



Build the

C57

Steam
Locomotive

Pack 05



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Warning: Not suitable for children under the age of 14. This product is not a toy and is not designed or intended for use in play. Items may vary from those shown.

The leading truck 3

Your parts

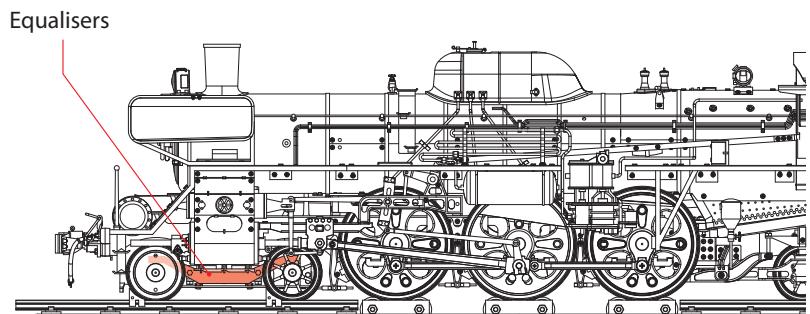


Equaliser (outer) x 2
 Equaliser (inner) x 2
 Leaf springs x 2
 Hanging links x 4
 Nuts (M2) x 4
 Screws (2 x 10mm) x 3
 Hex head screws (2 x 8mm) x 5

Tools

Phillips screwdriver
 Pliers
 PVA glue
 Socket wrench

Where your parts fit



1

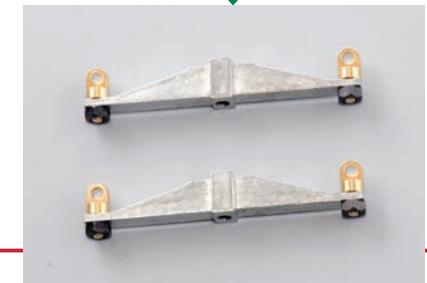


Lay out a leaf spring, two hanging links and two nuts, as shown.



Pass the threaded part of the link through the hole in the leaf spring, and tighten a nut onto it.

Repeat this process to create two sets, as shown.

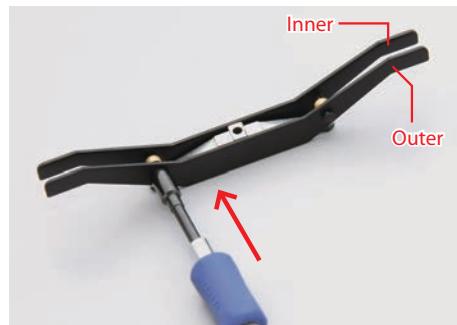


2

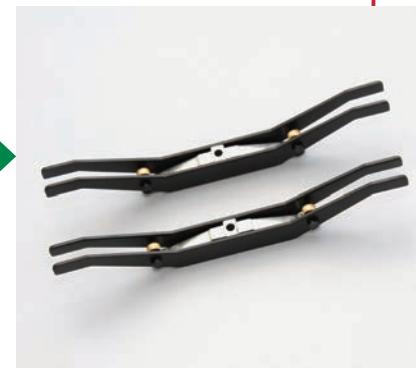
The holes in the outer and inner equalisers are different, as shown above.



Place one of the leaf springs between an inner and an outer equaliser, along with two $2 \times 8\text{mm}$ hex head screws.

3

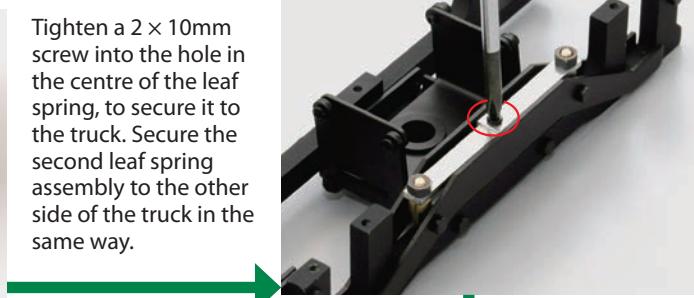
Place the equalisers on either side of the leaf spring. Tighten a hex head screw through the aligned holes of the outer equaliser, the links and the inner equaliser.



Make a second set.

4

Place the assembly over the side frame of the leading truck, with the equalisers either side of the frame.



Tighten a $2 \times 10\text{mm}$ screw into the hole in the centre of the leaf spring, to secure it to the truck. Secure the second leaf spring assembly to the other side of the truck in the same way.



Loosen the hex head screws slightly and then apply some PVA glue to the ends of them.

Complete



The leading truck 4

Your parts

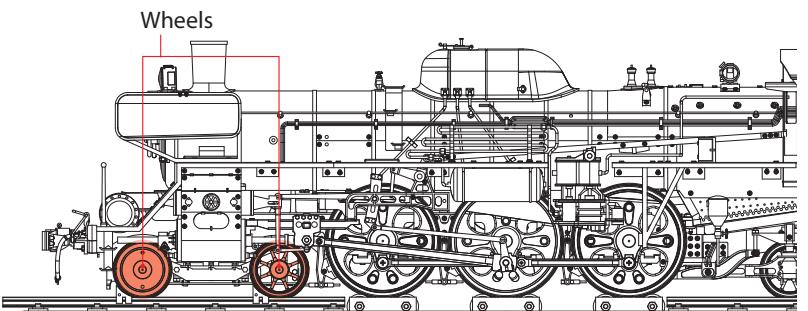


Leading wheel A
Leading wheel B (spoked)

