HARRY POTTER HOGWARTS CASTLE #71043 Fantasy Version

Package contents:

16 X 30cm Warm White Dot Lights

1 X 30cm Pink Dot Lights

24 X 15cm Warm White Dot Lights

1 X 15cm Red Dot Lights

1 X 15cm Blue Dot Lights

1 X 15cm Green Dot Lights

4 X Warm White Strip Lights

4 X 5cm Connecting Cables

1 X 15cm Connecting Cables

5 X 30cm Connecting Cables

4 X 50 cm Connecting Cables

7 X 6-Port Expansion Boards

4 X 8-Port Expansion Boards

1 X USB Power Cables

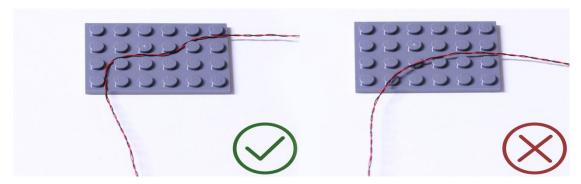
14 X Adhesive Squares

LEGO Plate Pieces

Note:

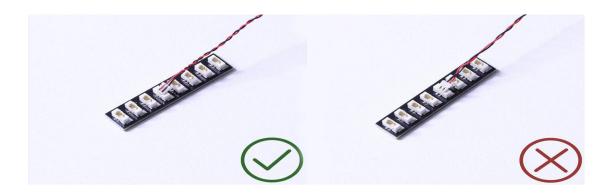
Place wires on the surface or under the LEGO building blocks.

The wire can be place between the building blocks or under the block, but they should be placed between the studs correctly.

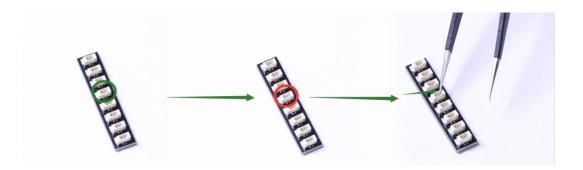


Insert the connectors to the ports.

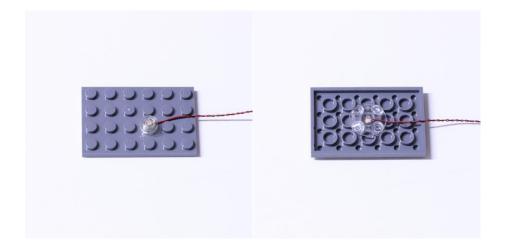
Be careful when you are operating, there's only one correct way to insert, make sure the expansion board is upward, find the soldered "=" sign on the left of the port. When you are inserting, the side which the wires can be seen should be faced to the "=" sign and if you feel hard to insert, please stop, and don't force it, for that may result in bent pins inside the port or overheating of the expansion board.



At this point, use the tweezers to straighten the bent pins.

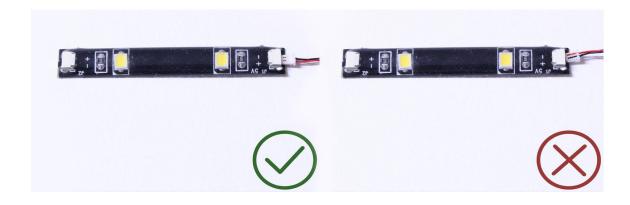


When installing dot lights, make sure they are correctly placed (Yellow LED package is exposed). You can put they either on the top of the studs or between studs.

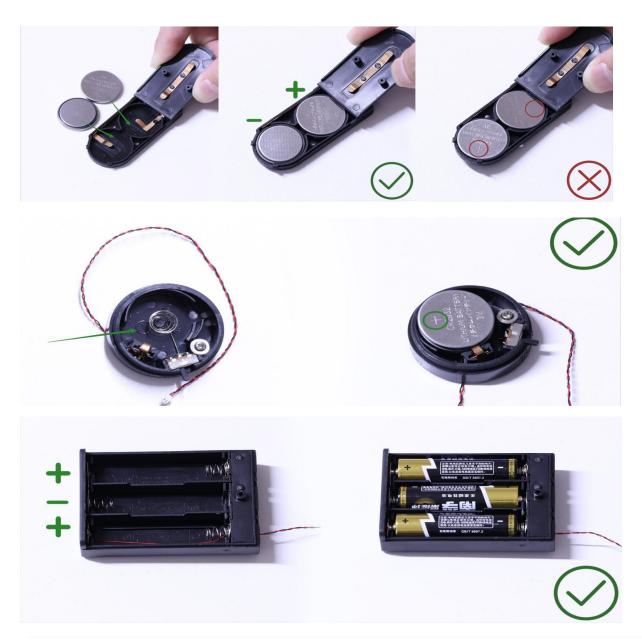


Connecting cable connectors to Strip Lights

Take extra care when inserting connectors to ports on the Strip Lights. Connectors can be inserted only one way. With the Strip Light facing up, ensure the side of the connector with the wires exposed is facing down. If a plug won't fit easily into a port connector, don't force it. Doing so will damage the plug and the connector.



Finally, please pay attention to the positive and negative terminals of the battery when installing the battery case.



OK, Let's Begin!

Instructions for installing this kit

First divide the castle into 2 parts, the first part on the right and the second part on the left, as shown blew.





Start from installing lights for the tower



Remove the top of the tower



Remove the pieces next to the following window

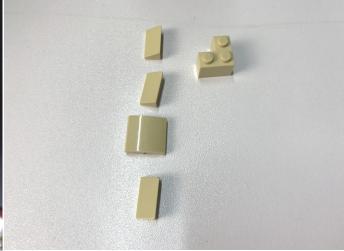






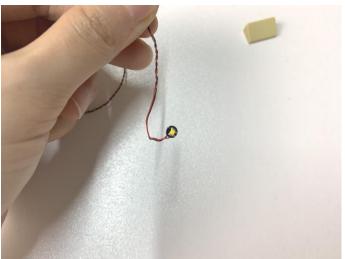






Take a 30cm warm white dot light, bend the cable near the LED component to $90^{\circ}\,$





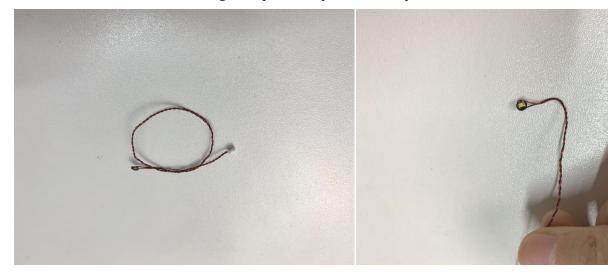
Thread the dot light through the hole beside the window into the building. (with lighting side facing the front, secure the light at the top of the window)



