Start Building!

YANTRA ROBOTICS

Just Dance

GRAB A CONTROLLER!! Make your own game control with a built in TILT SENSOR that detects your movements. Move the controller to make your dancer spin!

Step 1
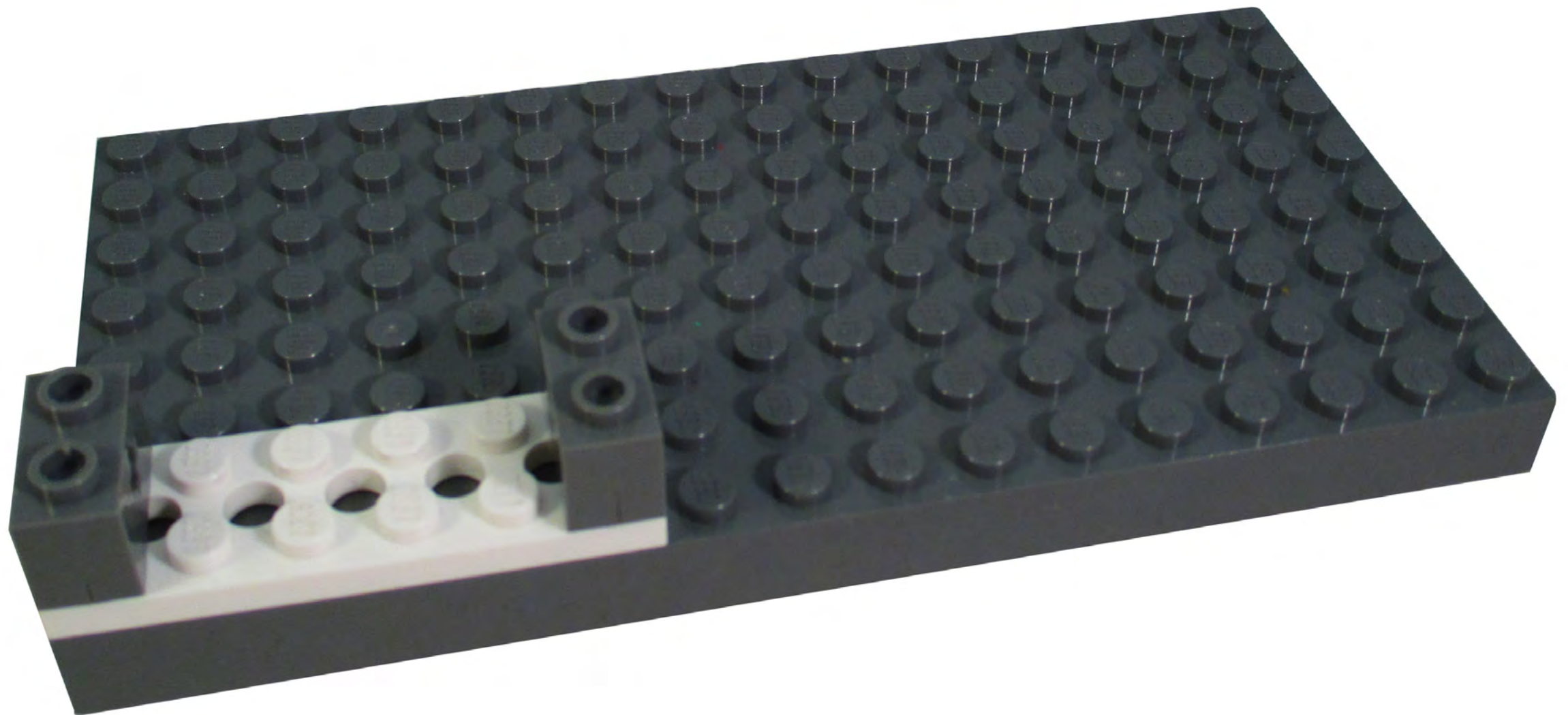
You will Need:

White 2x6 Plate

Grey 1x2 with Cross Hole
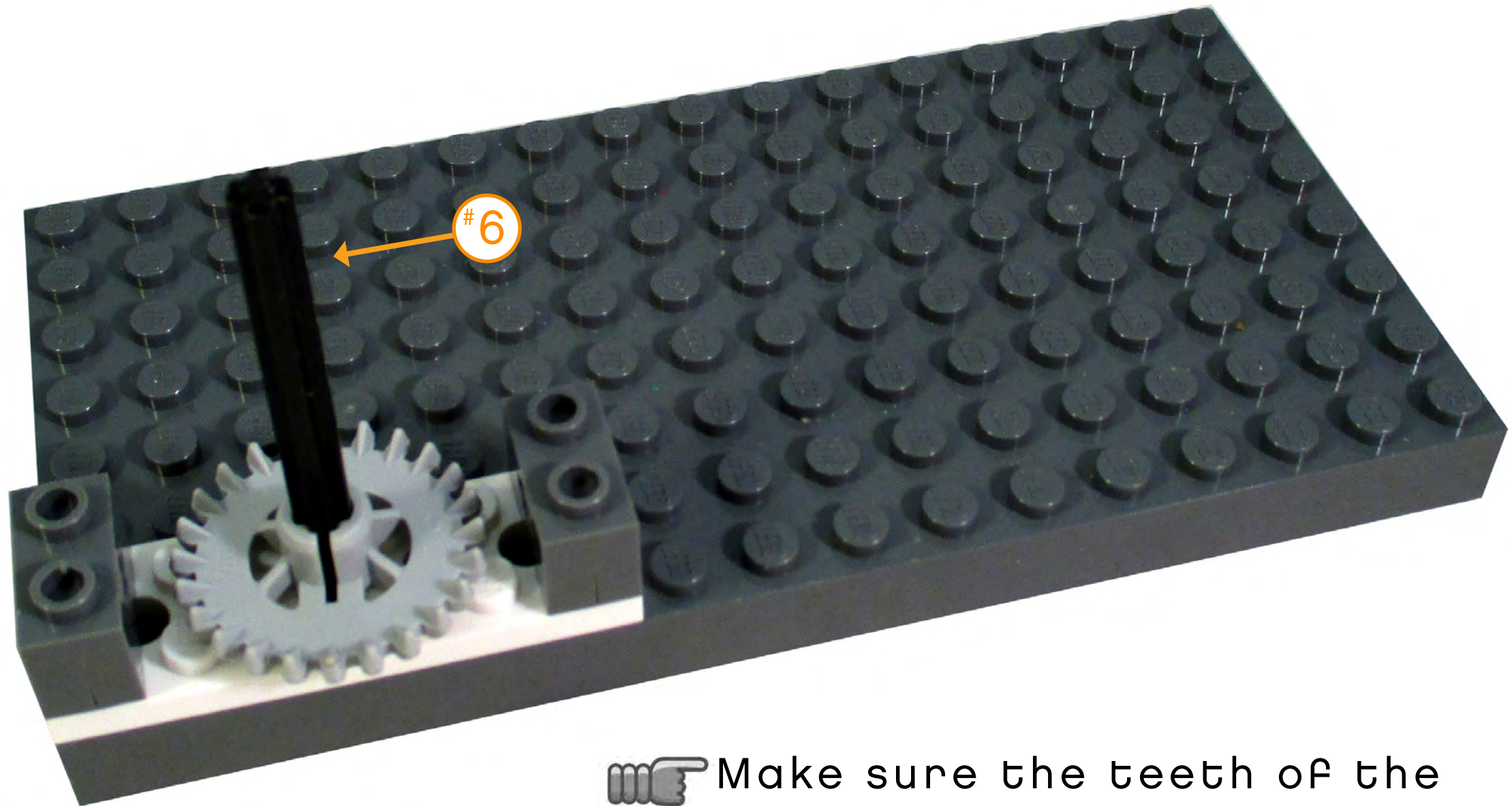
Grey 1x2 with Cross Hole

Grey 8x16 Brick

Step 2

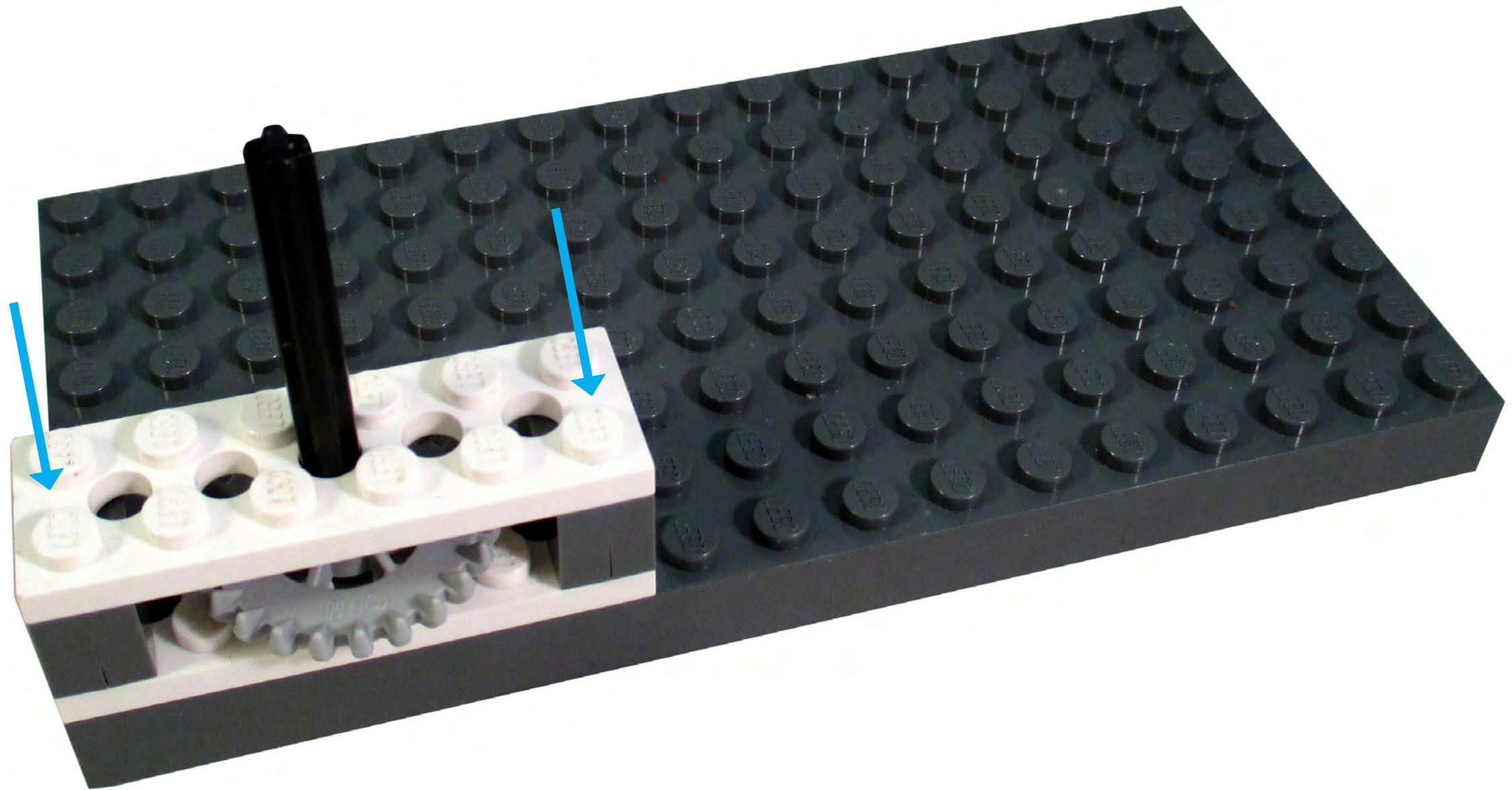You will Need:

#6 Axle   Crown Gear

#6

☞ Make sure the teeth of the Crown gear are pionting up!

