

Contents

[Introduction](#)

[Prerequisites](#)

[Requirements](#)

[Components Used](#)

[Configure](#)

[Configure Speaker Track and an additional P60 camera with an Sx80 Codec](#)

[Configure Speaker Track and an additional PHD 1080P 4XS2 connection](#)

[Configure Speaker Track 60 to work with Codec C40](#)

[Configure Speaker Track 60 to work with Codec C60](#)

[Configure Speaker Track 60 to work with Codec C90](#)

[Enable the Speaker Track](#)

[Verify](#)

[Troubleshoot](#)

[Diagnostics](#)

[Logs](#)

[Related Cisco Support Community Discussions](#)

Introduction

This document describes how to install and configure Speaker Track to work with C40/C60/C90 and SX80 Codec.

Prerequisites

Requirements

Cisco recommends that you have knowledge of these topics:

- C40/C60/C90/or SX80 Codec
- Speaker Track Unit
- Precision 60 Cameras
- High-Definition Multimedia Interface (
- RJ45 cables

Components Used

This document is not restricted to specific software and hardware versions.

The information in this document was created from the devices in a specific lab environment. All of the devices used in this document started with a cleared (default) configuration. If your network is live, make sure that you understand the potential impact of every command.

Configure

Note: Use the [Command Lookup Tool](#) ([registered](#) customers only) in order to obtain more information on the commands used in this section.

Configure Speaker Track and an additional P60 camera with an Sx80 Codec

Using this setup, Sx80 can be used with the Speaker Track mode (for two cameras) and three cameras can be used in a manual mode.

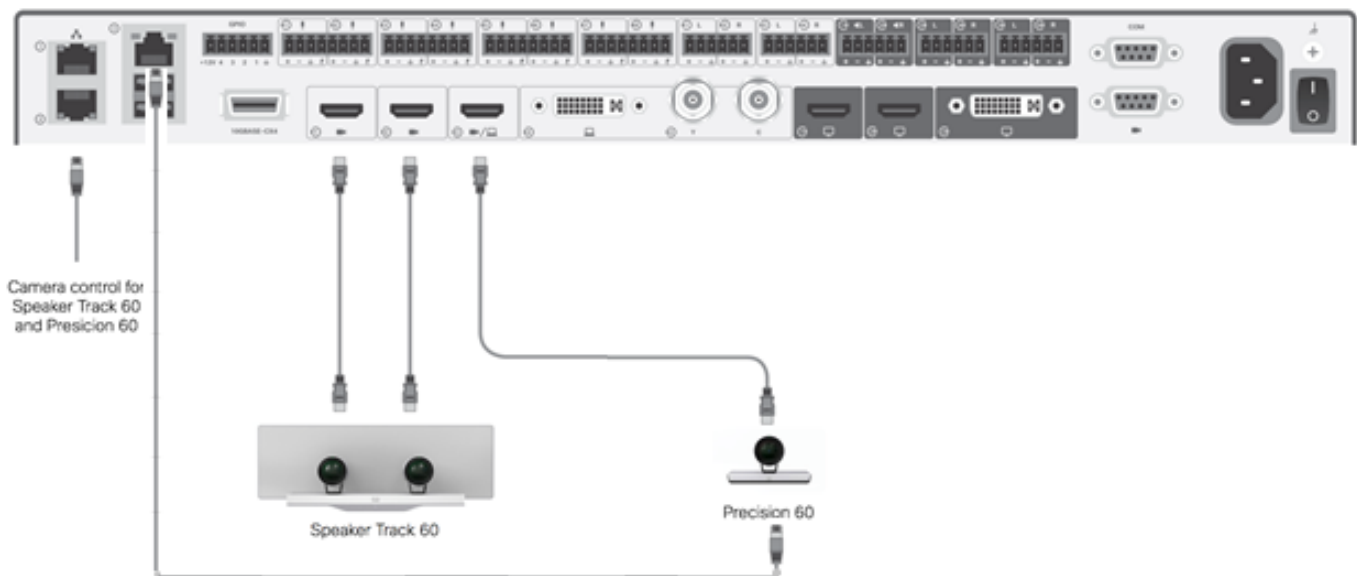
Cabling

1. Port 1 Connects to the Switch Port on the network.
2. Port 2 Connects to the Speaker Track array or the other 3rd P60 camera.
3. HDMI cable from all each Camera goes directly to HDMI 1,2,3 input ports on the SX80.

Configuration

In order to manually control all three cameras, run **xCommand Cameras SpeakerTrack deActivate** command.

This image illustrates the cabling of an SX80 codec connected to a Speaker Track and a Precision 60 camera.