Reconnect the pieces beside the window, secure the cable underneath the plates in between studs

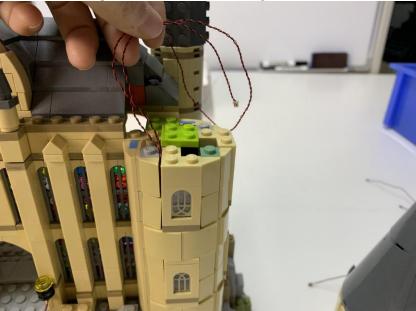


Take a 15cm warn white dot light, repeat the previous steps to install it to the window above

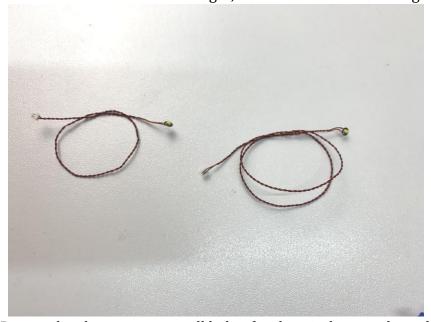




Reconnect the pieces, secure the dot light



Take a 30cm warm white dot light, a 15cm warm white dot light



Repeat the above steps, install lights for the windows at the right side

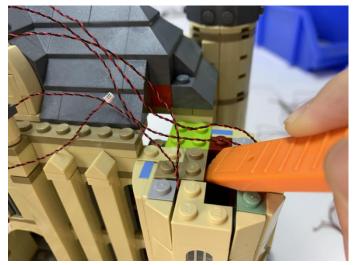




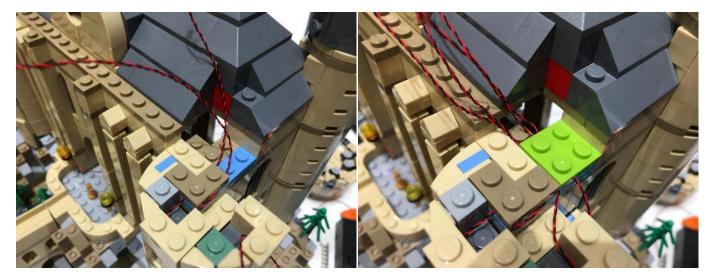




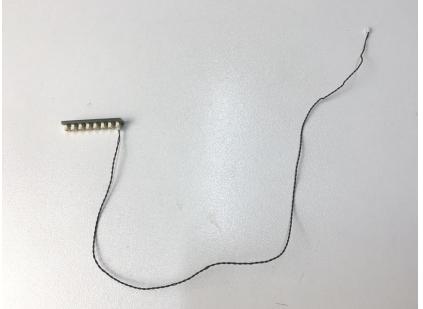
Remove the plates from the surface of the tower, pull the cables of the lights to the place between the column and the gray roof. Place the cables underneath plates in between studs before reconnecting the plates







Take a 30cm connecting cable, a 8-port expansion board, connect the cable to the expansion board



Connect the other end of the cable to the gap between the column and the roof, pull the cable out from the other side of the building. Leave about 7cm for the side with expansion board

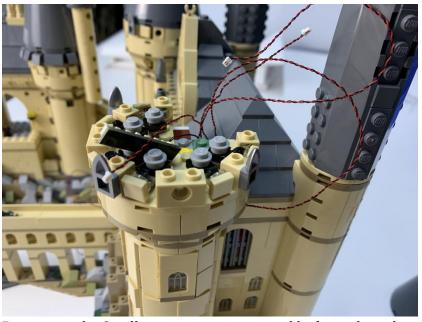


Disassemble the top of the tower as per below

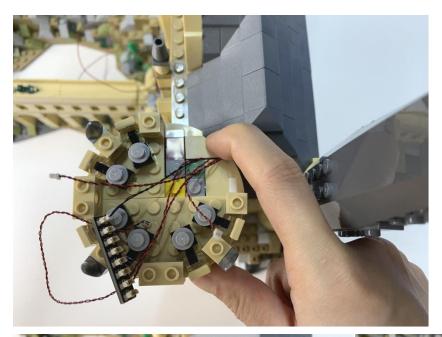


Take the following pieces, connect them to the tower as per below. Pull the cables of the dot lights and the expansion board out



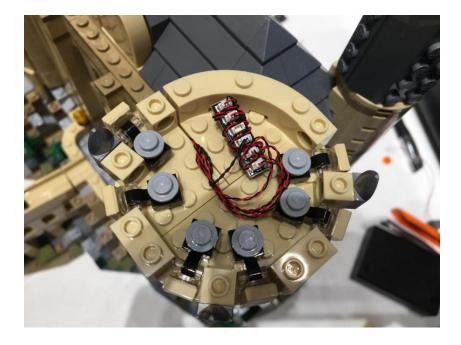


Reconnect the 3 yellow pieces we removed before, place the cables underneath in between studs.





Stick the board with adhesive squares, stick to the bottom plate, and reconnect the roof.



 $Connect\ the\ 30cm\ cable\ from\ the\ other\ side\ of\ the\ building\ to\ the\ power\ supply\ and\ test\ it!$



Take 2 warm white 30cm dot lights, 5 warm white 15cm dot lights, a 30cm connecting cable, a 8-port expansion board, 3 LEGO trans 1x1 bricks, repeat the previous steps to install lights to another tower



We'll move onto installing lights for the door. Remove the torches



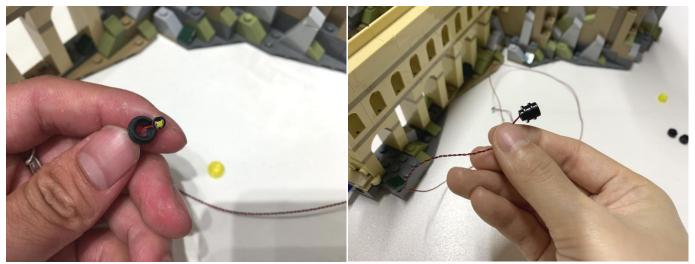




Take 2 warm white 30cm dot lights, 2 black round 1x1 plates with hole



Thread the connector of the light through the hole on the black plate, pull the cable till the lighting side is facing up. Connect the black round plate and the yellow round plate over the light

