

This tutorial is going to show you how to "wire" (install) a helmet kit into a Pyrotect helmet using the HK-OFSP-3.5 helmet kit. If the helmet kit you are installing does not have one of the components, such as speakers, simply skip the steps that address those components. There are many different style of helmets on the market and it's difficult to address every one in these instructions. For that reason we are going to focus on helmets that are similar to Pyrotect. If your helmet padding does not work the same way as shown in the pictures, do not hesitate to ask us for advice on how to complete a step for your specific helmet. The first step is to gather the tools needed for your install. You're going to need a helmet kit, a helmet, a hot glue gun with a glue stick, a flat rounded tool that's firm enough to push wires into the padding (we used the handle of a crescent wrench), a zip tie, and scissors.







STEP 1: Here we have our to-be-wired Pyrotect helmet. While not all of you will be wiring the same helmet shown here, a lot of the techniques work with other major helmets used by racers as well as recreational wheelers.



STEP 2: Find some way of propping the helmet upside-down. The helmet will be like this throughout the install and propping it this way will stop it from rolling away while working on it.



STEP 3: Some helmets, like this bisected Motocross style helmet above, have a little pocket for your ear that allows you to simply stick the velcro patch onto the shell, and apply the helmet speaker.



STEP 4: That makes the install a little bit faster and easier but we'll show you what to do here if you have a Pyrotect that doesn't have that "pocket". Start by removing the cheek pad that's velcroed to the shell. We start with the one that's not going to have the mic boom on that side.



STEP 5: You'll notice the hole where the chin strap goes through on the cheekpad. On the velcro side, you can access the inside of the cheekpad. Fold down the fabric as shown in the picture above, and work the speaker into the inside of the padding. Be sure to insert the speaker so that it's facing the right direction, towards your ear. Notice on the picture how the foam is not between the speaker and where your ear will be.



STEP 6: This picture simply shows me making sure the speaker is where the wearers ear will be inside the helmet. This would be a good time to put the helmet on see if the speaker needs to be adjusted. If everything checks out, reattach the cheek pad and you're good to move on.







STEP 7: The cable that goes from one speaker to the other will need to be secured somewhere in your helmet. The best place on this helmet is along the rear pad that runs along the back of your neck. Begin pushing the wire down between the padding and the shell of the helmet, just enough to get it started.

STEP 8: Using something that will not damage the cable, such as the rounded handle of a crescent wrench seen here, carefully but firmly push the cable down between the back pad and the shell as shown, until you've reached the other cheek pad.









STEP 9: Repeat the same steps as before to secure the speaker into the cheek pad. The only difference is you will have an extra cable coming off the speaker that goes to the rest of the helmet kit.







STEP 10: Before putting the cheek pad back on, we're going to anchor the helmet kit cable junction to the helmet. This provides extra strength to the pigtails that will come out of the helmet, making it harder to mess the helmet kit up should they be pulled on or stressed while riding. There's a little metal ring that attaches to the shell of the helmet, this is where the chin strap is attached, circled in the picture. Insert a zip tie into the ring and make a loop, being sure not to tighten the zip tie all the way. If there is no ring on your helmet to anchor to, use one of the square adhesive zip tie anchors that are included with your kit instead. You'll need to leave the zip tie loop large enough to fit the helmet kit cables into before tightening all the way.

STEP 11: Insert the part of the helmet kit where all the cables join through the loop in the zip tie, once it's through the loop, tighten the zip tie to secure the cables and remove the excess zip tie.



STEP 12: Now that the cables are secured with the helmet, it's time to figure out where you're going to secure the flexible microphone boom. You want to position the microphone so that it will be directly in front of your mouth when you have the helmet on. Keep in mind that you may need to bend the mic boom when you have the helmet on to position the mic close enough to your mouth. The microphone should intermittently touch your lips when you speak for optimum performance. What we do is line the mic up so that it is right in the center front of the helmet, then shift the mic and boom slightly towards the direction of the mic boom. This slight offset makes it so that when you bend the mic to be closer to your mouth, the microphone is flat against your mouth instead of angled a certain direction. It's a small detail, but it's an easy way to make sure you achieve the maximum potential of your helmet kit mic.





STEP 13: Now that you know where you're going to mount the mic boom, it's time to secure it to the helmet. We strongly urge you to not modify, drill, or screw anything to your helmet. This can compromise the structural integrity and will void the warranty of the helmet. The best way we've found to secure the mic boom without modifying the helmet itself is to use hot glue. First apply a bead of hot glue along the helmet shell where the boom will attach. Apply the microphone boom to that bead, then carefully build up the glue around the mic boom to give it the best grip.



STEP 14: You will need to hold the mic boom securely in place until the hot glue has cooled and cured. Now that the mic boom isn't going anywhere, you can reattach the cheek pad to the helmet over the mic boom. You may need to push the pad firmly against the shell to get the velcro to stick since the boom is between them now. The pad will contour itself around the boom, and will stay securely inside the helmet.





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