3rd P60 camera requires external power.

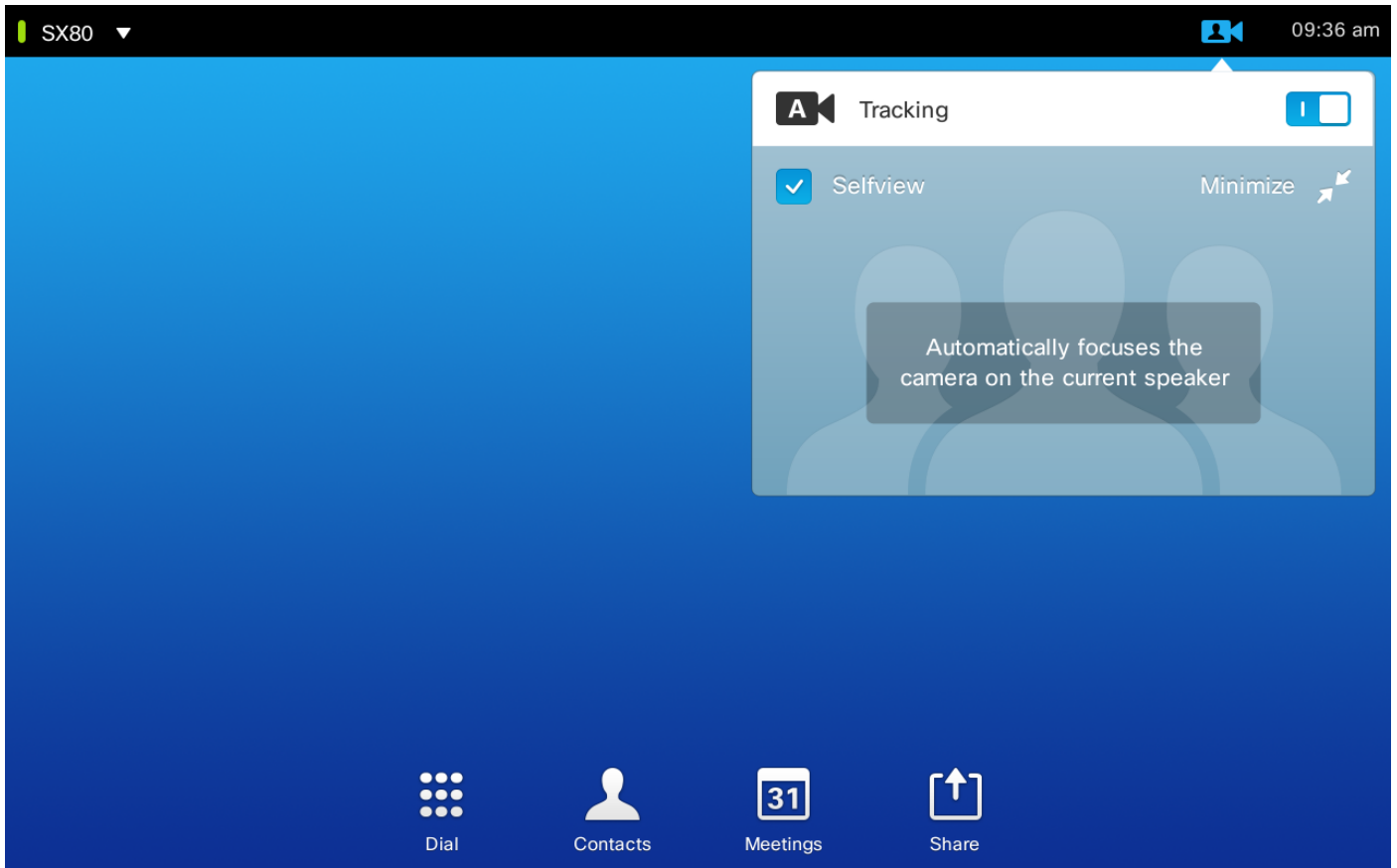
On the codec Web GUI:

The screenshot shows the Cisco Web GUI for the SX80 codec. The 'Peripherals' section is expanded to show the 'Cameras' configuration. The table below lists the configured cameras.