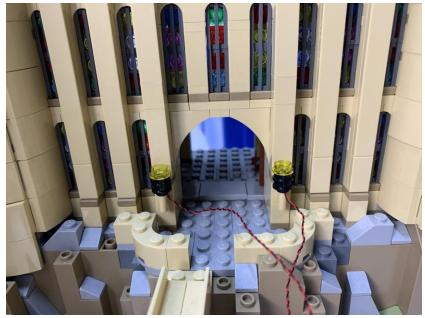




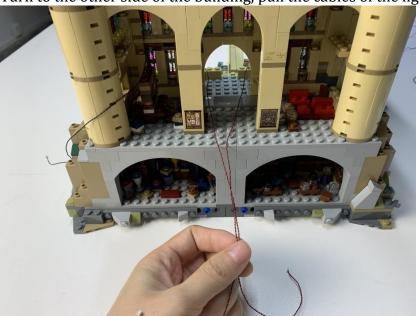
Reconnect the light back to the door



Repeat the above steps to install the other dot light



Turn to the other side of the building, pull the cables of the lights out



Remove the following 2 pillars and the door





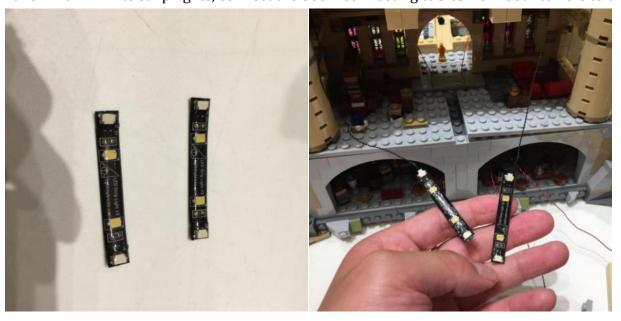
Remove the 2x3 plate and the 1x6 plate. Slightly lift the base plates at the right side



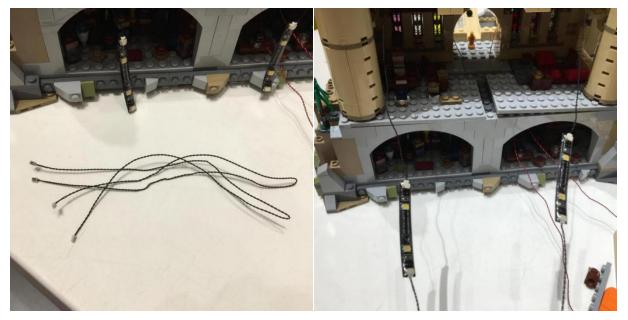
Hide the cables underneath in between studs, thread them through the gap between the plates at the right side, then, pull them out from the lower floor



Take 2 warm white strip lights, connect the 30cm connecting cables from both towers to them



Take two 30cm connecting cables, connect them to the other sides of the 2 strip lights



Stick a strip light to the right side of the roof, tuck excess cable around the strip, thread its cable through the gap we made before to the lower floor



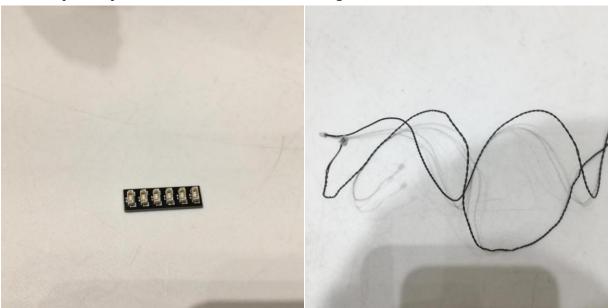
Connect the other strip to the left side as we did for the previous strip, also thread its cable to the lower floor. Ensure the cable is placed underneath in between studs



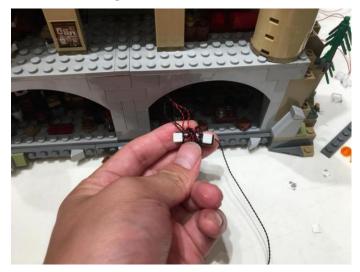
Reconnect all the pieces



Take a 6-port expansion board, a 50cm connecting cable



Connect the 50cm cable to the expansion board, connect all the cables of the lights to the expansion board, stick tapes at both sides of the board, stick the board to the ceiling of the ground floor



Pull the 50cm connecting cable out from the right side of the building.









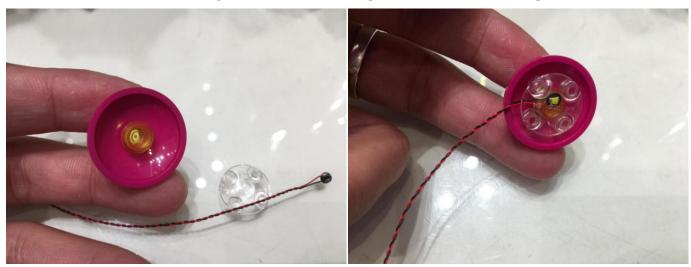
Connect the 50cm connecting cable to the battery pack to verify the current



Continue to install lights for anther tower. Disconnect the following pieces



Take a 15cm warm white dot light, a trans round 2x2 plate. Assemble them as per below



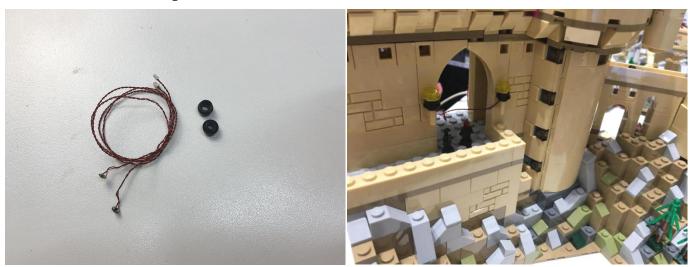
As shown blew, remove the column and the bottom plate in the middle. The line in front of the lamp bead extends through the bottom plate into the bottom layer



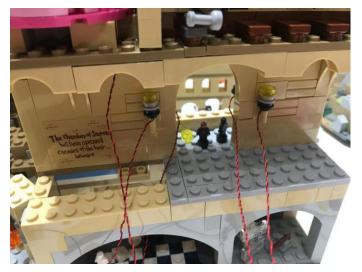
Lift the floor, remove the pillars and the baseplates from the middle



