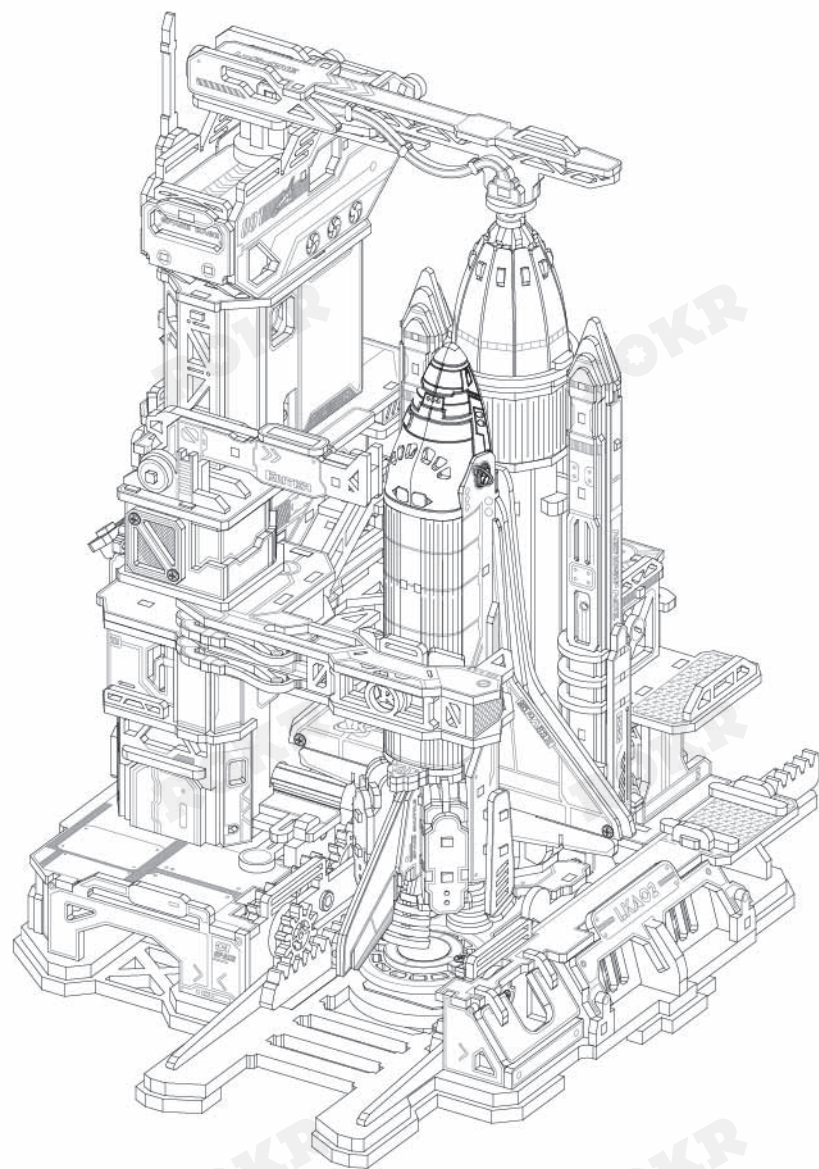




3. Touch the start switch once  
to reset the device.







Complete.

# ROKR



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