Tools

Phillips screwdriver
Flat head driver

Where your parts fit



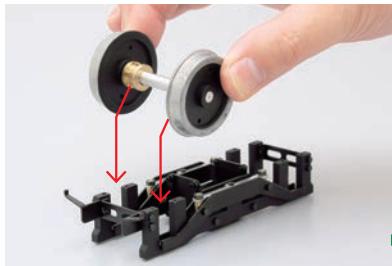
1



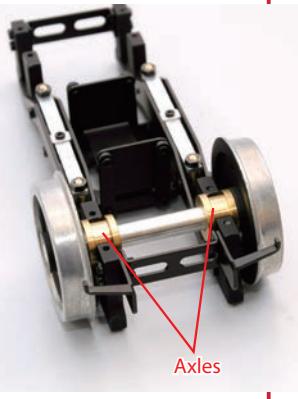
As well as the two leading wheels from this stage, you will also need the leading truck, as well as the side stays, washers, centre pin and 2 x 4mm screws from Stage 28.



Make sure that when you are fitting the wheels of the leading truck that you have the spoked wheels at the rear (above left).

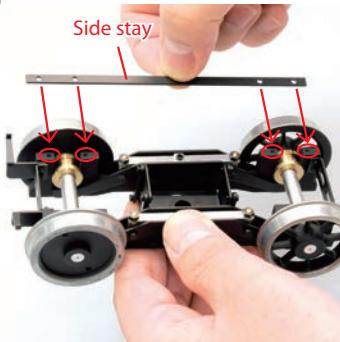
2

Place the leading truck upside-down and lower the first leading wheels into the U-shaped area just behind the guard irons.



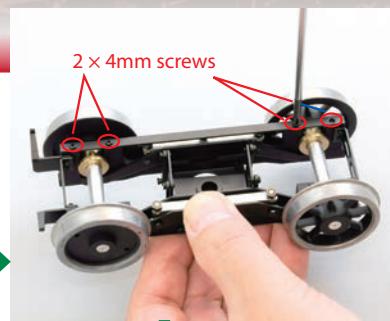
Position the two axles properly in the frames.

Fit the second leading wheel into the U-shaped area at the rear of the truck in the same way as the first wheels.

**3**

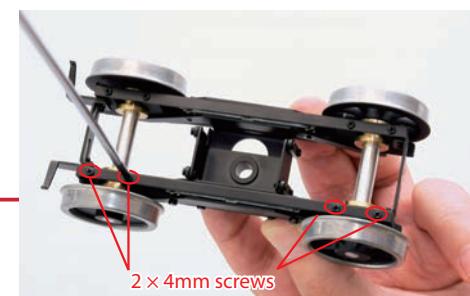
Side stay

Tighten a 2 x 4mm screw (Stage 28) into each of the holes.



2 x 4mm screws

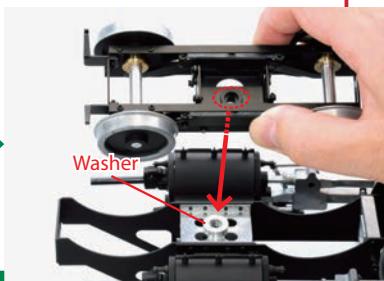
Fit another side stay to the other side of the truck with four more 2 x 4mm screws.



2 x 4mm screws

4

Place a washer (Stage 28) over the hole in the centre of the truck support.



Washer

Align the hole in the centre of the leading truck with the hole in the truck support.

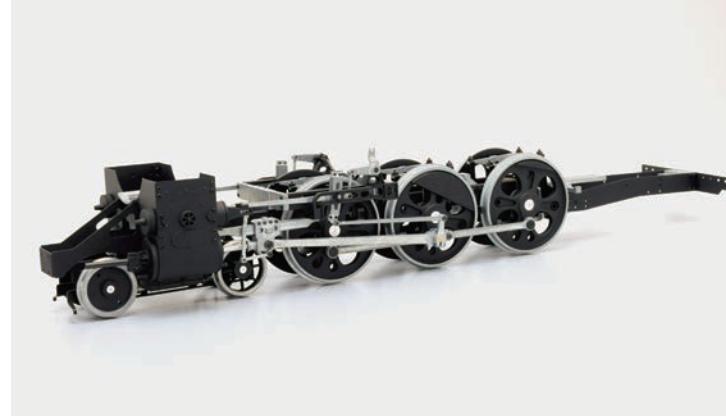


Pass the centre pin (Stage 28) down through the aligned holes.



Tighten the centre pin into place.

Complete



The headlamp

Your parts



C



A

B

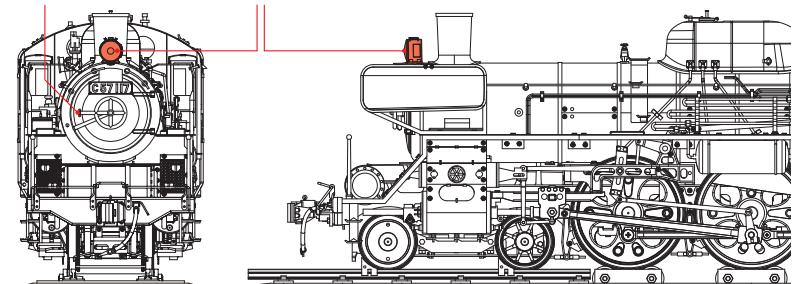
Headlamp
Lens
Smokebox door handle
LED
Terminals x 2
Connector

Tools

Tweezers
Epoxy adhesive
Instant adhesive

Smokebox door handle Headlamp

Where your parts fit



1



Insert the handle into the two holes on the smokebox door.