Step 3

You will Need:

White 2x6
Plate

Step 4

You will Need:

Yellow 1x2
Brick

Yellow 1x2
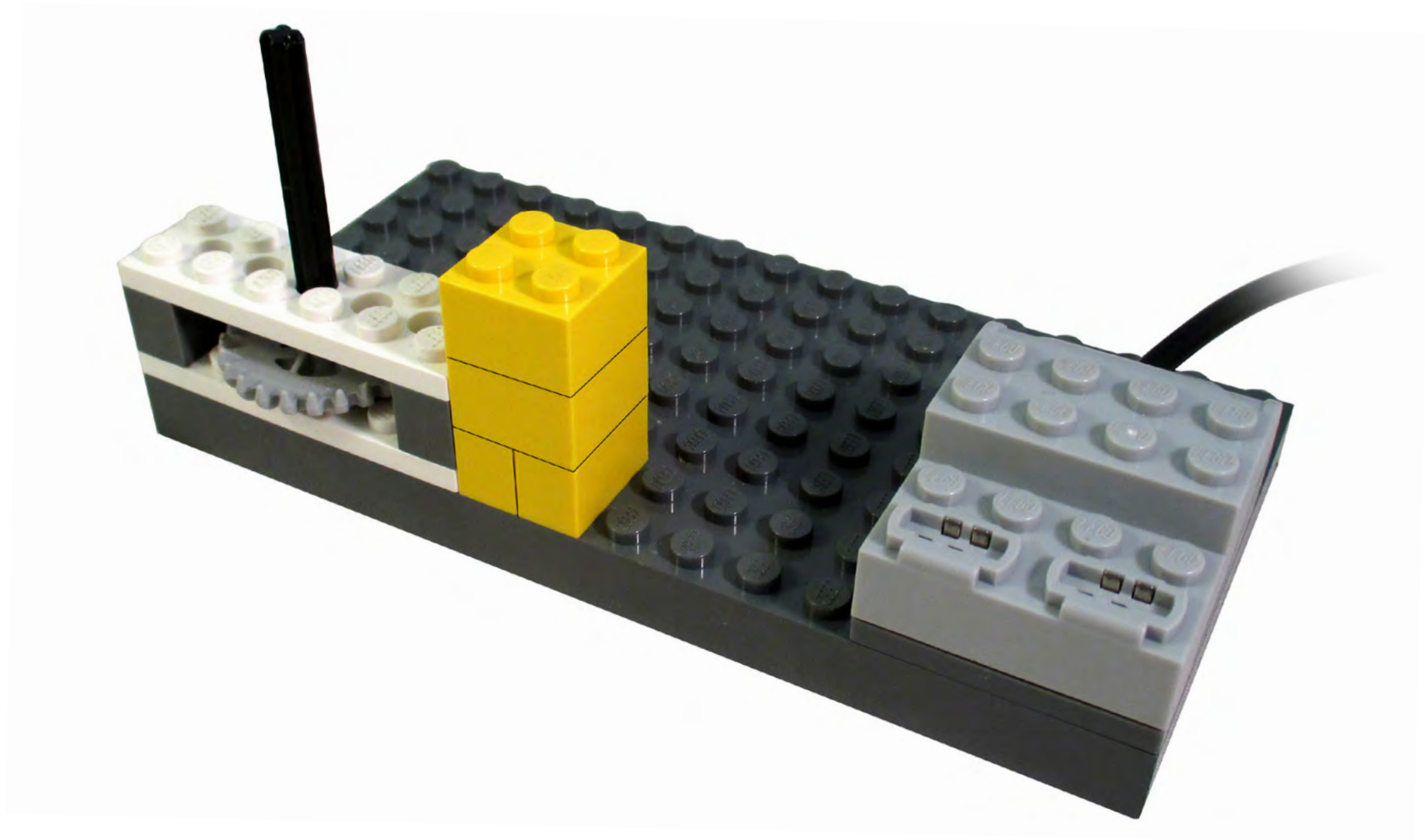Brick

Yellow 2x2
Brick
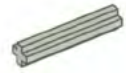
Yellow 2x2
Brick

Hub

Step 5

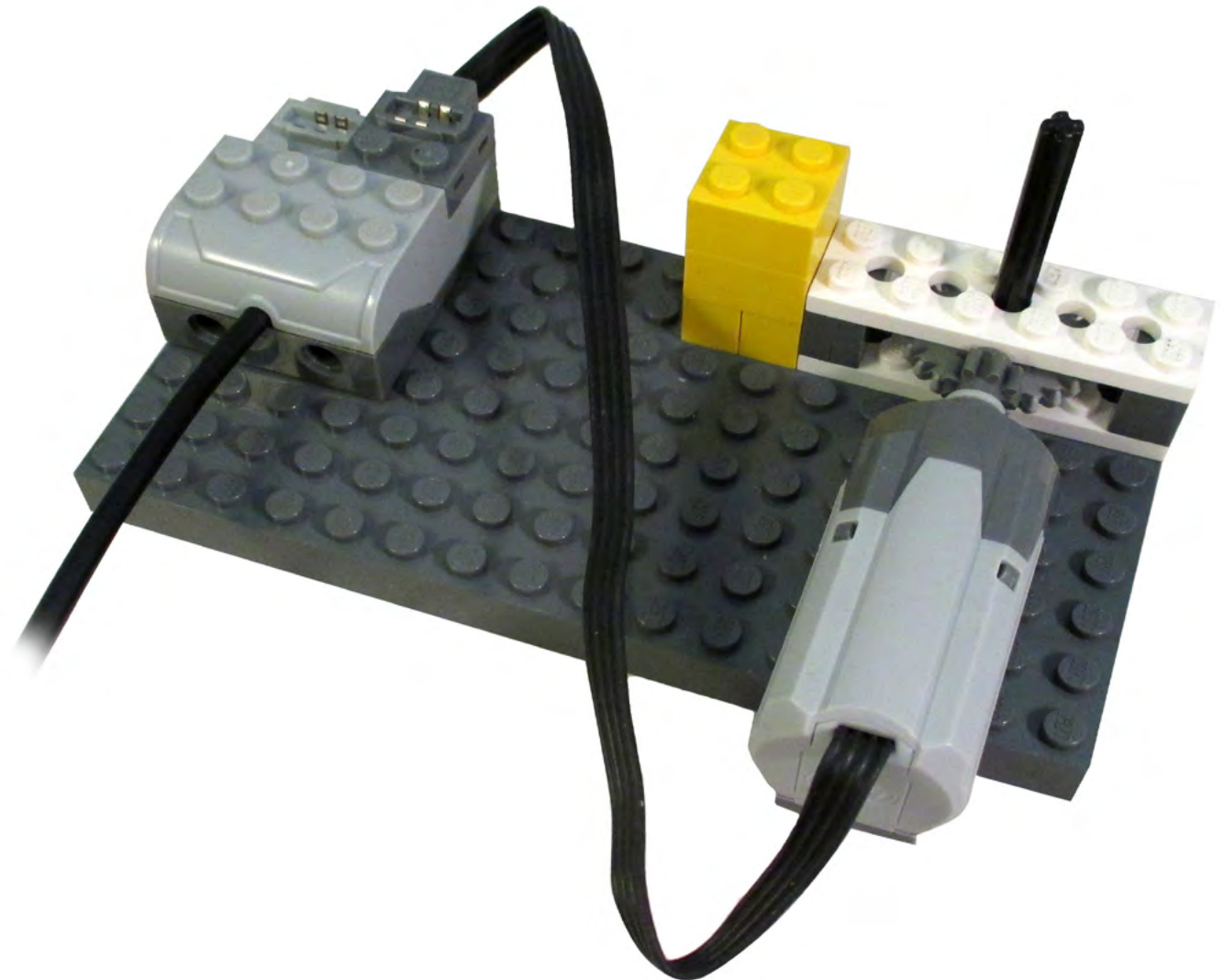You will Need:

#3 Axle   Pinion Gear   Bushing   Motor

a.

b.   👉 Make sure the gear's teath are meshed!

Step 6

You will Need:

White 2x8 Plate   White 2x8 Plate   White 2x8 Plate   White 2x8 Plate   White 1x8 Plate   White 1x8 Plate
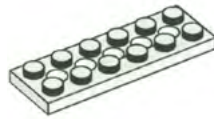
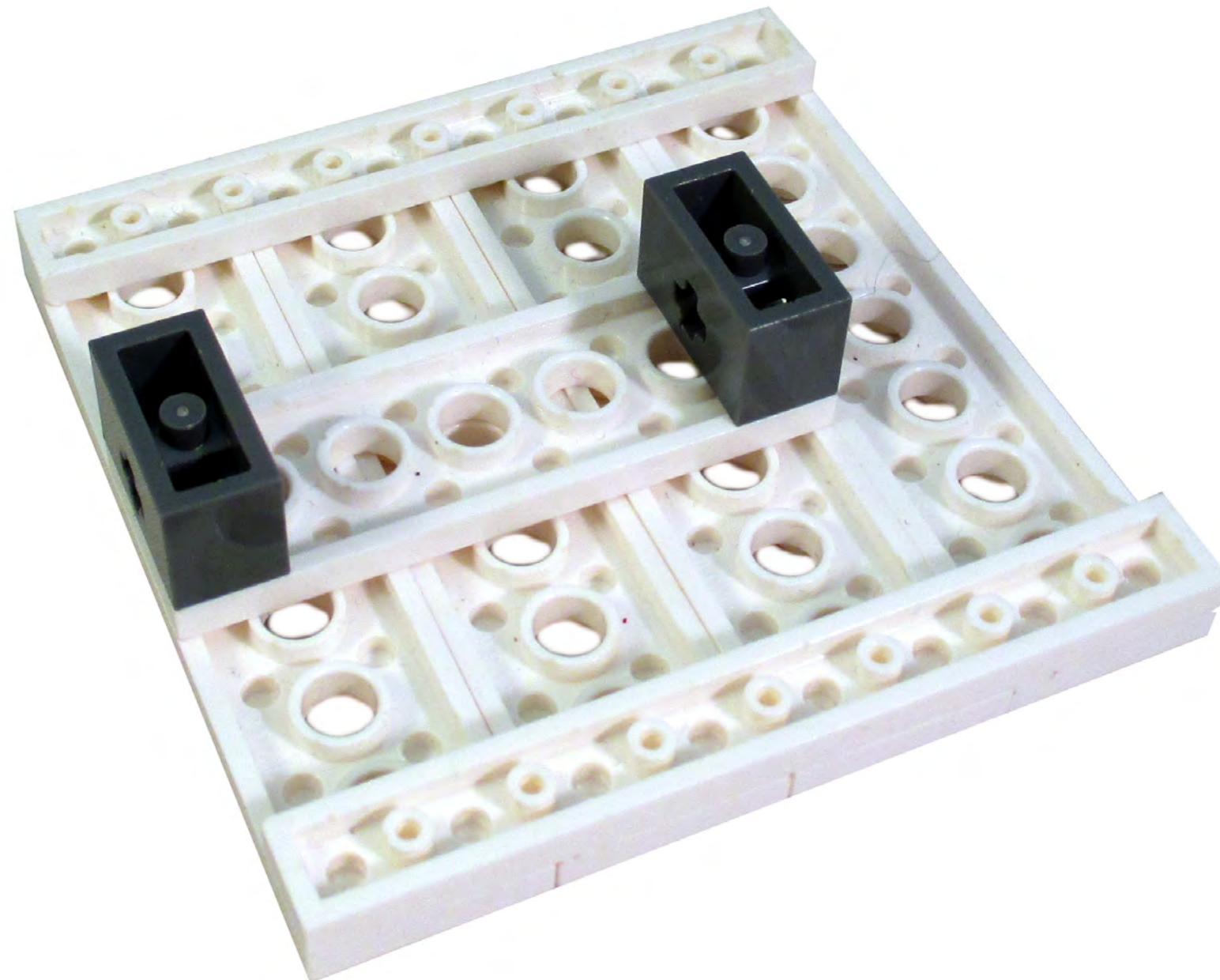# Step 7