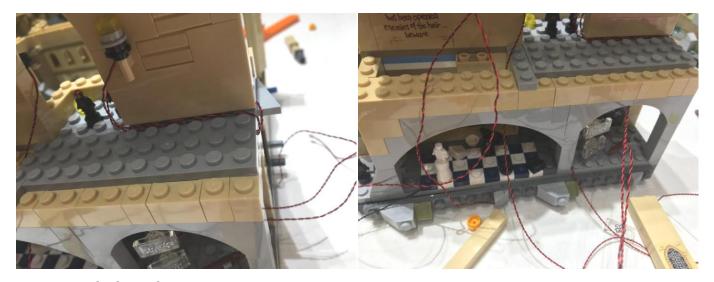
Take 2 warm white 30cm dot lights, 2 black round plates with hokes, install the lights to the door, thread the cables through the door to the other side



Take a warm white 15cm dot light, install it to the torch at the left side, install a warm white 30cm dot light to the torch at the right side. (replace the black round plate with gray ones)



Lift the baseplate. Thread the cables from the left side of the door through the gap at the left to the ground floor, thread cables from the right side of the door to the ground floor



Reconnect the baseplate



Reconnect the other pieces as per below



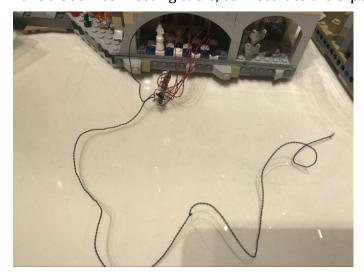
Take a warm white 15cm dot light, install it to the following piece



Take a 8-port expansion board, connect all cables we thread to the ground floor to it.



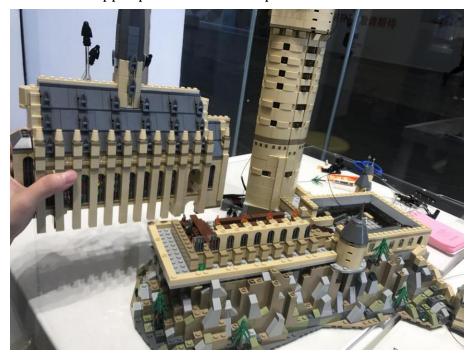
Take a 50cm connecting cable, connect it to the 8-port expansion board



Stick tapes to both sides of the expansion board, stick it to the ceiling of the ground floor, pull the 50cm connecting cable to the right



Now let's start the second part! Remove the upper part of the second part of the castle.



Then remove the bottom plate.



Remove the 9 street lights on the bottom plate.



Take nine 15cm warm white Dot Lights. We start to install all the street lights.



Take one of the 15cm dots and street lamps to separate the transparent parts of the street lamps.



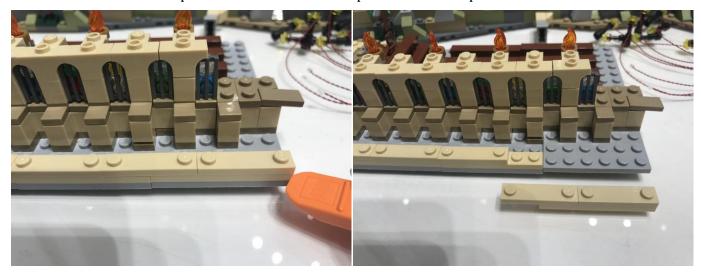
Fold the end of the lamp into 90 degrees with the light side facing up.



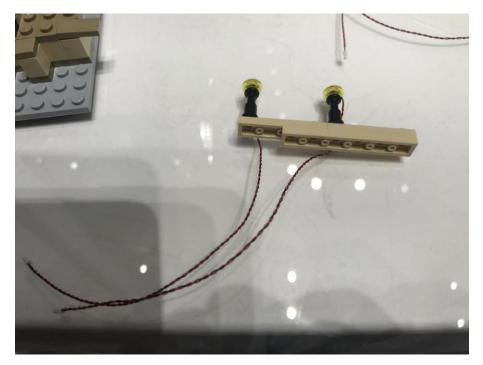
The first street lamp was installed by holding it with a transparent piece. Repeated the operation to install the other eight street lights.



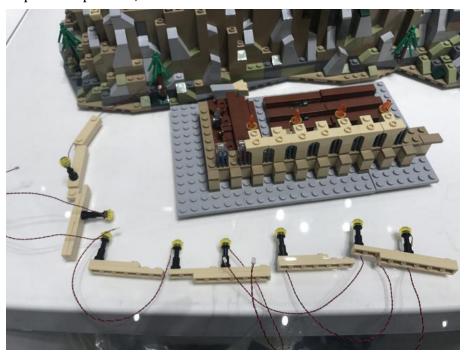
Remove the double base plate under the street lamp on the bottom plate



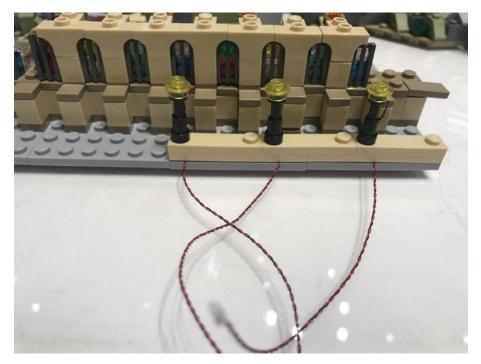
Install the street light on the base plate.



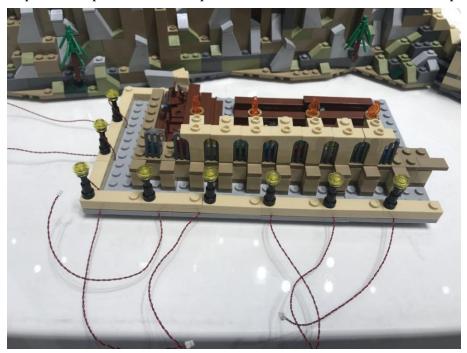
Repeat the process, as shown blew.



Reconnect the base plate and press the cable against the stud gap under the base plate, as shown below



Repeat the operation to complete the installation of all street lamps.



Now start installing the torch light on the hut on the right side of the castle.



Remove the black and yellow round plates.