Position the handle so that there is a 1mm gap between it and the door.



Apply instant adhesive to the ends of the handle to secure it in place.

2

Apply a small amount of epoxy adhesive to the base of the headlamp (circled, above).

Insert the post at the bottom of the headlamp into the hole at the top of the smokebox (circled).



Adjust the position of the headlamp to match the one shown here. Make sure it's aligned centrally with the smokebox.

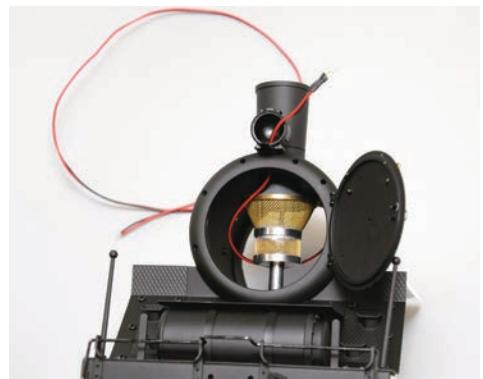
3**3**

Prepare the LED cable by removing the cable tie. Straighten the end of the cable that does not have the LED on it.



Align the end of the cable with the hole in the headlamp.

Complete

4

Pass the LED cable into the hole, down into the smokebox, and then back to the right side of the spark arrester.

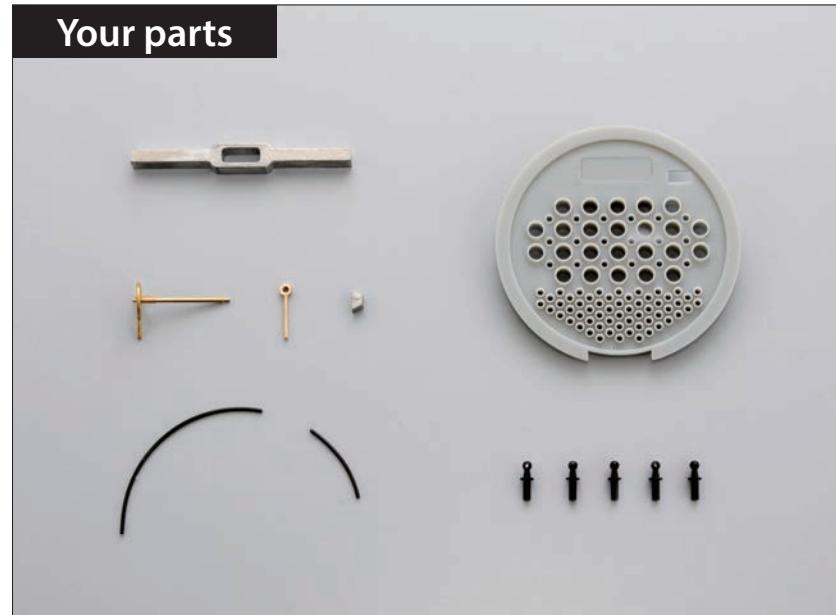


Continue to feed the cable through the hole until the LED is in the headlamp.



The smokebox door lock

Your parts

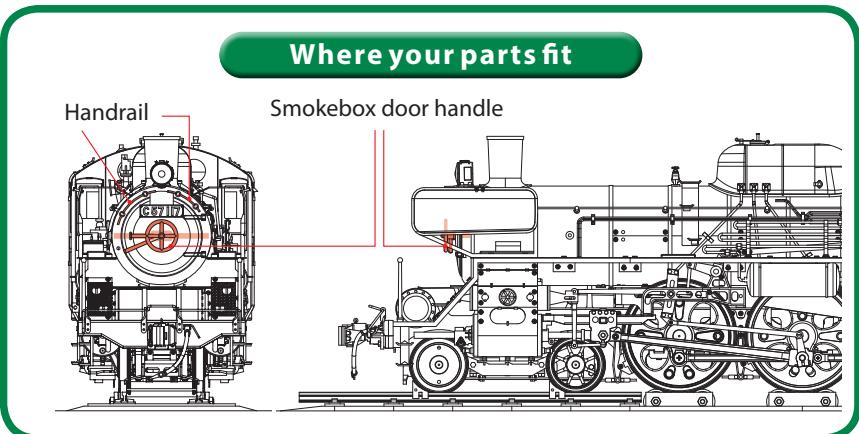


Lock bar
 Smokebox door handle
 Smokebox door lever
 Lock
 Superheater header
 Handrail A
 Handrail B
 Handrail brackets x 5

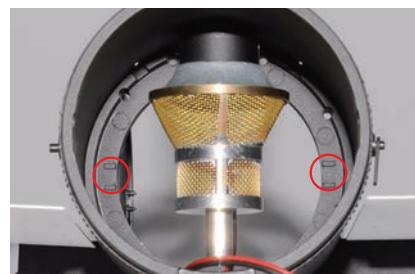
Tools

Tweezers
 Epoxy adhesive
 Synthetic rubber adhesive

Where your parts fit



1



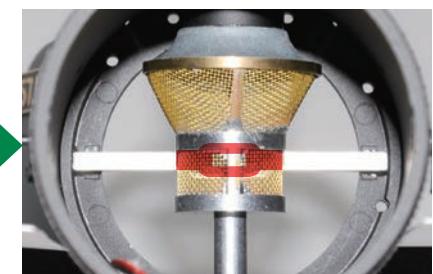
Locate the two ridges on either side of the inside of the smokebox door (circled).



Apply some epoxy adhesive to the space between the ridges.



Open the smokebox door, and insert the lock bar from the front.