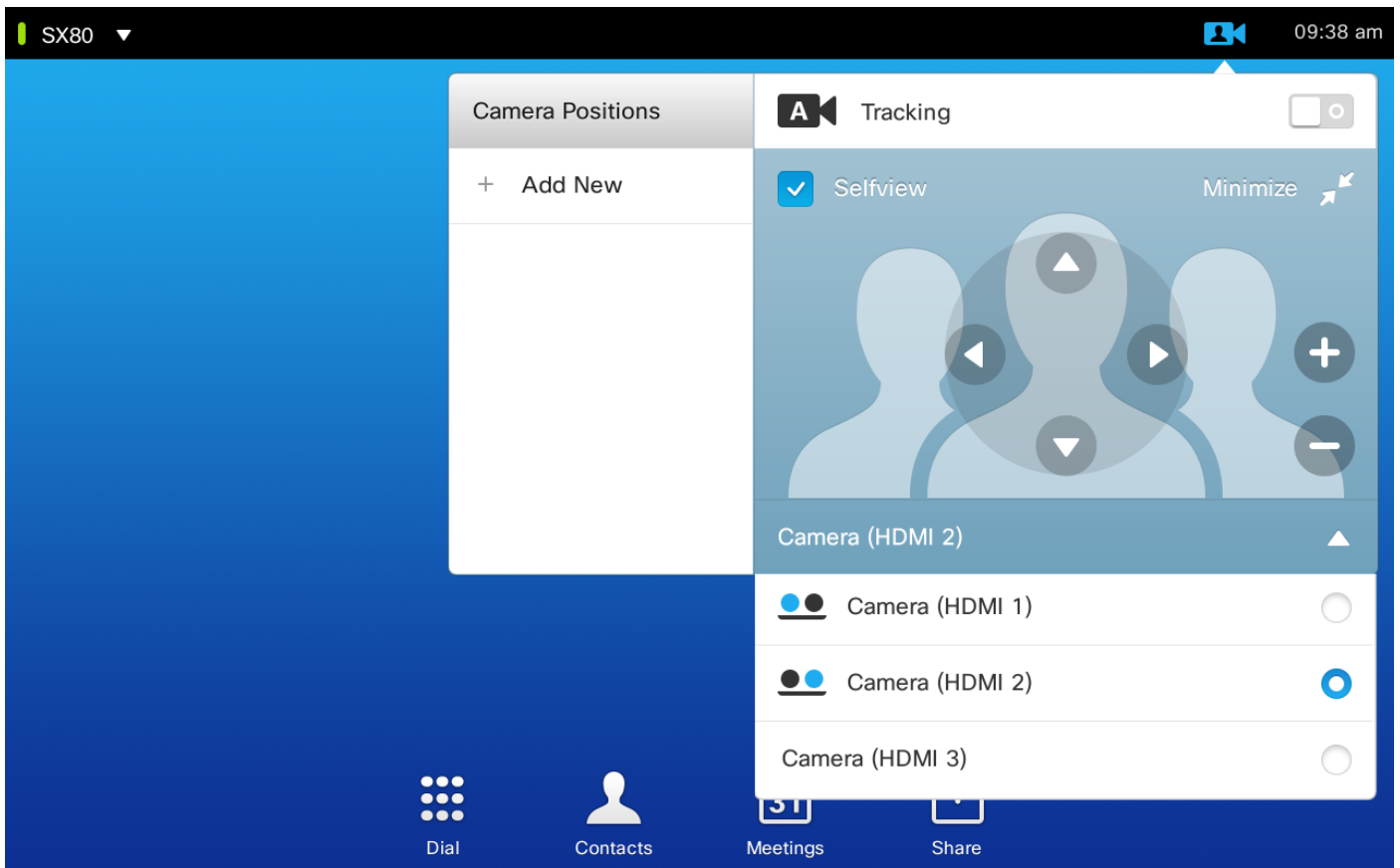
Camera	Camera Model	Software ID	Serial Number	IP Address
Camera 1	Class Precision-60 Camera	HCT 2.0 (Rev. 2014/07/03)	FTTB10005	192.254.1.41
Camera 2	Class Precision-60 Camera	HCT 2.0 (Rev. 2014/07/03)	FTTB10001	192.254.1.42
Camera 3	Class Precision-60 Camera	HCT 2.0 (Rev. 2014/07/03)	FTTB10007	192.254.1.44

Video Inputs	Connector	Name	Resolution
Input 1	HDMI	-	1024x1024 (8bit)
Input 2	HDMI	-	1024x1024 (8bit)
Input 3	HDMI	-	1024x1024 (8bit)

When the Tracking mode is turned on, Speaker Tracking Feature would be functional on 1st and 2nd camera (Speaker Track) as illustrated in this image.