You will Need:

Grey 1x2
with Cross
Hole

Grey 1x2
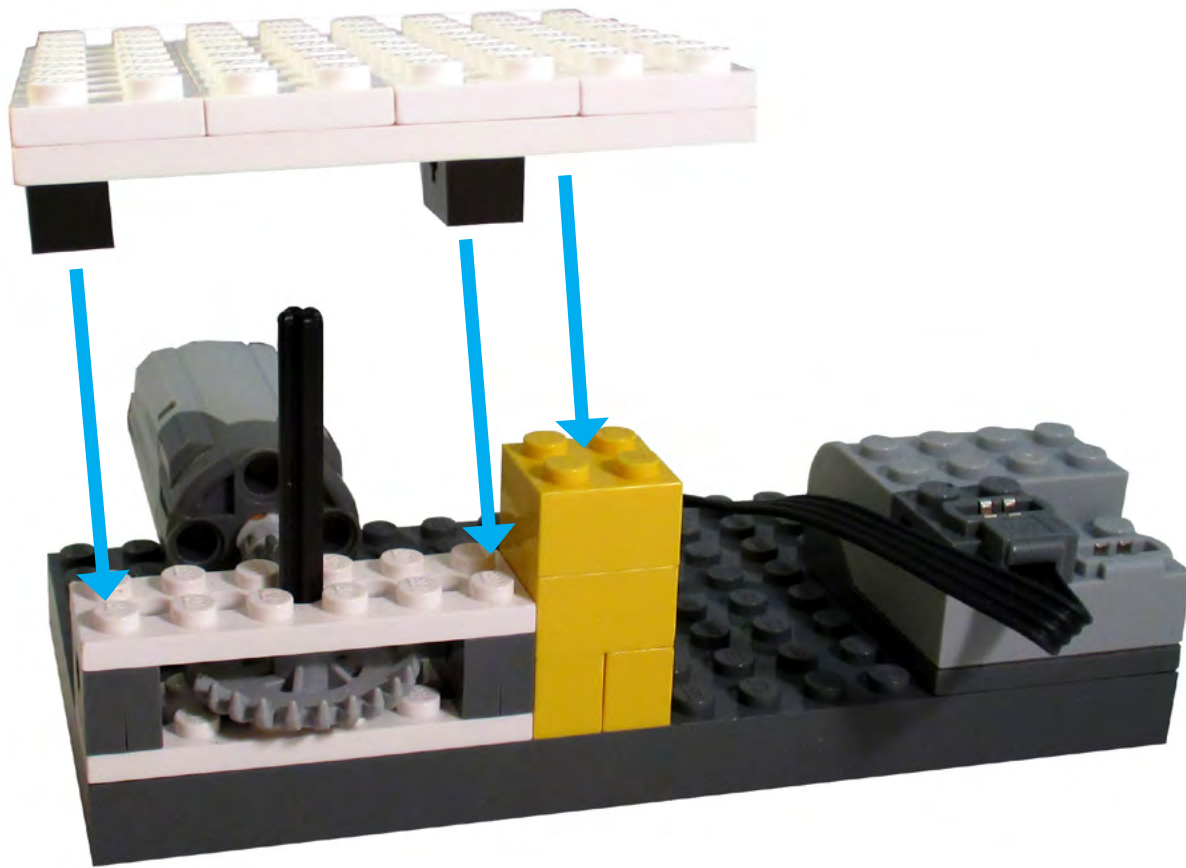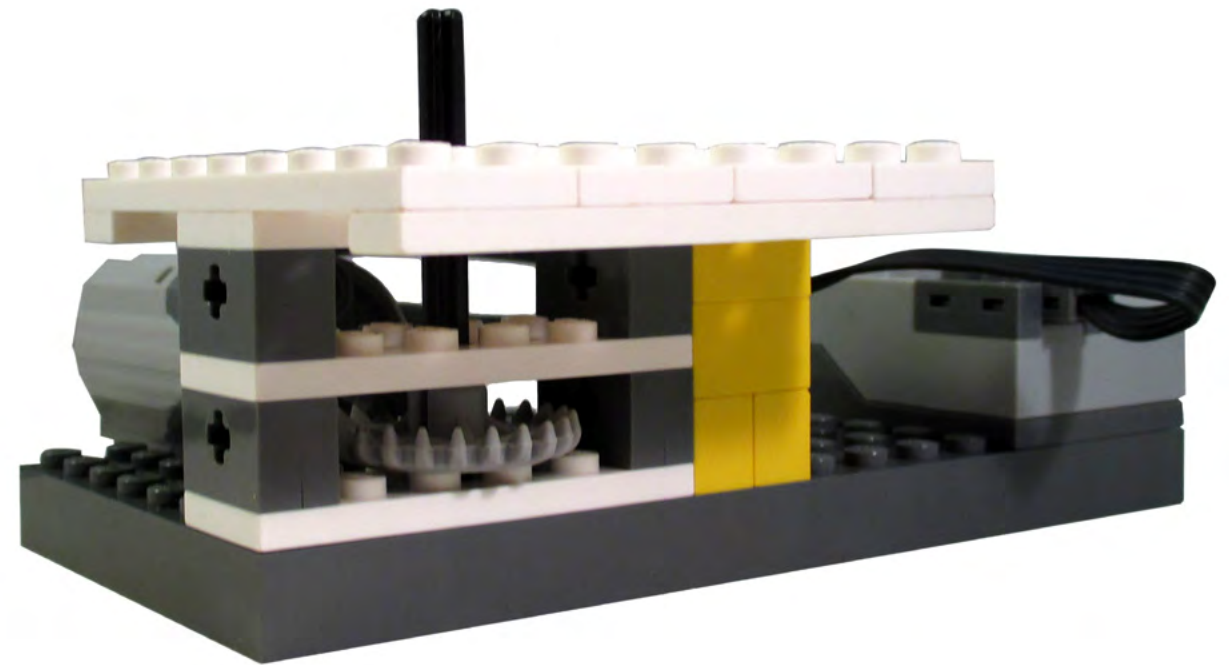with Cross
Hole

White 2x6
Plate

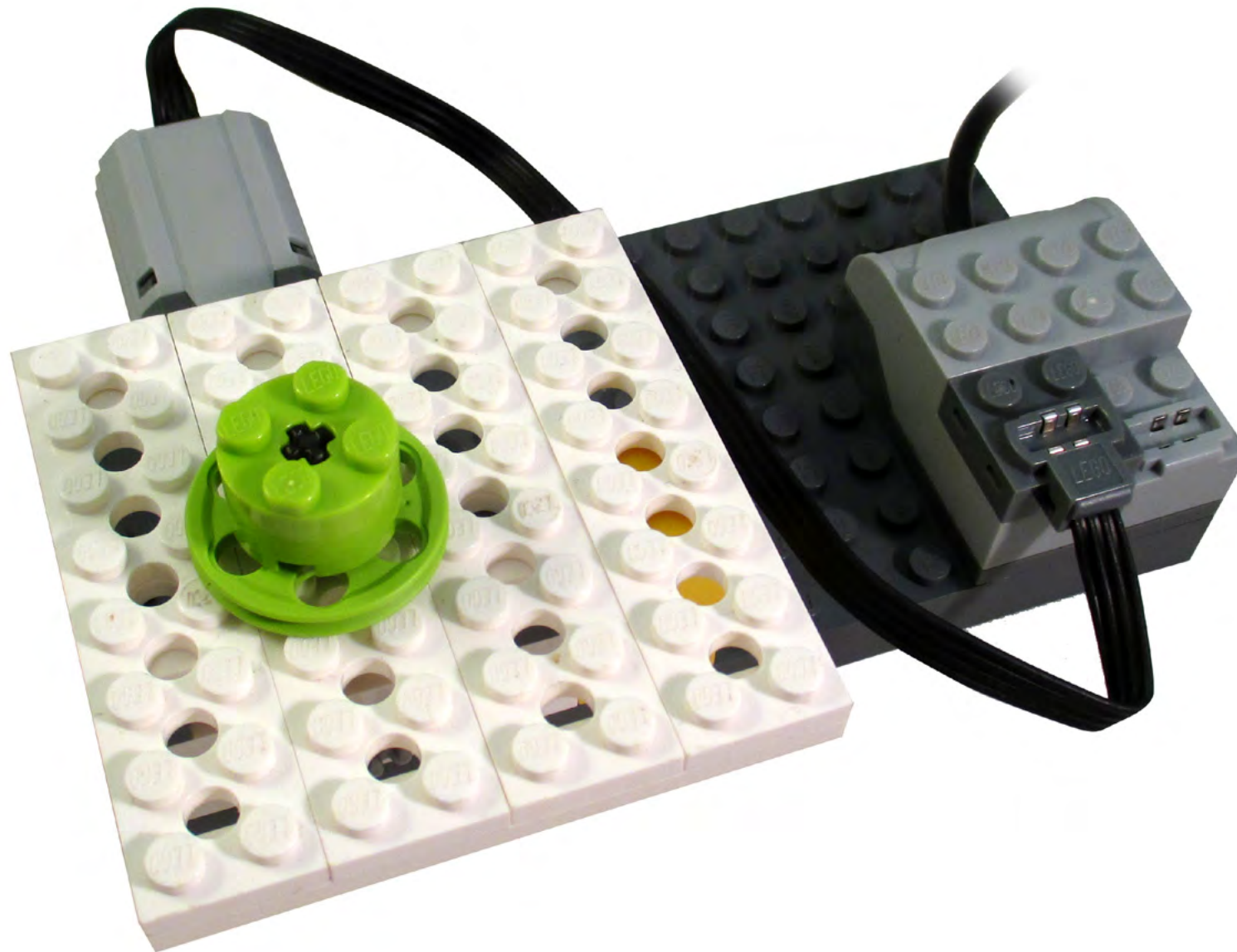# Step 8

👉 Attach the assembly!

a.

b.