Glue the bar between the two ridges on either side of the smokebox. The hole in the centre should be positioned as shown above.

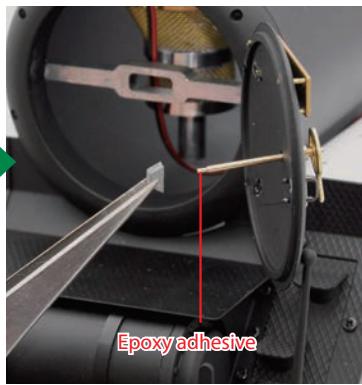
2

Insert the end of the smokebox handle into the hole in the lever.

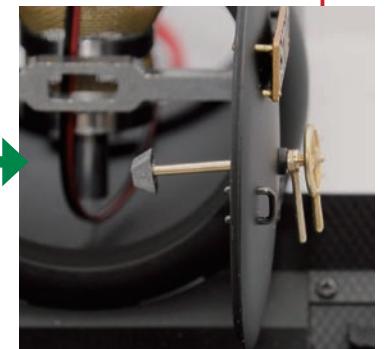
Turn the lever onto the handle as far as it will go.

**3**

Pass the end of the handle into the hole in the centre of the smokebox door.



Apply some epoxy adhesive to the end of the handle. Place the lock onto the end of the handle.



Adjust the position of the lock to match the one shown above.

4

Place three brackets on handrail A, and two onto handrail B, as shown.



Apply synthetic rubber adhesive to the ends of the two brackets holding handrail B, and insert them into the two holes (circled).

Move handrail B through the brackets and apply synthetic rubber adhesive to the points where the brackets were. Then move the handrail back into position.



Fit handrail A and the three brackets in the same way as B. Remove any excess adhesive from the rails and brackets.

**Complete**

When the lever is rotated the lock on the inside of the smokebox turns in the hole in the centre of the lock bar, holding the door shut.

The boiler 1

Your parts

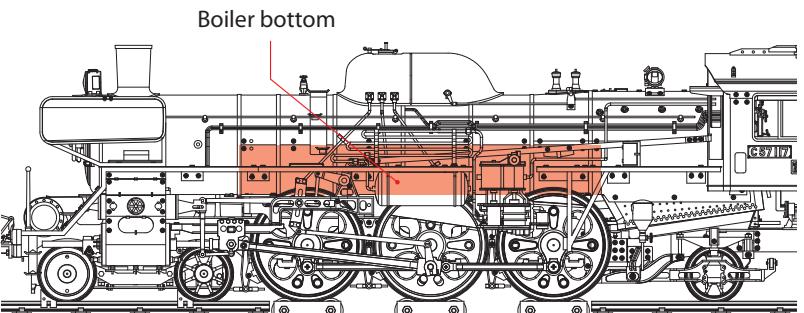


Lower boiler half
Boiler joints x 2
Screws (2 x 3mm) x 15

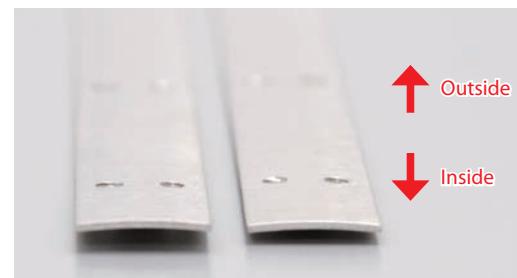
Tools

Phillips screwdriver

Where your parts fit

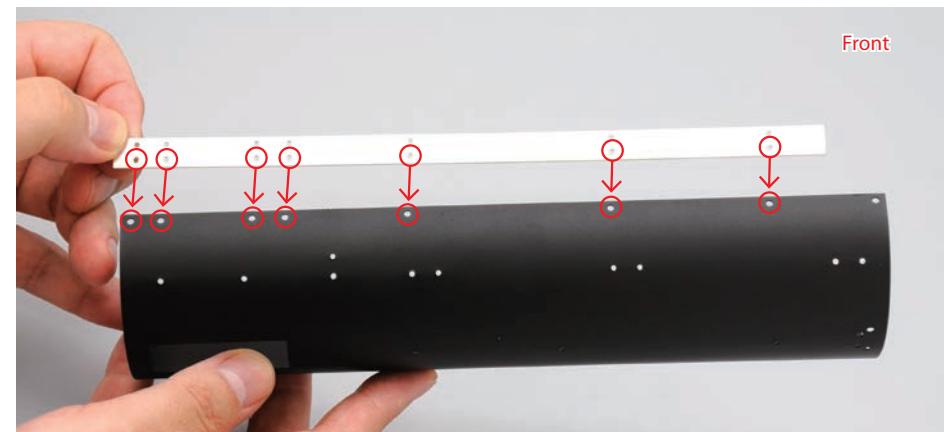


1



Place the boiler joints in front of you, as shown. Identify the outer and inner sides.

Hold a boiler joint up against the lower boiler half, aligning the circled holes of both parts.



2



Secure the boiler joint to the lower boiler half with seven 2 x 3mm screws.



These seven holes should still be visible.

3



Fix the second boiler joint to the other side of the lower boiler half with seven 2 x 3mm screws.



The lower boiler half should now look like this.