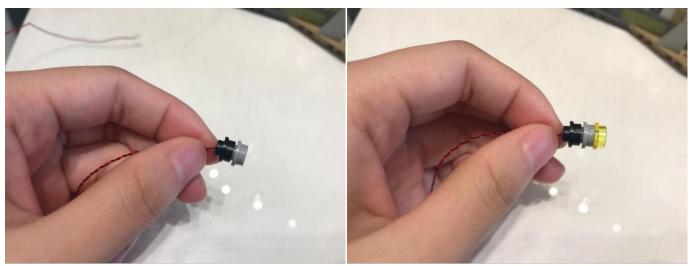
Take two 30cm warm white Dot Lights, 2 black small round plates with holes (no black small hole plate at hand, replace it with gray)



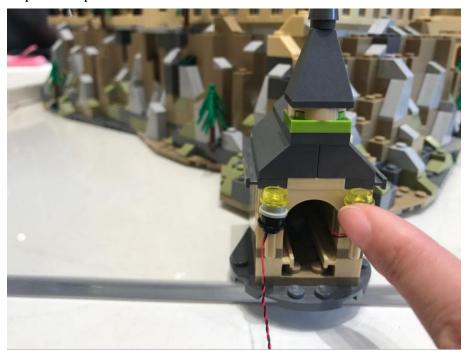
Take one of the 30cm warm white lamp dots, pull the plug end out from the side of the black large round hole, and turn the lamp face up.



Reconnect the yellow small round plate and the yellow small round plate to the cabin.

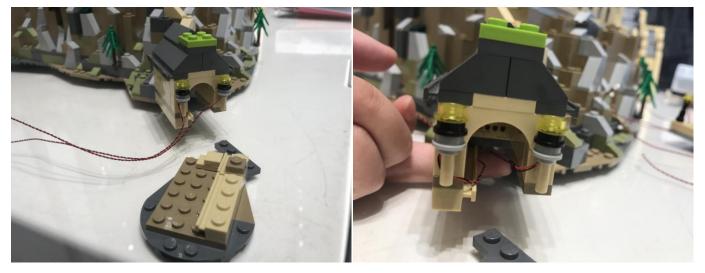


Repeat the process to the other torch.



Remove the bottom of the cabin and pass the line from the inside of the cabin to the bottom of the

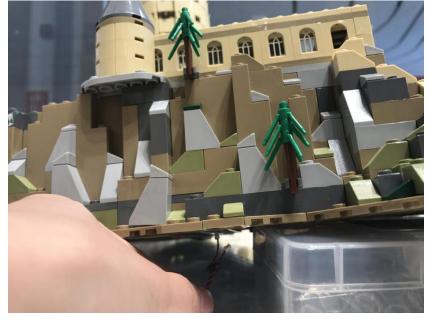
castle

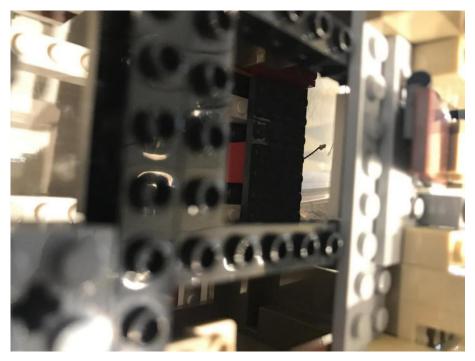


For the convenience of operation, the bottom plate is padded, slightly inclined, and attention is paid during operation to prevent slipping and collapse, which makes it difficult to restore.



Insert the plug end of the just-installed torch light from the hole in the floor into the castle

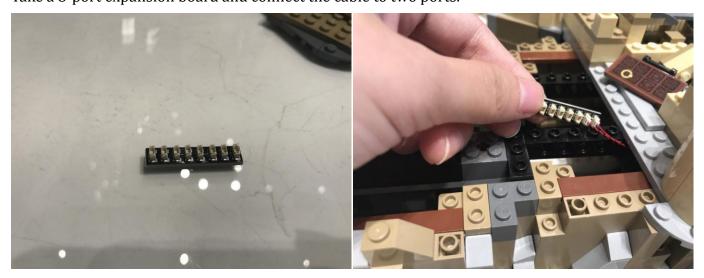




Pull out from the inside castle.



Take a 8-port expansion board and connect the cable to two ports.



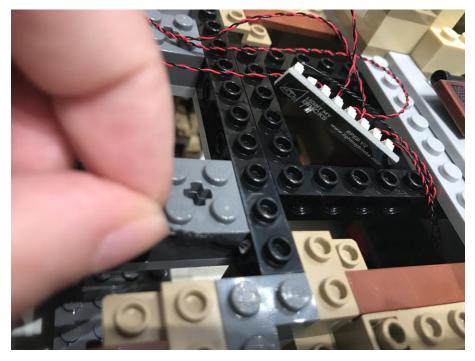
Take a 30cm cable and connect it to the 8-port expansion board.

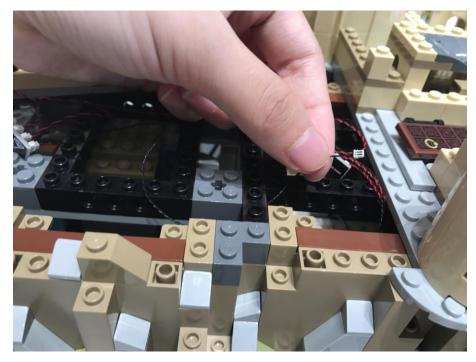


Take a 15cm cable and connect it to one of 6-port expansion boards.

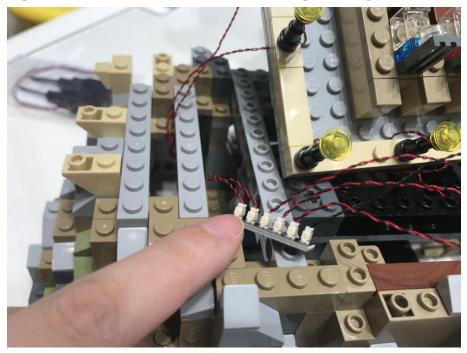


Plug the other end of the 15cm cable through the gap in the left side of the 8-port expansion board and connect it to the board.