Step 9

You will Need:

Green Wheel

Green Round Brick

Step 10

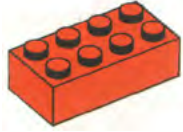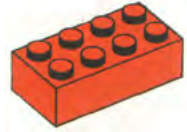## You will Need:

Red 1x2 with Hole
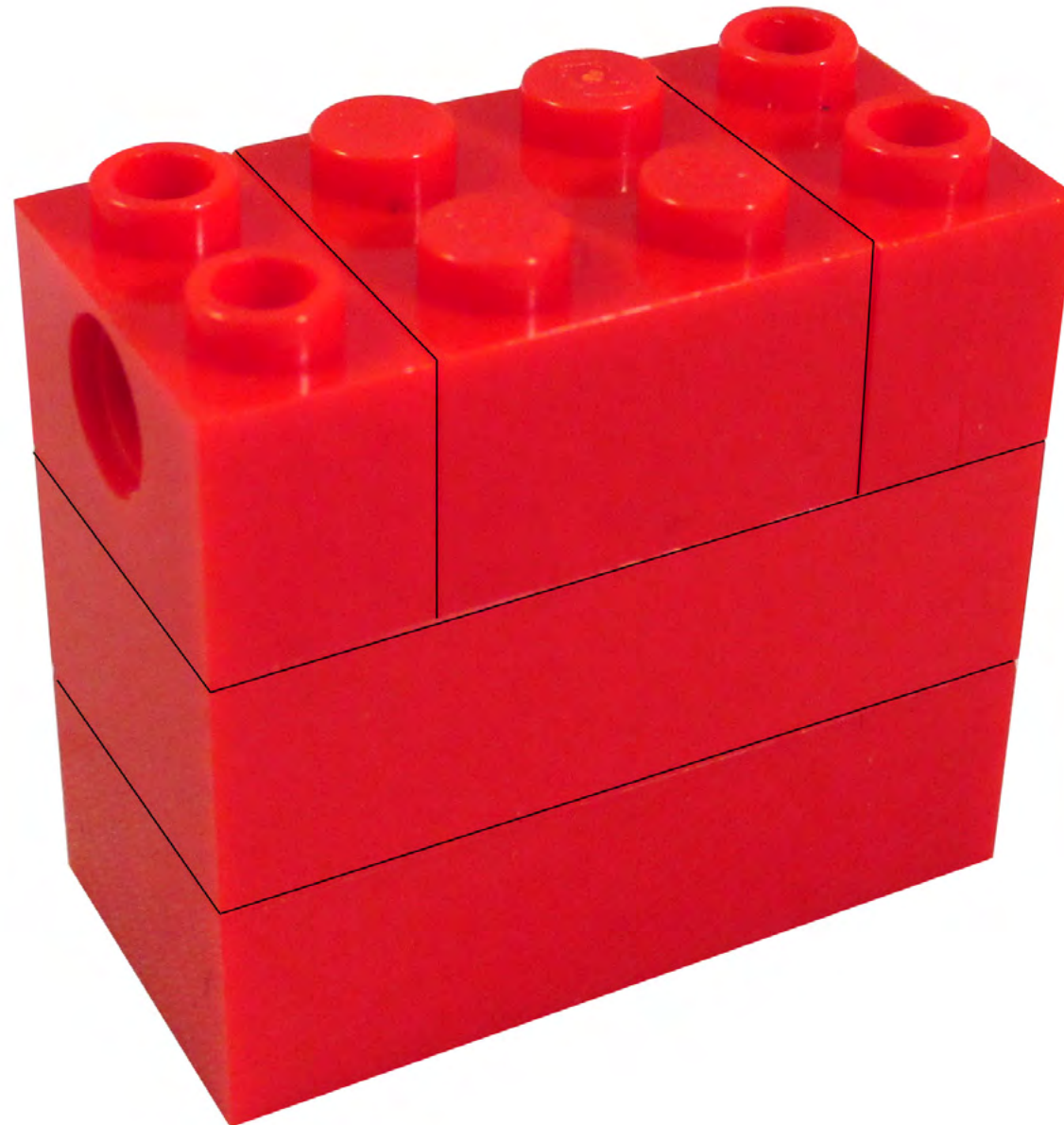
Red 1x2 with Hole

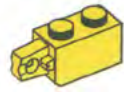Red 2x4 Brick

Red 2x4 Brick

Red 2x2 Brick

Step 11

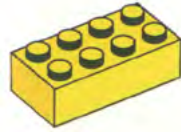## You will Need:

Yellow 1x2
with Stub

Yellow 1x2
with Stub

Yellow 2x2
Inverted
Wedge

Yellow 2x2
Inverted
Wedge
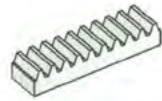
Yellow 2x4
Brick

Step 12

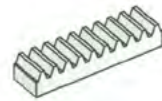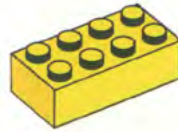## You will Need:

Eye

Eye

White
Toothed Plate

White
Toothed Plate

Yellow 2x4
Brick

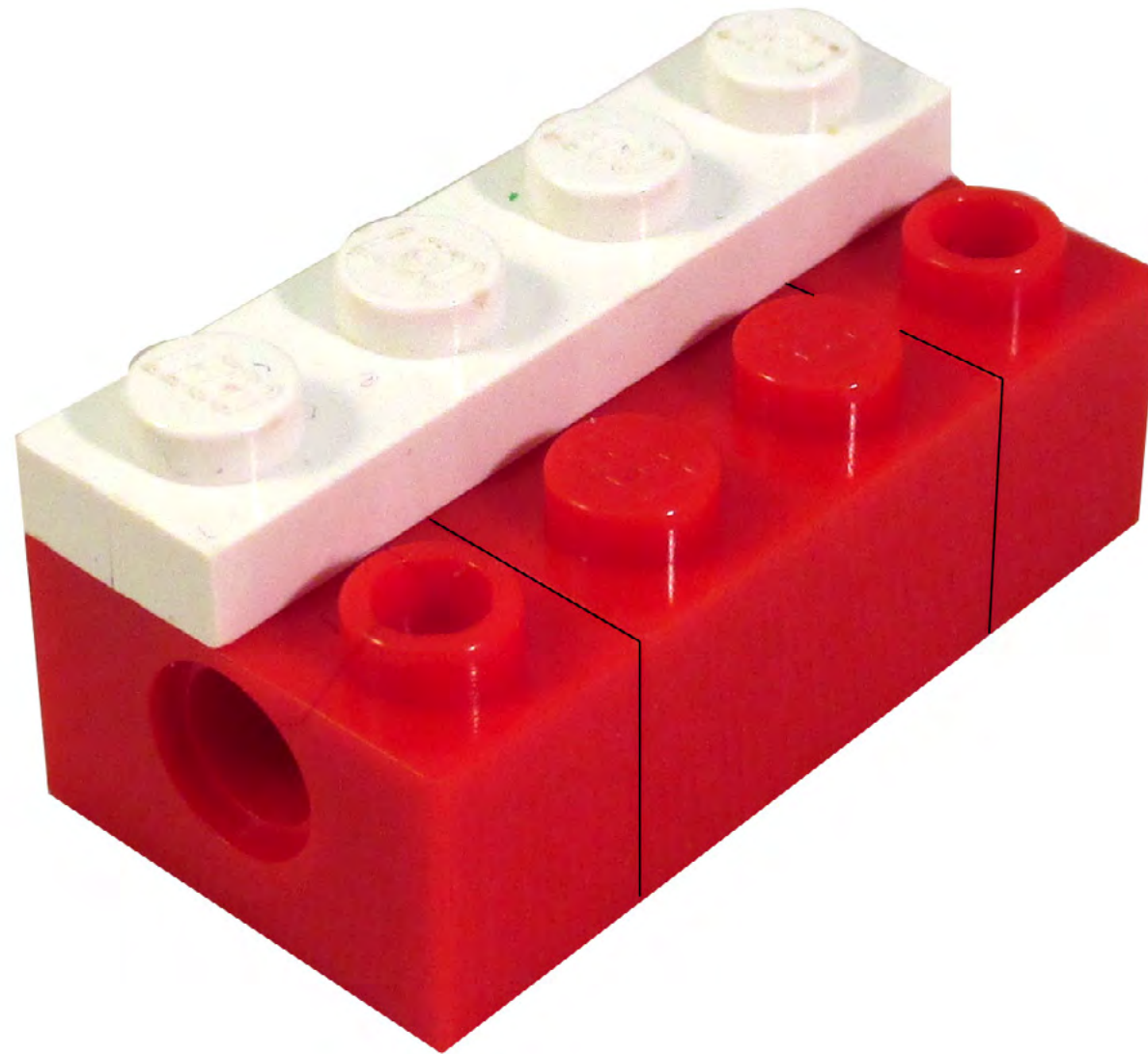# Step 13

You will Need:

White 1x4
Plate

Red 2x2
Brick

Red 1x2
with Hole

Red 1x2
with Hole

Step 14

You will Need:

White 1x4
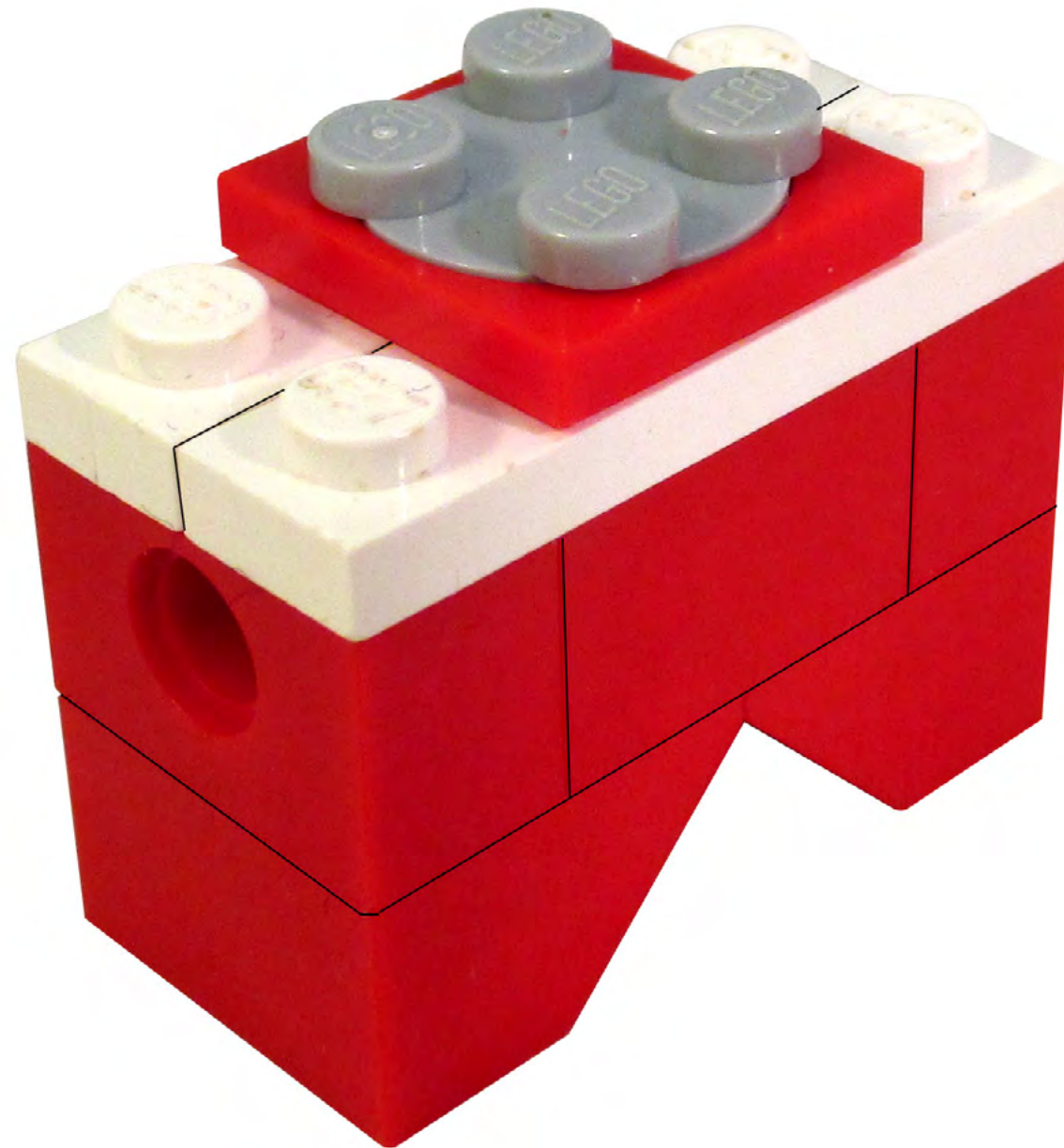Plate

Red Turn
Table

Step 15

You will Need:

Red 2x2
Inverted
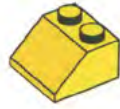Wedge

Red 2x2
Inverted
Wedge

Step 16

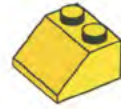## You will Need:

Red 1x2
with Hole

Red 1x2
with Hole

Yellow 2x2
Wedge

Yellow 2x2
Wedge

Step 17

You will Need:

Green Round
Brick

Red Disk

Step 18

👉 Attach the assemblies!

Step 19

You will Need:

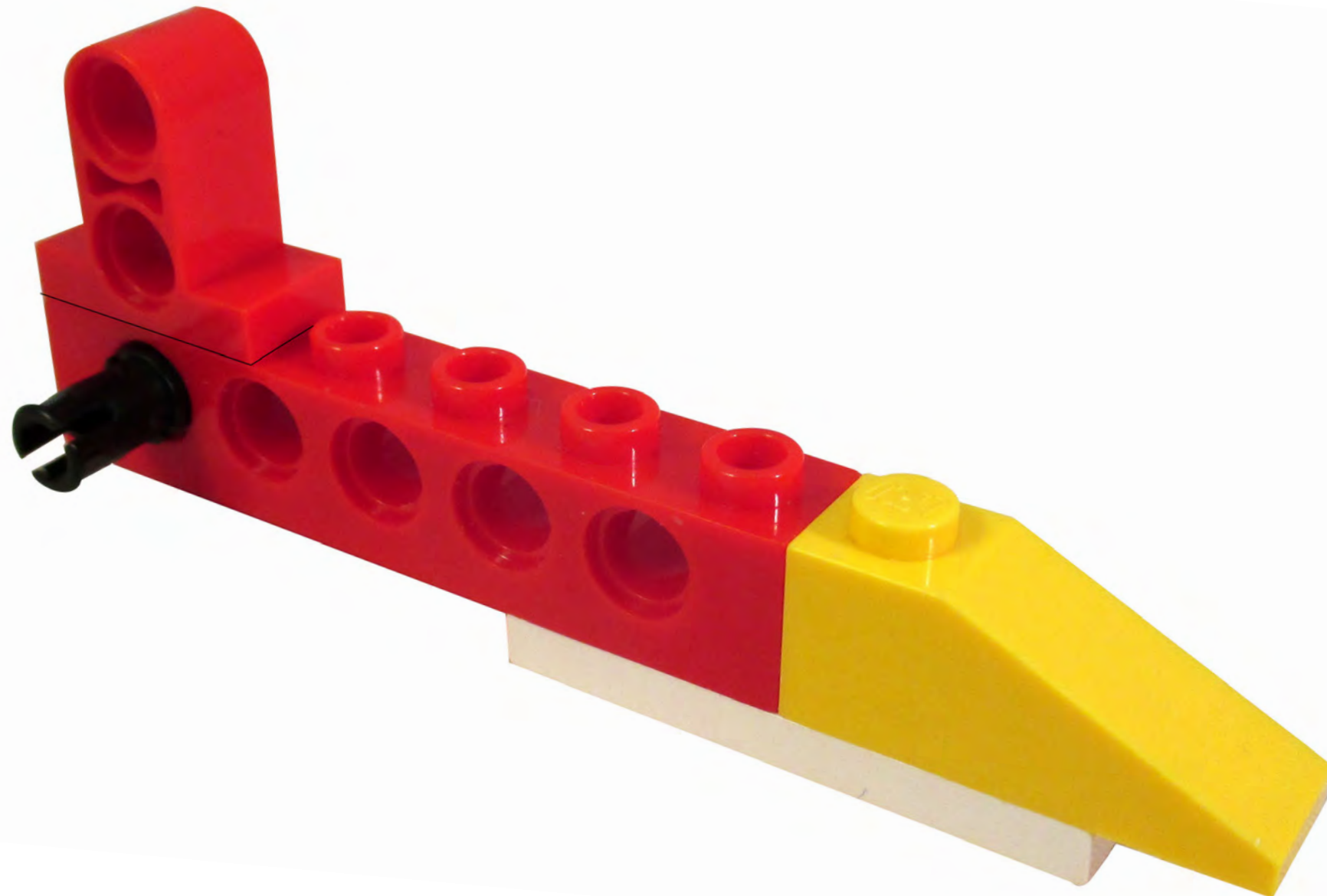Red 1x6 with Holes

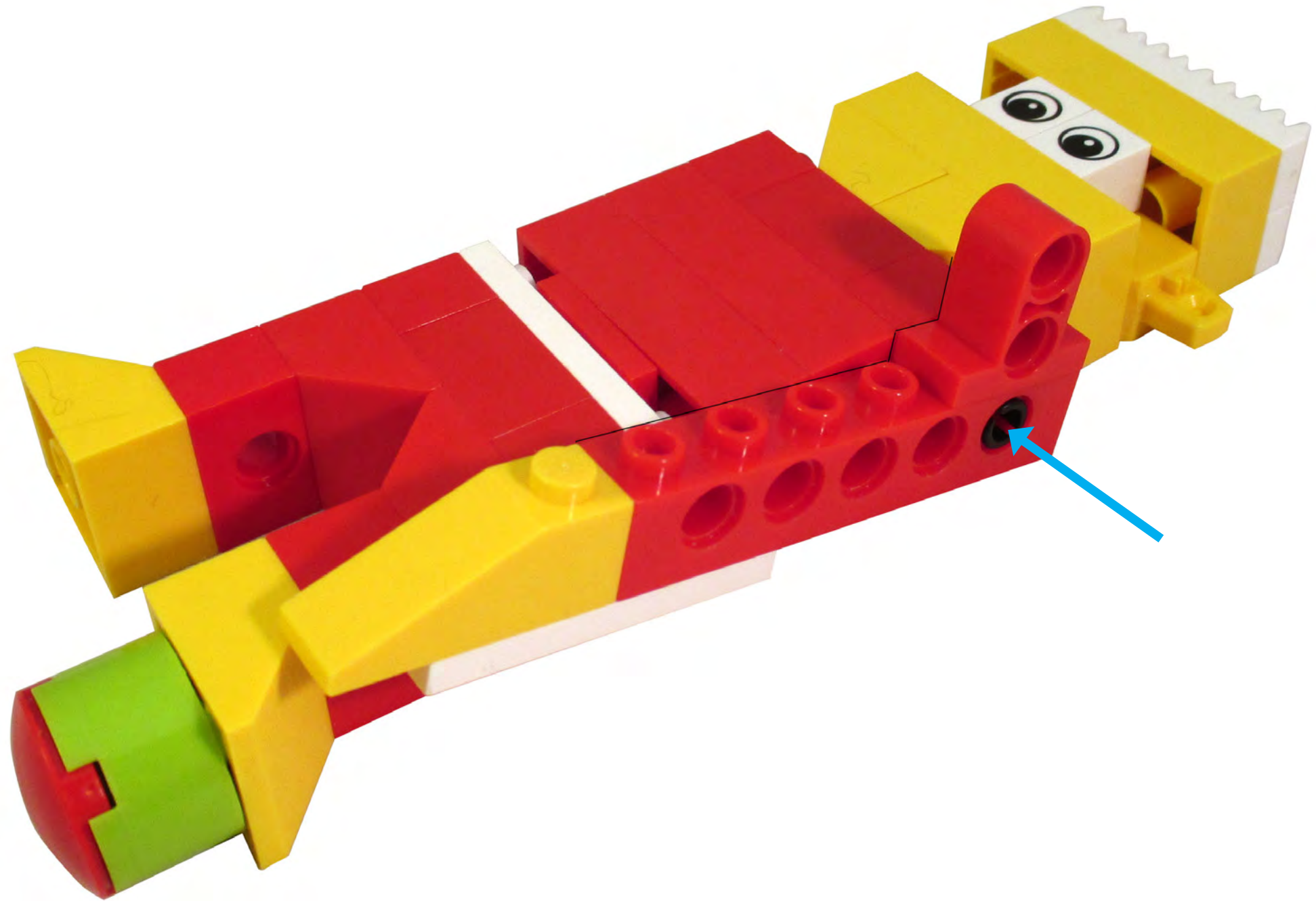Red T-Plate

White 1x4 Plate

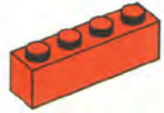Yellow 1x3 Wedge

Black Pin

Step 20

🖐👉 Attach!