Complete



The boiler 2

Your parts

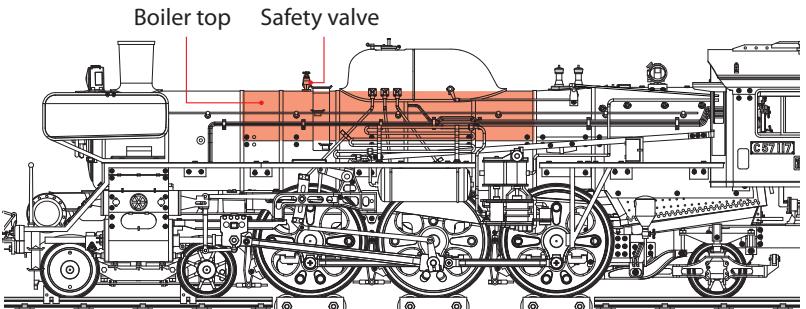


Boiler upper half
Water supply pipe
Safety valve
Handrail brackets x 10
Screws (2 x 4mm) x 5
Screws (2 x 3mm) x 13
Nuts (M2) x 10

Tools

Phillips screwdriver
Epoxy adhesive
Synthetic rubber adhesive
Tweezers
Toothpick

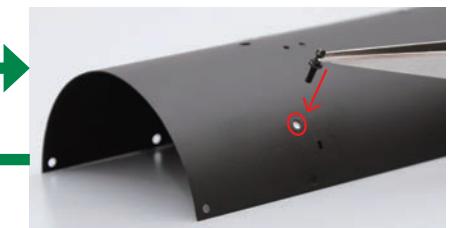
Where your parts fit



1



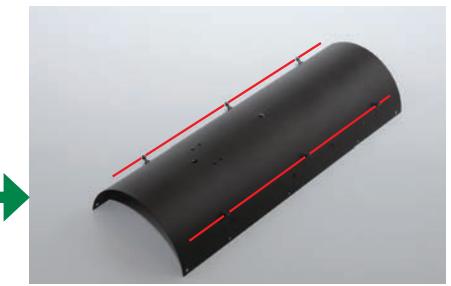
Locate the six holes on the left and right of the boiler upper half. Prepare six handrail brackets and six nuts.



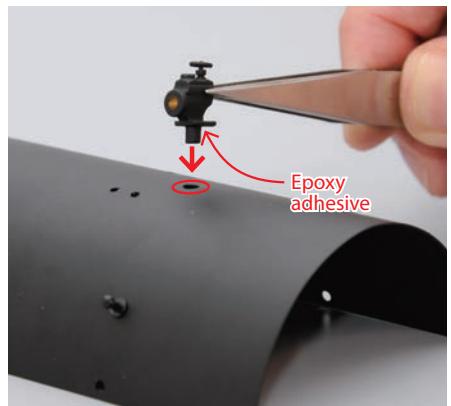
Insert a handrail bracket into one of the holes.



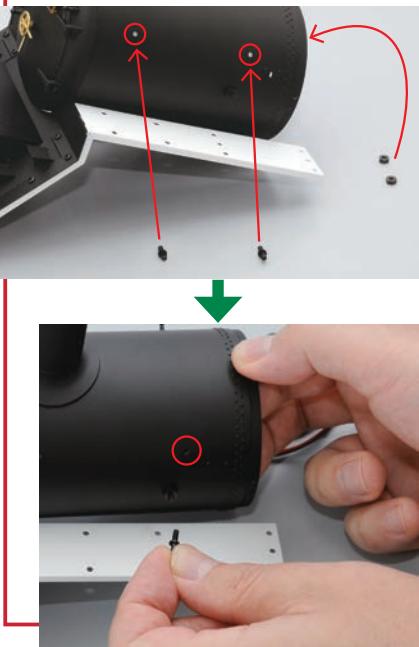
Apply some synthetic rubber adhesive to the inside of the boiler half at the base of the bracket, and tighten a nut onto the end of it.



Fit the remaining five handrail brackets to the other holes of the boiler upper half. Before the adhesive dries, make sure that the holes in the brackets are aligned, as indicated by the red lines.

2

Apply epoxy adhesive to the underside of the lip of the safety valve. Make sure the hole is facing to the right of the boiler half, then lower the valve into the circled hole.

3

Prepare two handrail brackets which fit into the two circled holes in the smokebox, and two nuts which go with the brackets.



Align the holes of the handrail brackets before the adhesive dries.



Apply some synthetic rubber adhesive to the threaded part of the handrail brackets and then insert them into the two circled holes and secure with two nuts.

Fit another two handrail brackets on the other side of the smokebox.

4

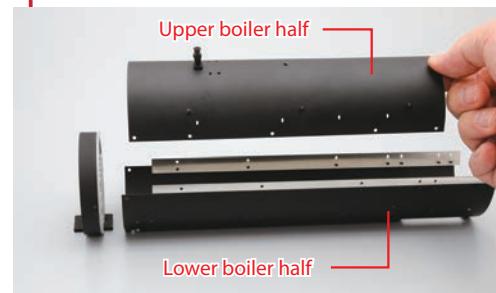
Remove the screws holding the boiler joint in position.



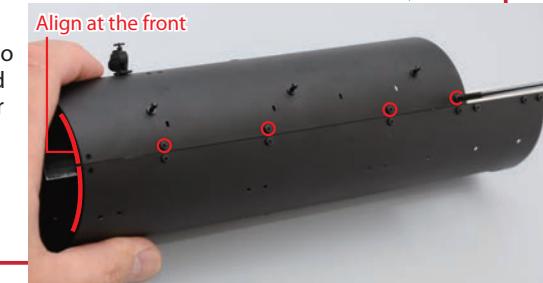
Apply synthetic rubber adhesive to the step (highlighted) on the superheater header (Stage 32), and place it into the boiler joint.



Tap the four holes in the sides of the joint (circles) with 2 x 3mm screws.

5

Lower the upper boiler half onto the lower boiler half, aligning the holes of both parts.