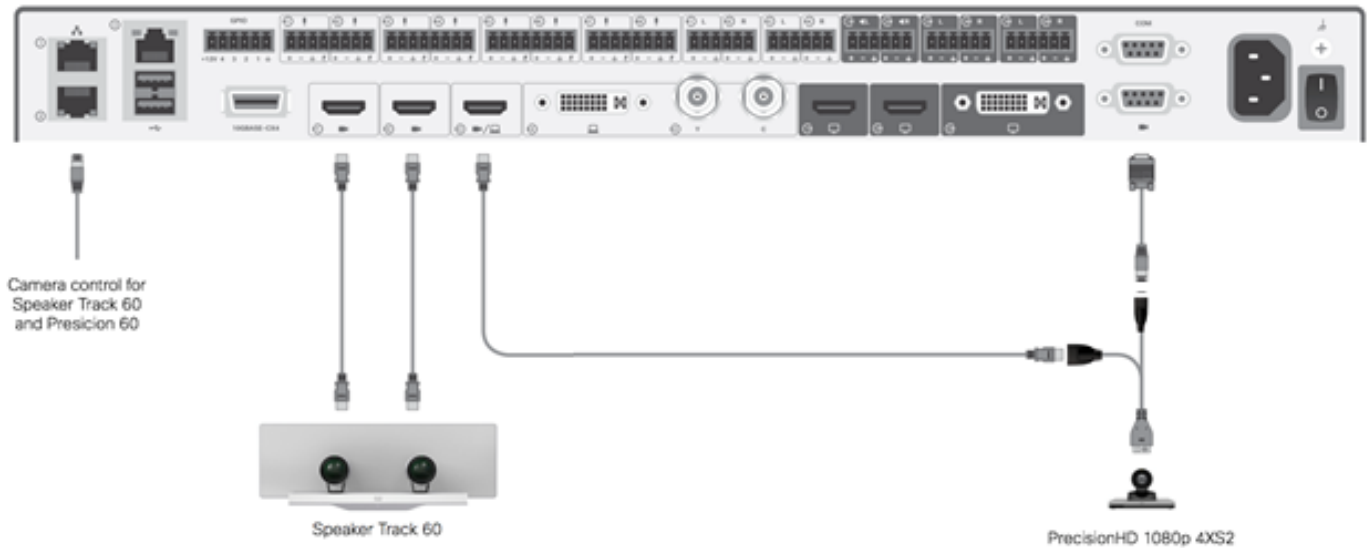
Turning Off the Tracking mode enables all three cameras to use in Manual Mode as shown in this image.



Touch 10 can be paired on the network.

Configure

This image shows the cabling of an SX80 codec connected to a Speaker Track and a Precision 60 camera with an additional PHD 1080P 4XS2 connection.



Precision HD camera requires external power. Visca port on the Sx80 doesn't provide power to the camera.

In order to connect a Precision 1080 4XS to the Sx80 codec, three cables are required: 1 HDMI to HDMI, a standard Visca cable, and a 4xs2 split cable.

Part Numbers:

- CAB-2HDMI-3M=
- CAB-VC-5M=
- CAB-PHD4XS2-SPLIT

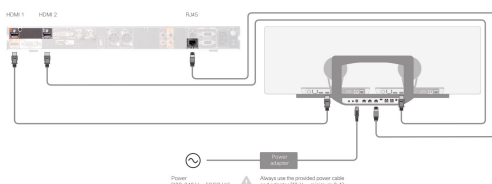
Configure

Cabling

1. Connect the video cables to the camera inputs (HDMI 1 and 2) of the codec.
2. Connect ethernet to the 2nd ethernet port of the codec.

When using a SpeakerTrack 60 with a C Series codec, the

This image shows the C40 cabling with a Speaker Track.

