There are a few tools and systems that you will have to know how to use in order to operate the PTZ cameras. This document will go over the basics and the common setup instructions for those tools.

How to setup or change a camera's IP Address via Upgrade Tools v2.8C

- 1. Open up Upgrade Tools v2.8C
 - a. This should be on your Desktop or in your downloads folder
- 2. Go to Upgrade v2.8C New Mac (DC)
- 3. Open up the Upgrade app
 - a. It is a green arrow pointing upwards
- 4. Once it is open go to the interface menu and click the dropdown. Select ethernet in that list and hit search.
 - a. If ethernet does not show up check your ethernet cord into your computer
 - b. If no cameras show up after you hit search then you will need to restart your cameras
- 5. Click on the camera that you need to change the IP Address on
- 6. Go to the Config Menu at the top of the Upgrade Program
- 7. Hit Reset in the Config Menu
- 8. Set the Mode to DHCP instead of Manual
- 9. Click Set
- 10. Check Wirecast to see if your camera is coming up via the Plus in a Circle in layer 5. You should see the camera under Network in that menu

How to setup the PTZ Joystick and connect it to the cameras

- 1. Turn on the PTZ Joystick if you have not already done so.
- 2. Hit the Setup Button on your Joystick
- 3. Use the button on the top of the Joystick to select Add Network Device
- 4. In the Camera Field the comes up on the Joystick Screen Type in the number you want to set the camera as on your Joystick. This number should be between 1-6 for easy camera selection and control on your Joystick.
 - a. The Joystick has 6 easy camera control buttons Cam 1-6 on the Top Row.
- 5. Press the Button on the Top of the Joystick to move to the next field.
- 6. For the Protocol use the Joystick to move left and right between option and you want to select VISCA (TCP)
- 7. Press the Button on the Top of the Joystick to move to the next field.
- 8. For the IP Address field enter in your Camera IP Address
 - a. You can find this using Wirecast or the Upgrade Tools v2.8C Program
 - i. Follow the Steps 1-4 of the How to setup or change a camera's IP Address via Upgrade Tools v2.8C of this document to find the cameras IP
 - b. You need to enter this IP Address dot for dot, use the Joystick to move your cursor to the next part of the IP Address

- i. Each Field in the IP Address can hold 3 numbers. If there are less than three numbers you need to move the Joystick to the right to get to the next field.
- 9. Press the Button on the Top of the Joystick to move to the next field.
- 10. For Port type in 5678
- 11. Press the Button on the Top of the Joystick to move to the next field.
- 12. Then select Cam 1-6 (whichever one you set the camera too)
- 13. Add the camera into Wirecast and move it.
 - a. If you do not have control restart the Joystick
 - b. If that does not work repeat the whole process again and make sure you are selecting the right protocol and your are typing in the IP Address correctly.

How to Setup Multiviewer in Wirecast

- 1. You will need an extra monitor of any kind
- 2. Plug it into the computer
- 3. In Wirecast go to Output
- 4. Go to Multiviewer Output
- 5. Go to Configure Displays
- 6. Select the monitor you want to be your secondary monitor
- 7. Set your layout to how you want it using the dropdown arrows
- 8. Select your Labels
- 9. To add in camera shots hover over the window in the bottom and click the gear icon in the bottom right of each window
- 10. Set each window to show what you want it to show.
 - a. To add anything in this it must have already been adding into the Wirecast document.
- 11. Hit Okay in the bottom right when you are satisfied with the settings
- 12. Go to Output again
- 13. Go to Multiviewer Output and Select your monitor in the menu
- 14. You should now see the layout you design on your other monitor.