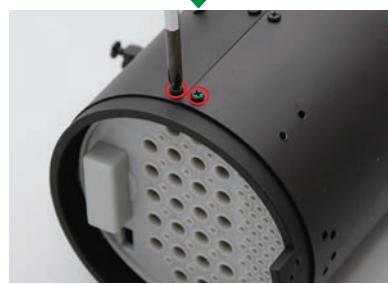


Tighten a 2 x 3mm screw into the four circled holes on either side of the boiler.

6

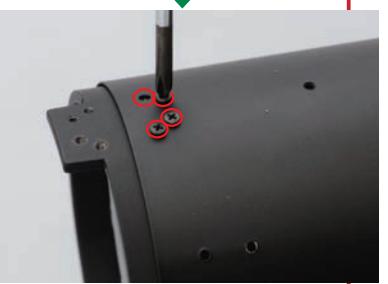
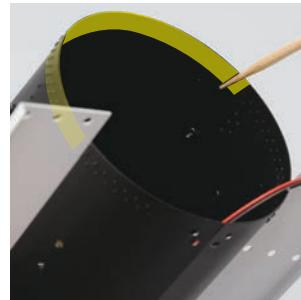
Place the boiler joint into the front of the boiler, aligning the holes at the sides.

Tighten a $2 \times 3\text{mm}$ screw into the two circled holes.

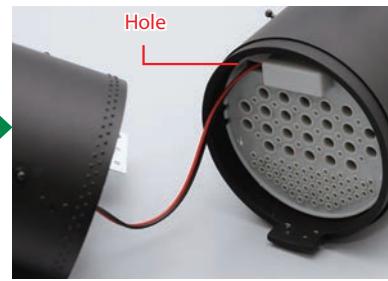


Tighten two more $2 \times 3\text{mm}$ screws into the two holes on the other side.

Tighten a $2 \times 4\text{mm}$ screw into each of the four holes in the bottom of the boiler.

**7**

Apply synthetic rubber adhesive to the inside of the upper half of the boiler.



Pass the end of the headlamp cable through the hole in the top of the superheater.



Insert the boiler joint into the rear of the smokebox.

8

Tighten the four screws removed in Step 4 into the holes in the bottom of the smokebox.



If any synthetic rubber adhesive comes through the seam between the smokebox and boiler, remove it with a toothpick.

9

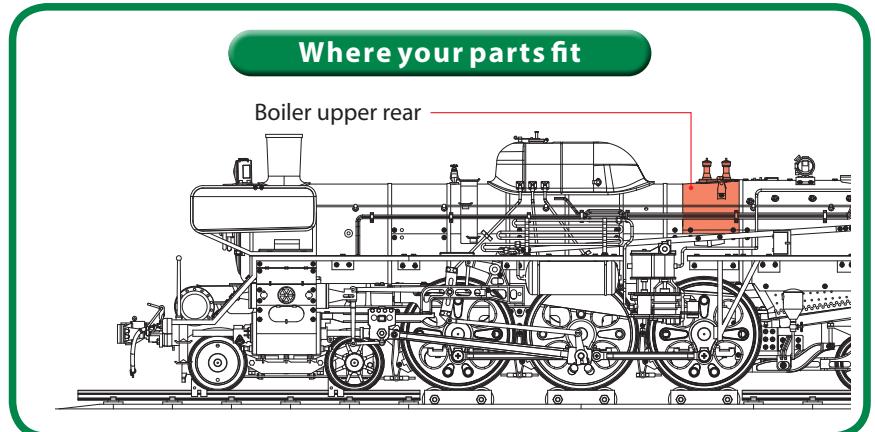
Apply a small amount of synthetic rubber adhesive to the end of the water supply pipe and insert it into the hole in the valve.



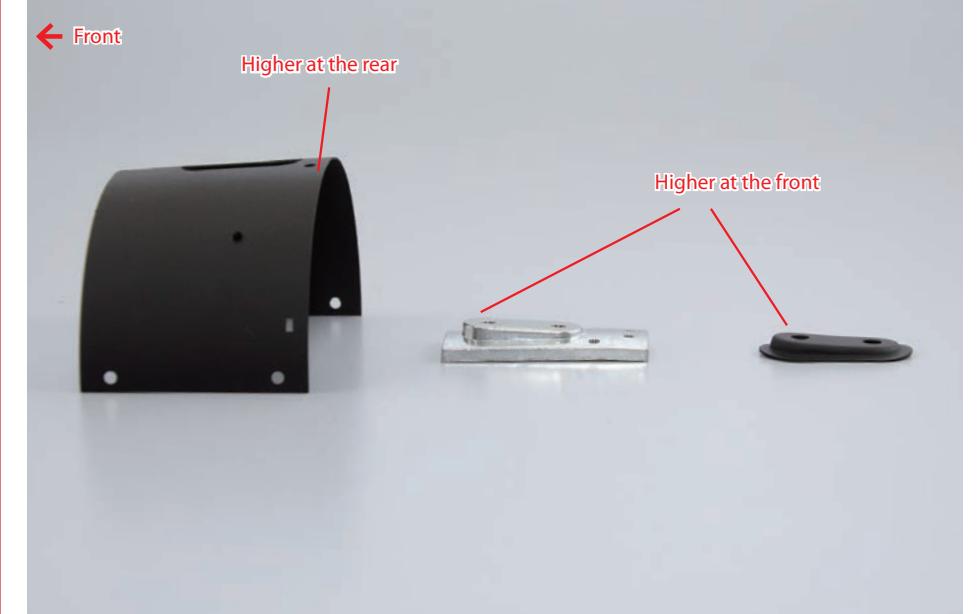
Adjust the position of the water supply pipe so that it is in front of the two circled screws.