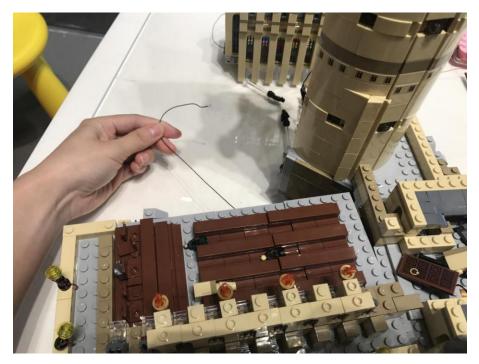




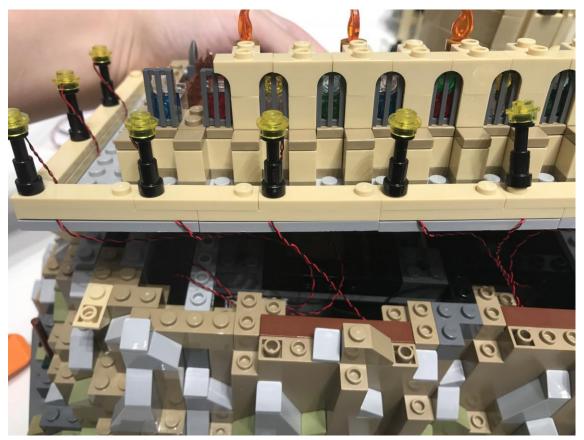
Pass the two street light plug ends on the left side under the gray base board, connect to the 6-port expansion board, and connect the remaining street lights to the 6- or 8-port expansion board.



Pull the 30cm cable from the 8-port expansion board from the first level of the "snake hole".



Hide all the cables and boards from the streetlights in the gap under the base plate. Note: Try to place the cable between the stud gaps, otherwise there will be a big gap when the bottom plate is installed back.



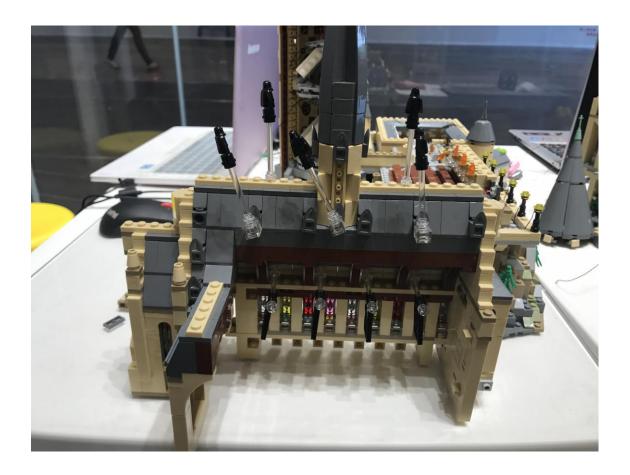
Reconnect the bottom plate, now the street lights are installed.



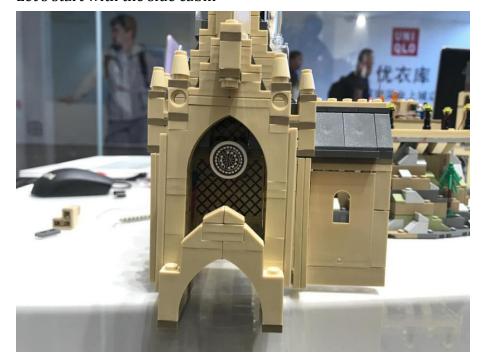
Reconnect the cabin floor



Now we are going to install the house lighting that was removed in the front step.



Let's start with the side cabin



Take off the "wall clock" in the cabin, take a 15cm warm white light dot, and a 1X2 transparent base plate.



Loosen the background plate in the cabin and pass the light dot plug end through the gap.



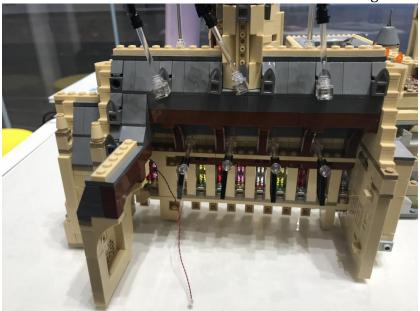
Pull to the end of the dot, fixed with 1*2 transparent plate



Install back the "wall clock"



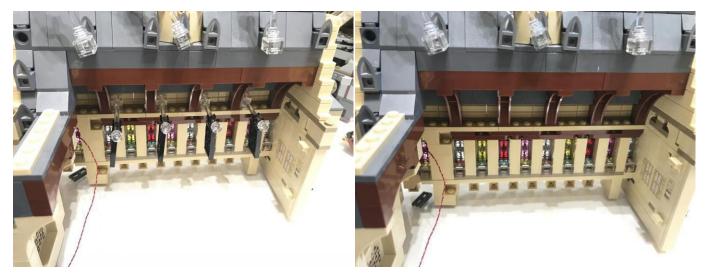
We turn back indoors and start to install the interior lights.



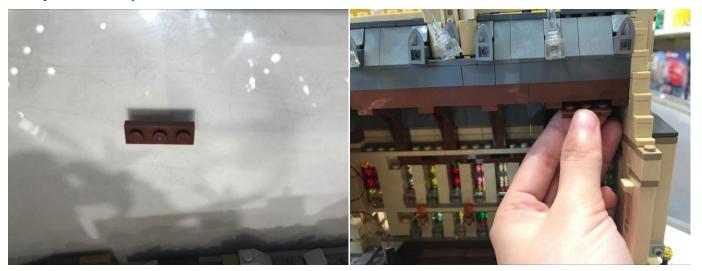
Take two warm white strip lights, one 50cm connecting cable and one 5cm connecting cable, as shown below.



Remove the "flag" in the room to facilitate the installation of the strip light.



Take four 1*3 brown base plates, which are installed in the eaves gap in turn (there is only one brown base plate at hand).



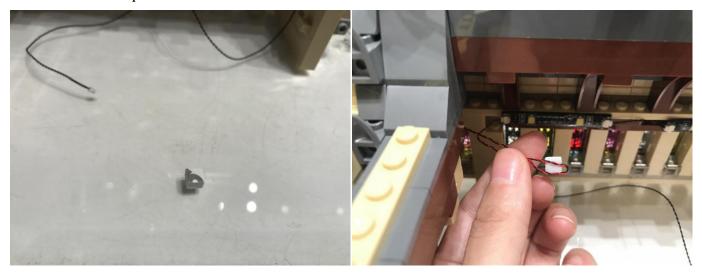
Connect the strip light to the 15cm dot light on the left side, and stick the strip light under the installed base plate, as shown below.



Press the slack 5cm connecting cable between the strips to the 1*3 base plate stud gap



Take a adhesive square and stick the loose cable on the left side to the roof.