Step 21
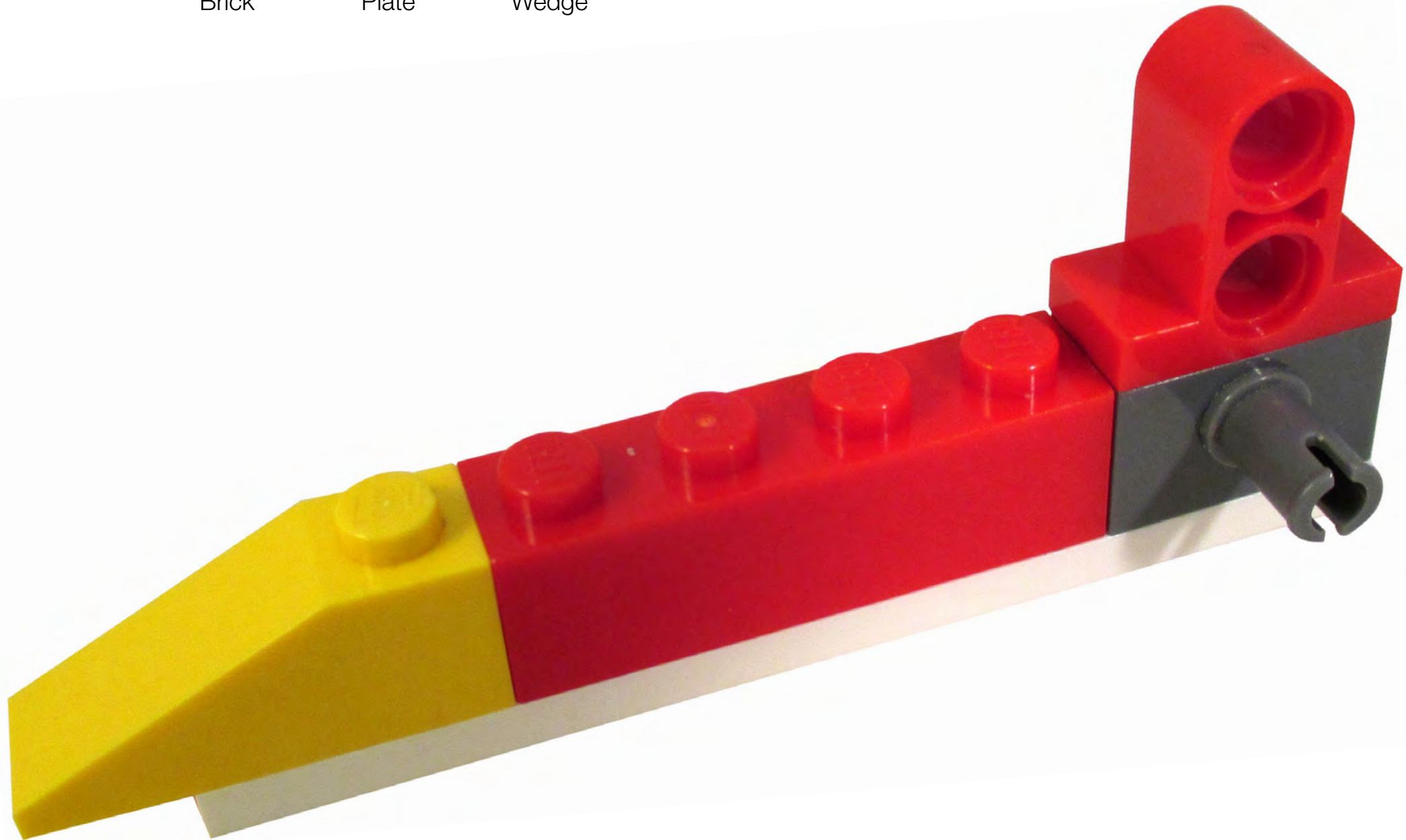
You will Need:

Grey Brick
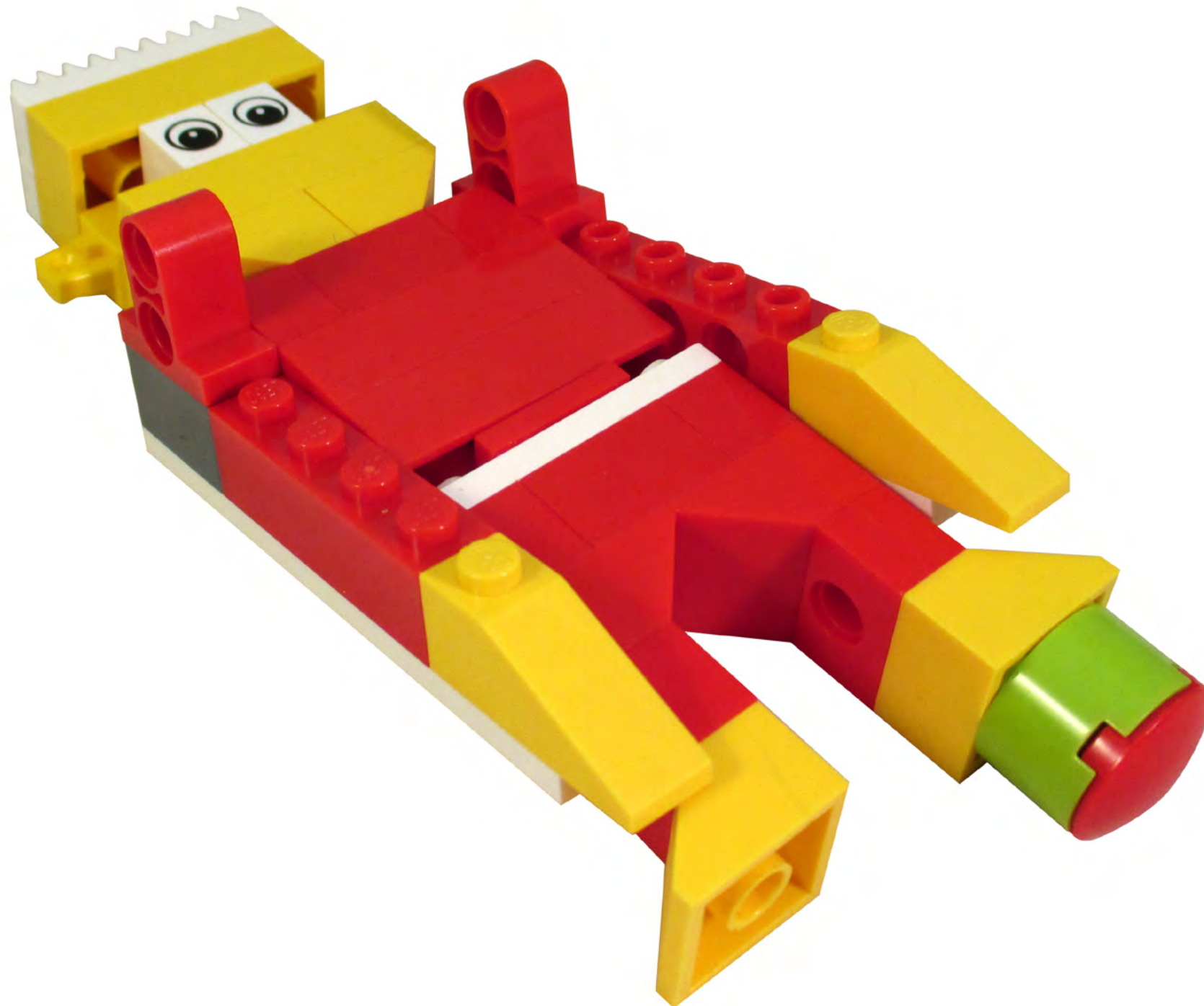with Pin

Red T-Plate

Red 1x4
Brick

White 1x8
Plate

Yellow 1x3
Wedge

Step 22

Step 23

Attach the assembly to the Green Round Brick!
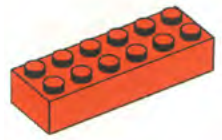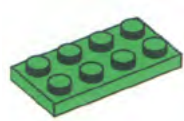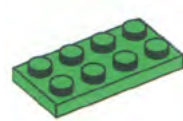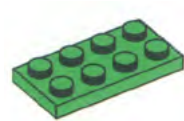
Step 24

You will Need:
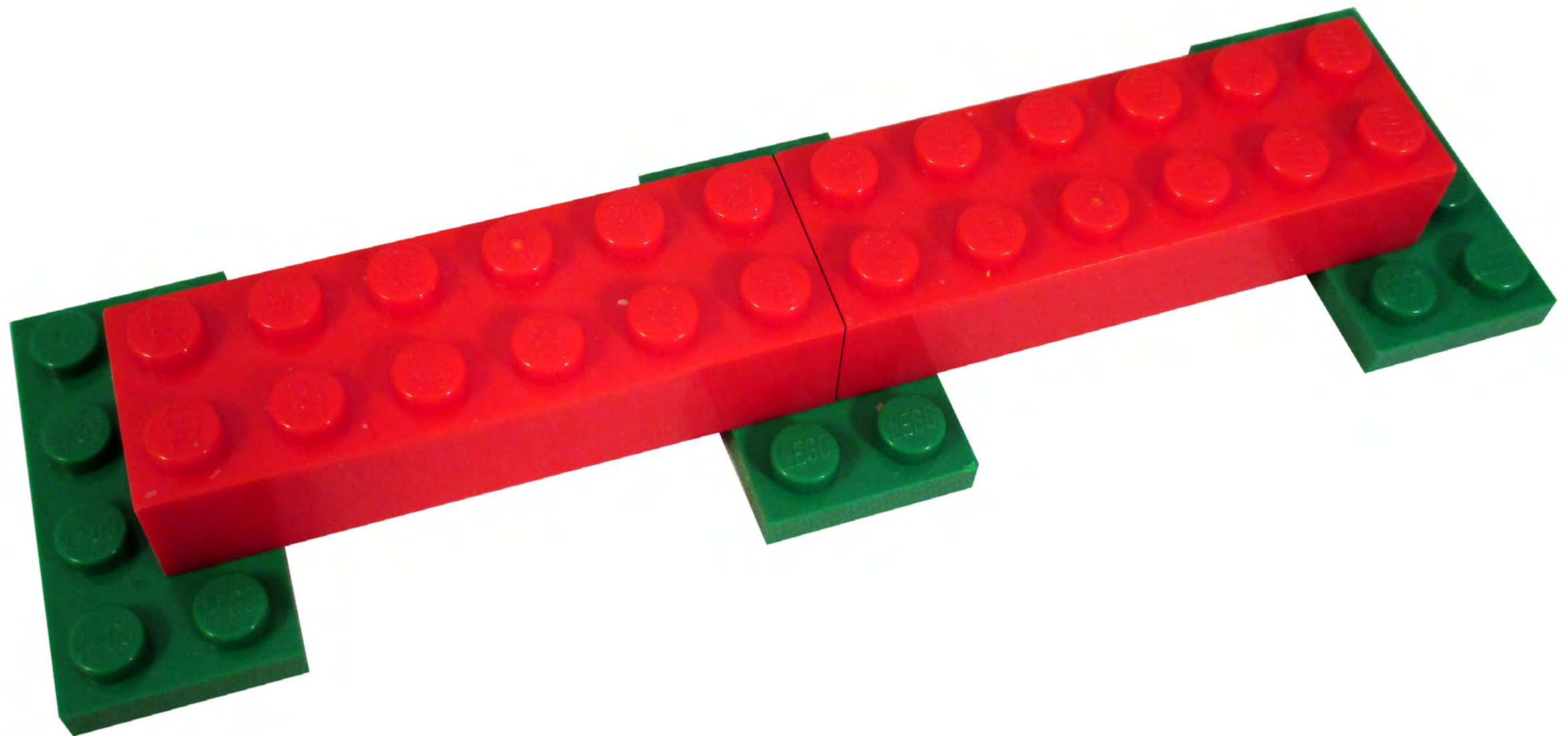
Red 2x6 Brick

Red 2x6 Brick

Green 2x4 Plate

Green 2x4 Plate

Green 2x4 Plate

Step 25

You will Need:

Red 2x2
Wedge
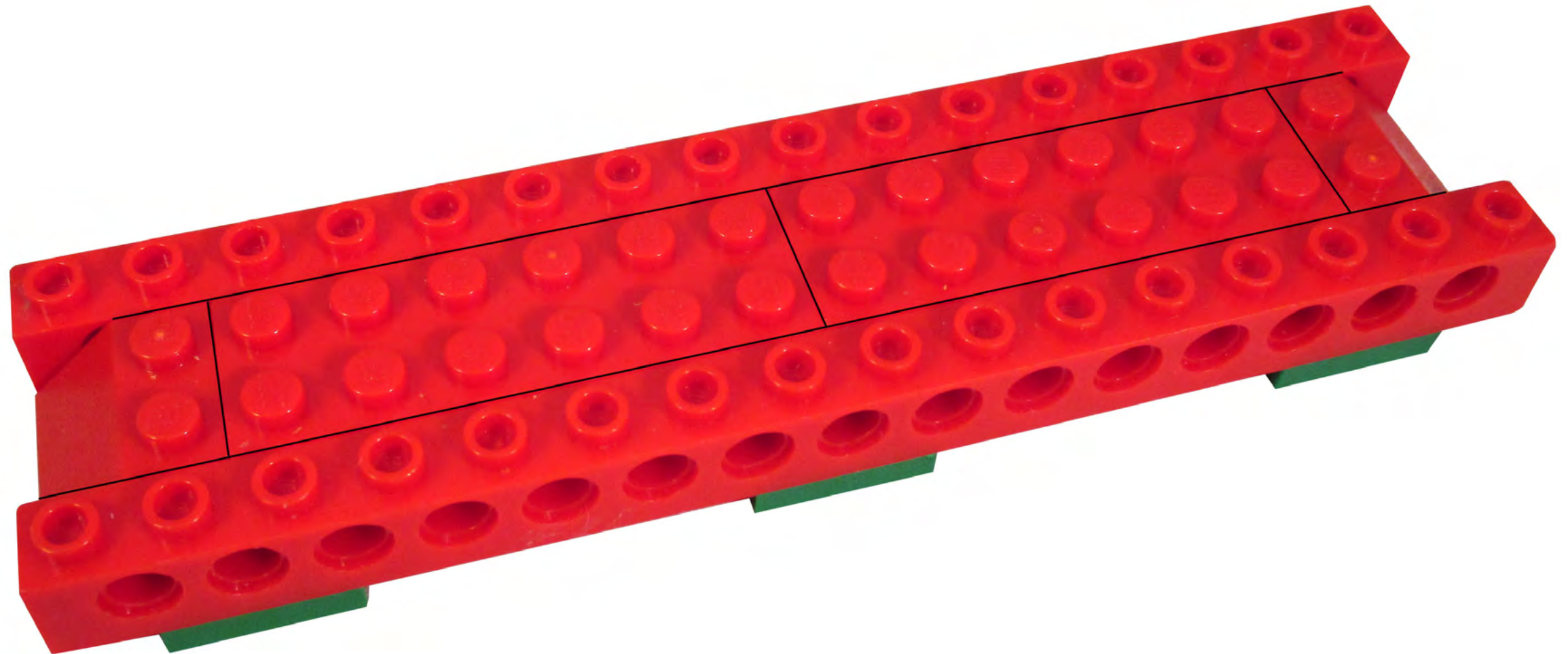
Red 2x2
Wedge

Red 1x16
with Holes

Red 1x16
with Holes

Step 26

You will Need:

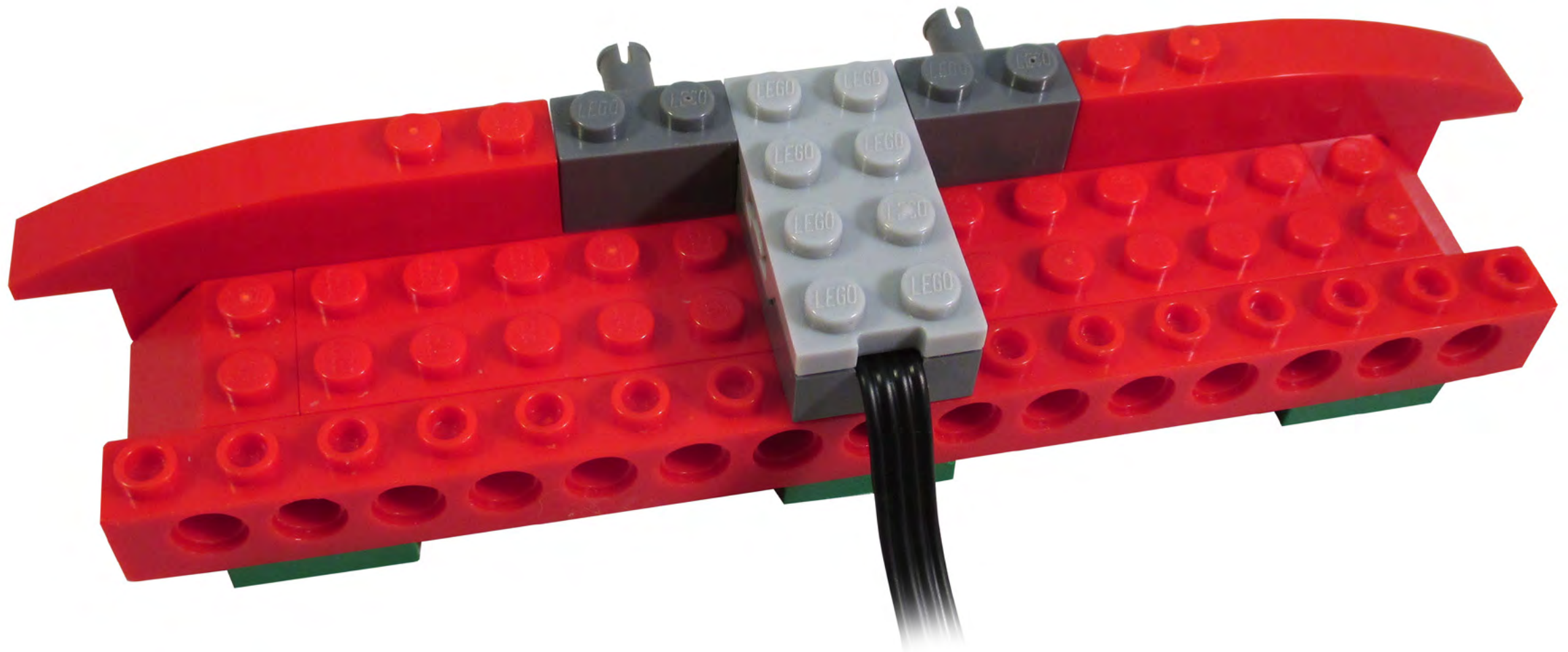Grey 1x2 with Pin   Grey 1x2 with Pin   Red Bow   Red Bow   Tilt Sensor
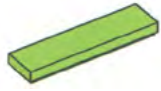

☞ Plug the Tilt Sensor into the Hub!

Step 27

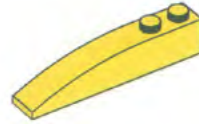You will Need:

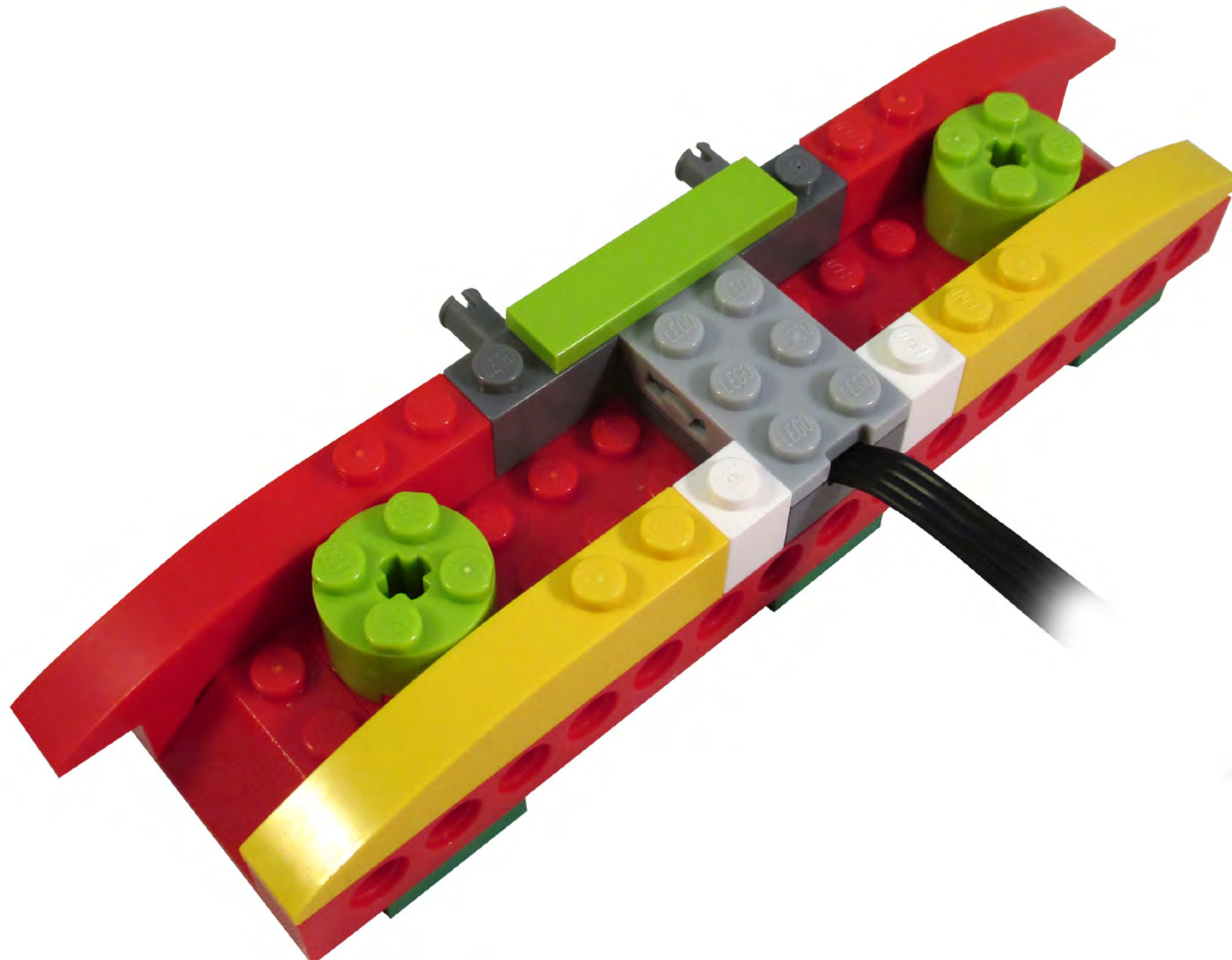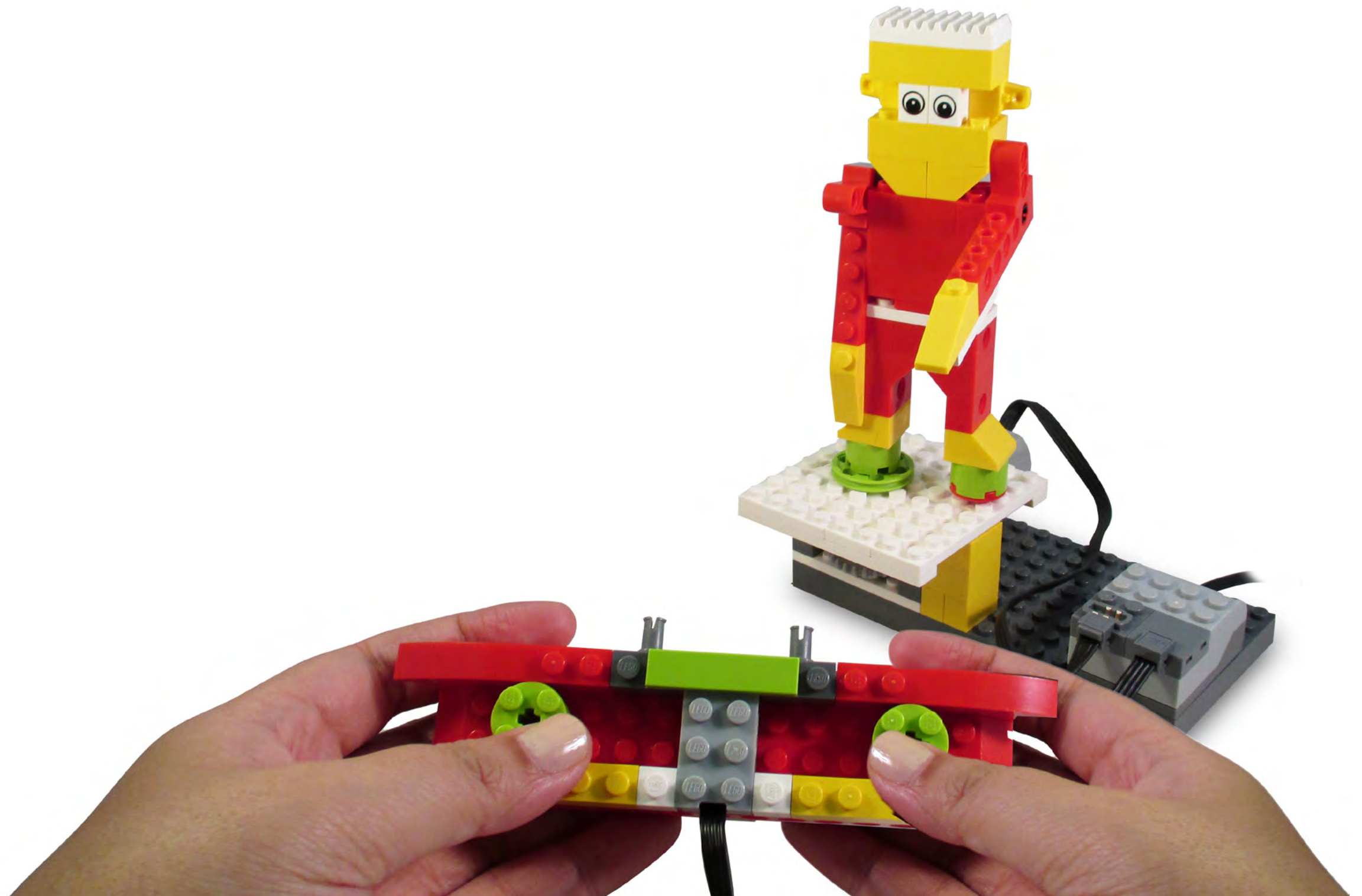| Green Flat Tile | Green Round Brick | Green Round Brick | Eye | Eye | Yellow Bow | Yellow Bow |

Just Dance is Built!...
Time to Program it!

Programming

These progams change the Motor direction
depending on which way the Tilt Sensor is tilted.

right

Start on Key   Wait For   Motor Power   Motor That   Repeat
                Tlt Sensor   Way

left

Start on Key   Wait For   Motor Power   Motor This   Repeat
                Tlt Sensor   Way

1. Minimize these instructions and open the LEGO® WeDo® software.
2. Program your robot with the program above.
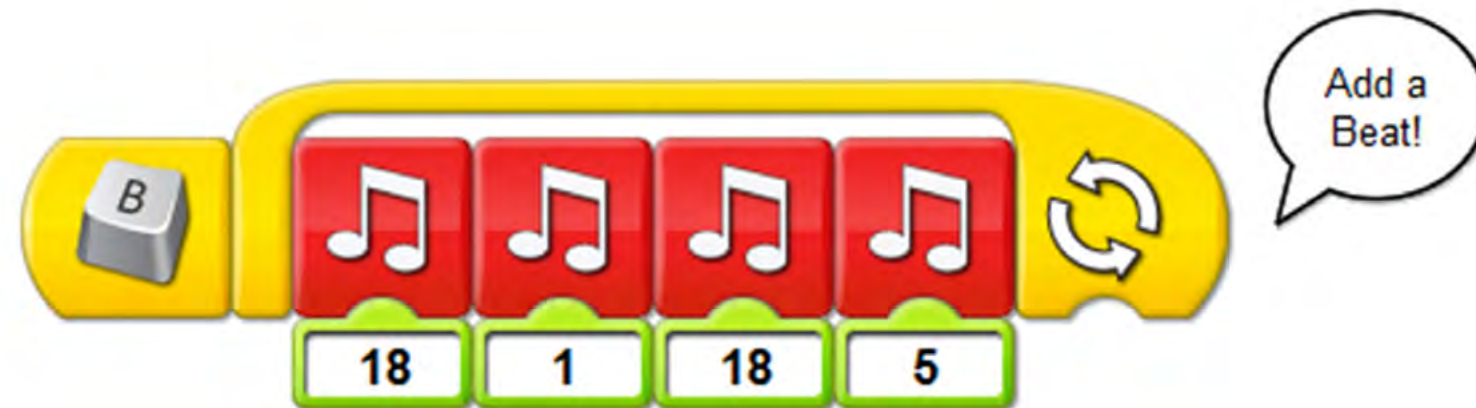3. If you finish, open the instructions and continue to the extension activities!

Extension 1

Add additional Tilt sensor programs.
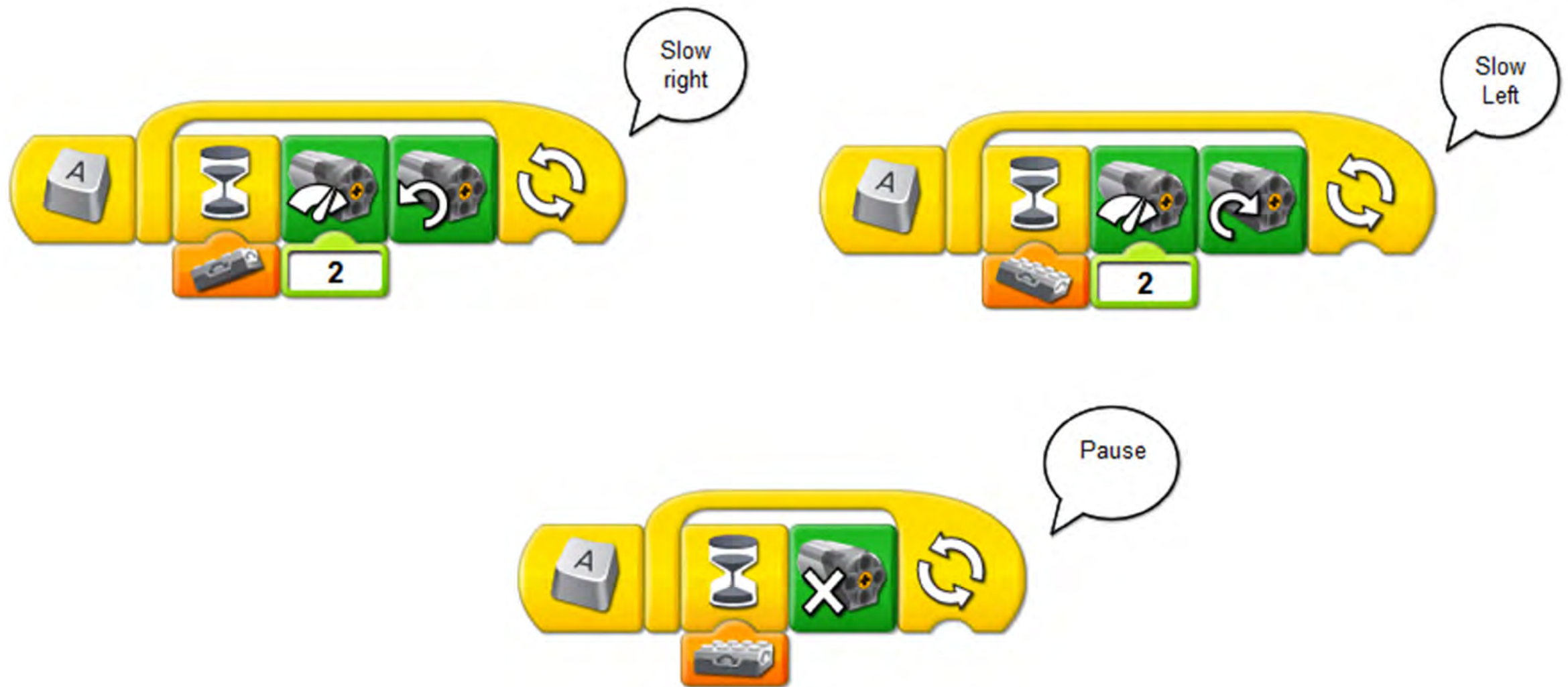
Extension 2

This program adds a beat for you to play to.

Extension 3

This program displays dance instructions on the screen for you to follow.

Display Dance Instructions!

YANTRA ROBOTICS