Complete

The boiler 3



1



Place the tapered section of the boiler, the safety valve base and safety valve cover out, as shown above, to identify the fronts of each of the parts.

2

Place the safety valve base on the inside of the boiler section, aligning the circled holes.



Half-tighten a 2 x 3mm screw into each of the two circled holes.

3

Place the valve cover over the top of the base, resting on the boiler.



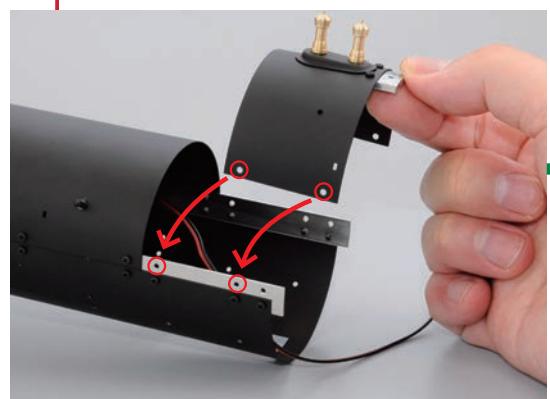
Screw the two safety valves into the holes in the cover and base.



Fully tighten the two screws.

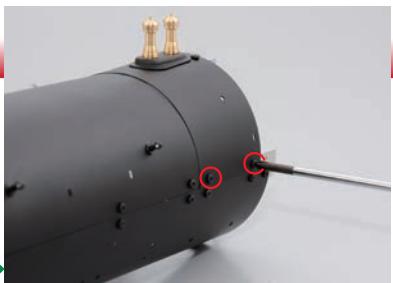


This is how the tapered section of the boiler should now look.

4

Place the tapered section of the boiler at the back of the boiler, aligning the circled holes.

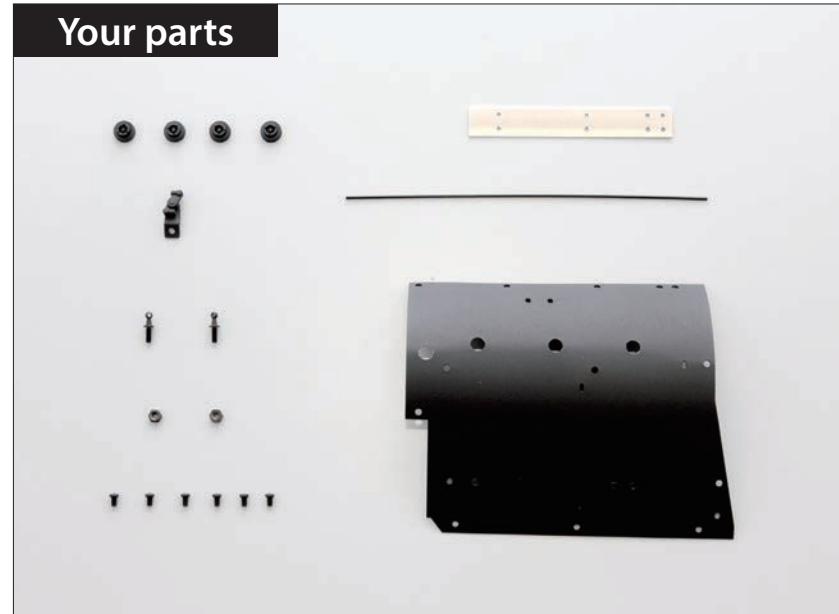
Tighten a 2 x 3mm screw into the circled holes on the left side of the boiler.



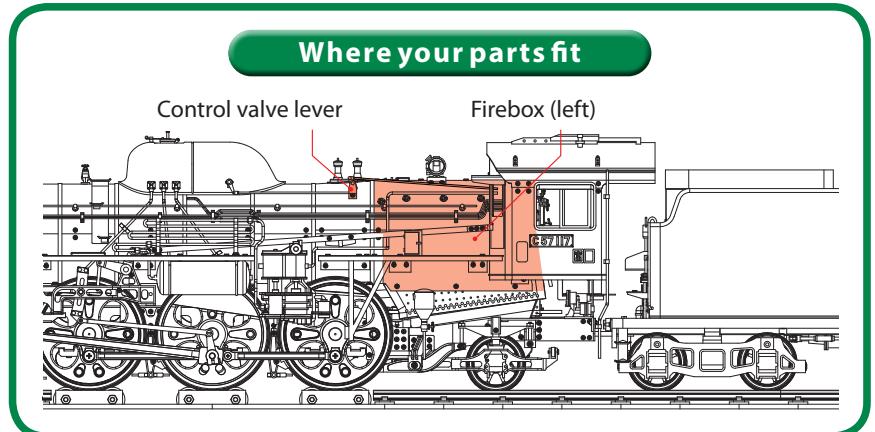
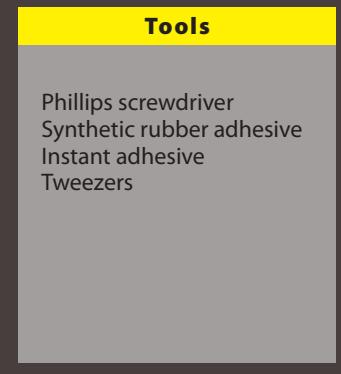
Tighten two 2 x 3mm screws into the holes on the right side of the boiler to secure the tapered section of the boiler in place.