Wrap the right 50cm connecting cable between the 1*3 base plate studs and press it under the plate so that the 50cm connecting cable is closer to the right wall when pull down.



Reconnect the castle and test all the lights installed.



Lift the brown-red base plate, hide the 50cm connecting cable in the stud gap, press it under the plate.







Slightly lift the bottom plate, pull the plug end into the bottom, and use the yellow base plate to hide the cable.



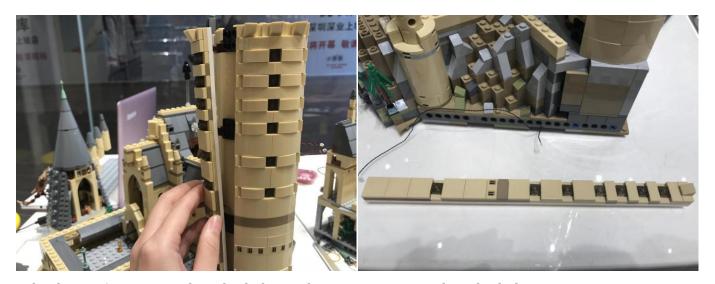
Then we start to install the lights on this tower.



Remove the top of the first floor and set it aside. Then remove the wall plates of the tower.



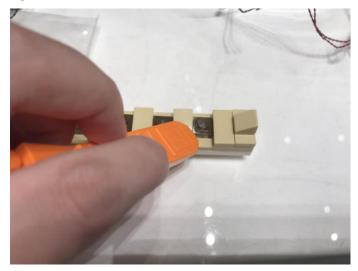
Remove the long strips of the gray transparent pieces as shown blew.



Take three 15 cm warm white dot lights and two 30 cm warm white dot lights.



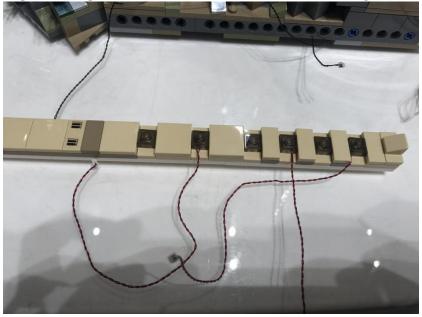
Remove the first gray transparent piece, take a 15cm dot light, and use the transparent plate to fix the light.



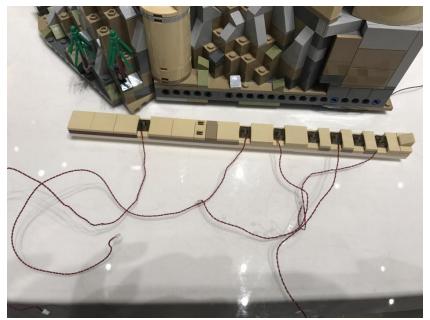




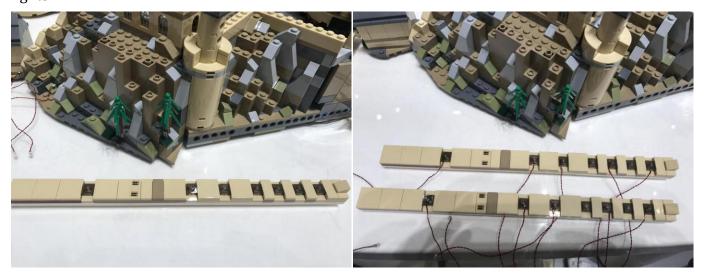
Repeat the operation, install another two 15cm dot lights with a gray transparent piece.



Then install the following 2 gray transparent pieces to install two 30cm dot lights as shown blew.



Take the same strip, and install three 15cm warm white dot lights and two 30cm warm white dot lights.



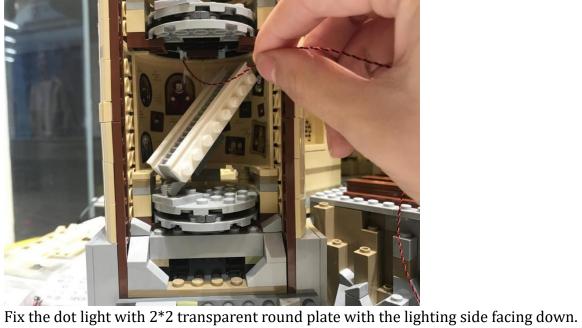
Now let's install the lights in the tower first.



Take one 30cm pink dot light and one 2*2 round plate.



Install the dot light on the first floor with stairs, pull the plug end through the roof gap, leaving only the light end.





Connect the power to see the effect.



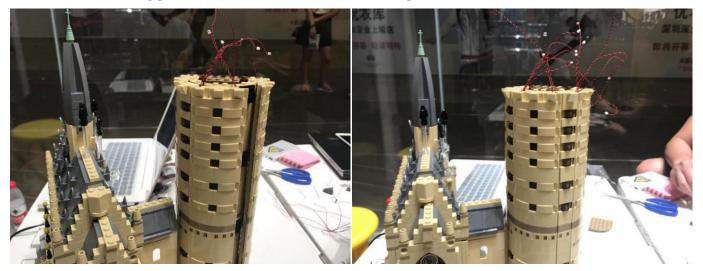
The second floor is installed with 15cm green dot lights, and the third floor is installed with 15cm blue dot lights.



Now install the long board on the outside of the tower and screw all the cables up from side.



Reconnect three long plates and hide the cables under the plates.



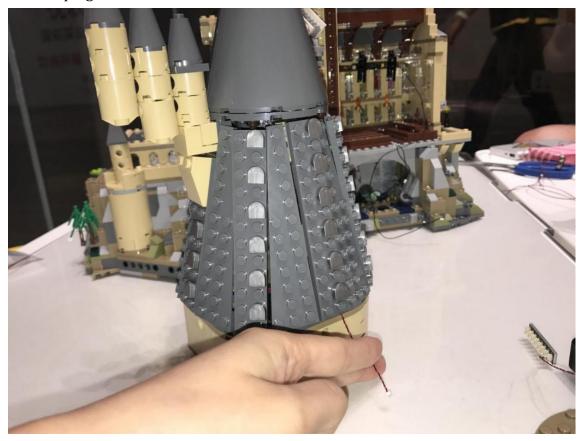
Now let's install the top of the tower.