Complete

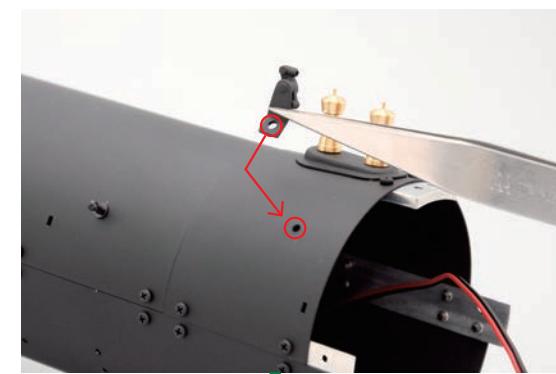
The firebox 1



Fusible plugs x 4
Control valve lever
Handrail brackets x 2
Nuts (M2) x 2
Screws (2 x 3mm) x 6
Firebox joint
Control valve rod
Left firebox half

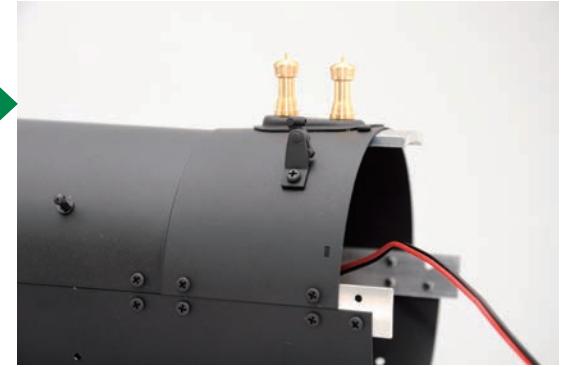


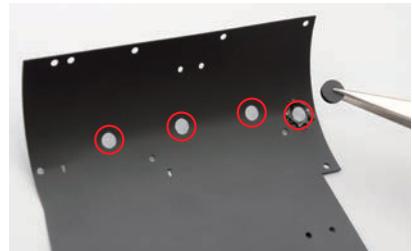
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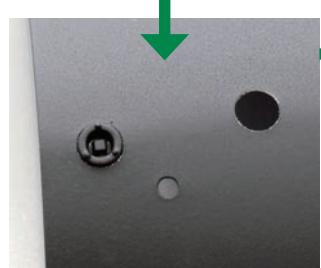
Align the holes of the tapered section of the boiler and the control valve lever.

Tighten a 2 x 3mm screw into the aligned holes.

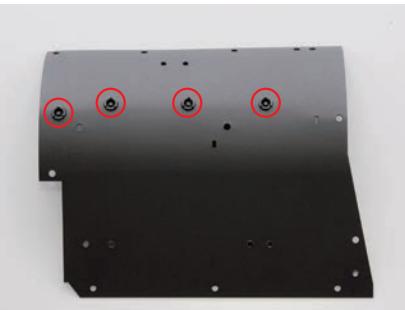


2

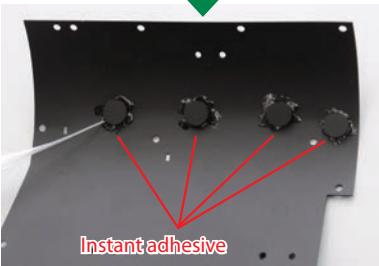
The four holes are the locations for the fusible plugs. Apply synthetic rubber adhesive around the hole on the right on the inside of the firebox half.



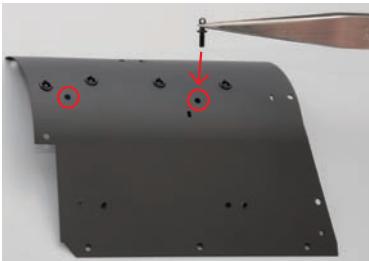
Place the first plug into the hole, positioned as shown.



Repeat this process for the remaining three plugs.



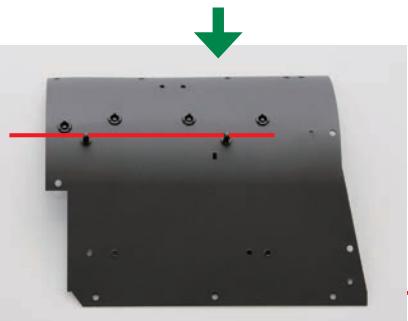
Apply instant adhesive to the contact area between the plugs and the inside of the firebox half.

3

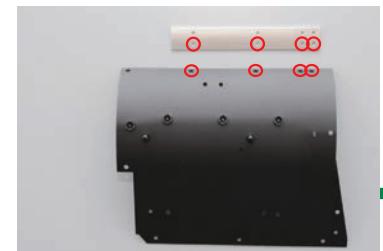
The two circled holes in the firebox half are the locations for the handrail brackets. Insert the first bracket into the hole as indicated.



Apply a drop of synthetic rubber adhesive to the end of the bracket, and then tighten a nut onto it.



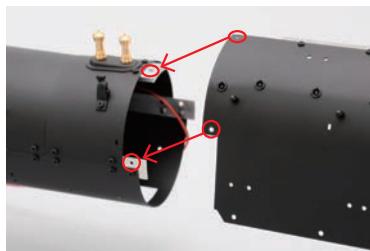
Fit the second handrail bracket in the same way. Before the glue dries, make sure the holes are aligned.

4

Align the holes in the joint plate with the holes in the left firebox half.



Tighten a 2 x 3mm screw into the two circled holes in the firebox.

5

Align the circled holes of the firebox half with those of the safety valve base and boiler joint.



Tighten a 2 x 3mm screw into the holes in the firebox.

Complete