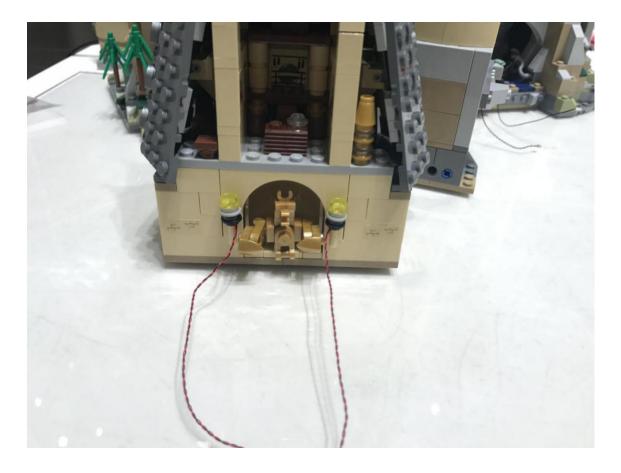
Take one 15cm red dot light and one 2*2 round plate. Install them on the roof as shown blew.



Pull the plug end out of the back of the tower.



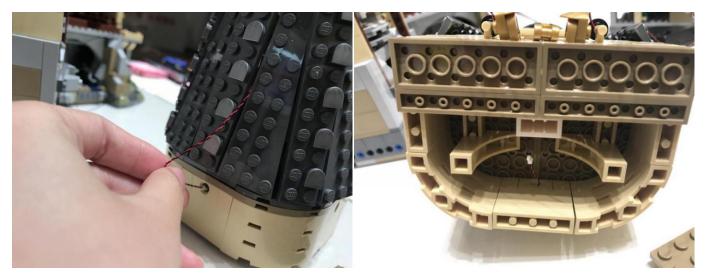
Repeat previous operation, take two 15cm warm white dot lights, two black small round plates with holes, and install two torches on the top of the tower (also replaced by small gray plate with small holes).



Place the tower roof on the side and remove the two base plates.



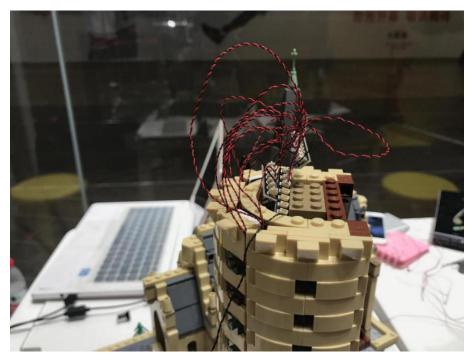
Pass the plug end behind the tower from the round hole to the bottom of the tower.



Take two 8-port expansion board, one 6-port expansion board, two 5cm cables and one 50cm cable, as shown below.



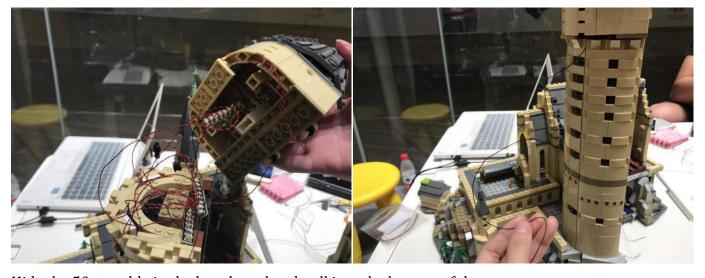
Connect all lights to the three boards.



Take a 2*6 base plate and install it behind the bottom of the tower.



Connect the 3 plugs on the remaining boards, pull the 50cm cable out, restore the top of the tower, and hide all the boards and cables in the gap.



Hide the 50cm cable in the long board and pull it to the bottom of the tower.



Now all the lights on the tower are installed, let's see the effect!



Then remove the gray piece on the left side of the first floor, as shown below.



Pull the plug end through the gap and pull it out from the bottom.



Reconnect the gray piece and press the cable against the stud gap under the piece.



Pull the 50cm connecting cable of the first part of the right side through the bottom hole of the second part of the joint, as shown blew.

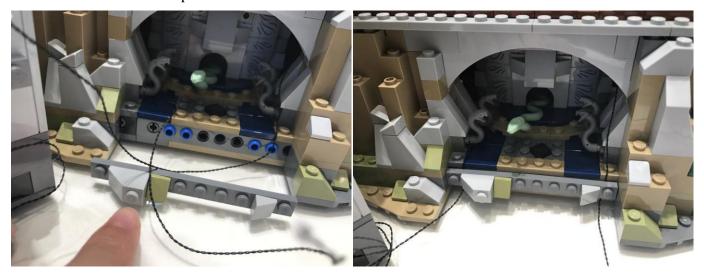




Lift the second part slightly, and pass the 50cm connecting cable that passes through the first part and the 50cm connecting cable of the tower together through the bottom of the tower and pull it to the right.



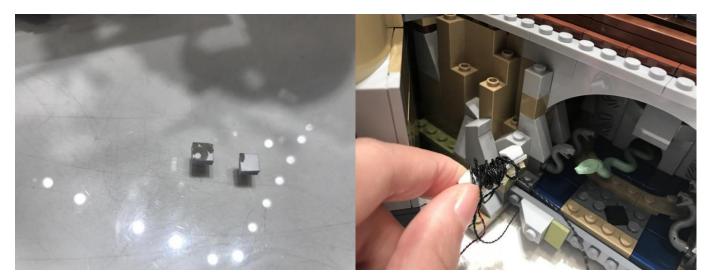
Remove the base plate of the "snake house" and press the two connecting cables pulled out from the "snake house" under the plate.



Take one USB power cable, one 8-port expansion board, connect as shown below



Take 2 adhesive squares and stick them on both ends of the board. Connect the 4 cables to the 6-port expansion board and wrap them around the board.



Plug the board into the gap.

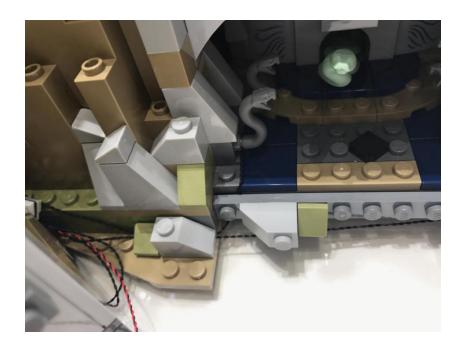


Remove the gray and green pieces as shown blew.





Hide the line under the pieces and reconnect the pieces.



Now that we have installed all of the lights, connect the power and enjoy it!