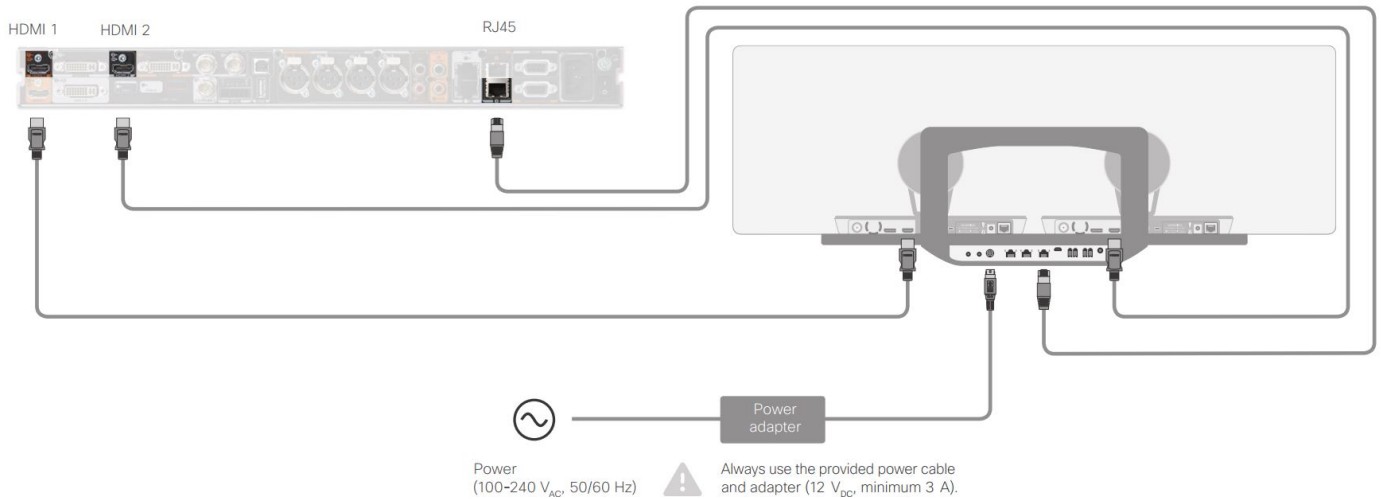


Configure

Cabling

1. Connect the video cables to the camera inputs (HDMI 1 and 2) of the codec.
2. Connect ethernet to the 2n

This image shows the C60 cabling with a Speaker Track.



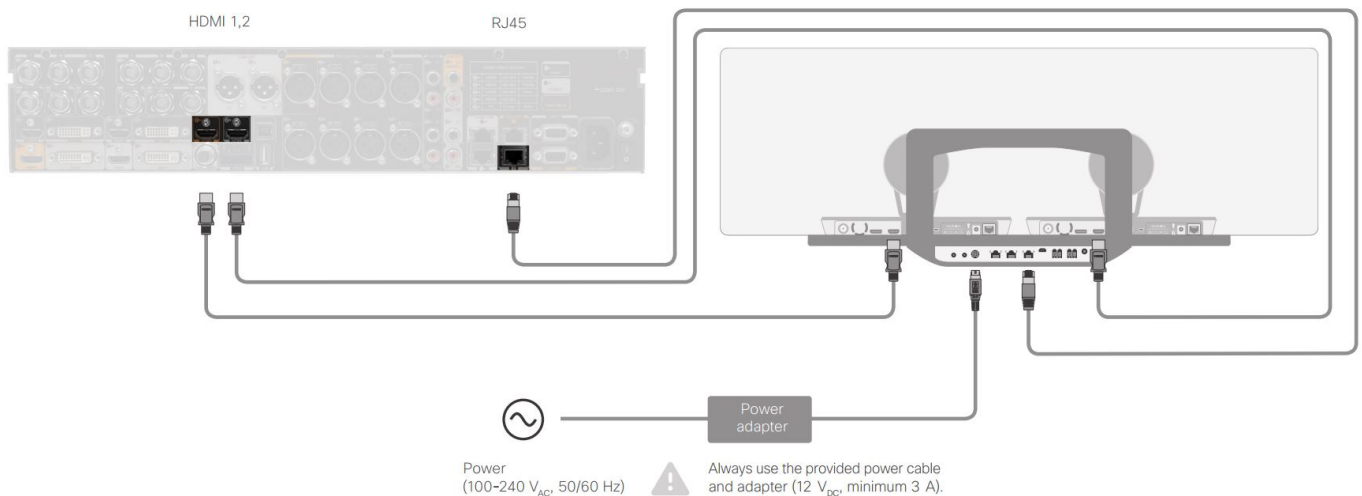
Configure Speaker Track 60 to work with Codec C90

When using a SpeakerTrack 60 with a C Series codec, the C

Cabling

1. Connect the video cables to the camera inputs (HDMI 1 and 2) of the codec.
2. Connect ethernet to the codec's 2nd ethernet port.

This image shows the C90 cabling with a Speaker Track.



Complete these steps in order to install the equipment:

1. Configure the SX80/C40/C60 or C90 codec.
2. Connect a RJ45 cable from the Codec's Network port 2 to the network port of the Speaker Track.

3. Connect the HDMI cables from each camera to the HDMI Input port on the codec.
4. Connect power to the Speaker Track.
5. Connect a RJ45 cable from each camera to the respective network port on the Speaker Track
6. Connect power cables from each camera to the Speaker Track

Enable the Speaker Track

When the cabling is complete, ensure that the Speaker Track configuration is set correctly.

Verify

Use this section to confirm that your configuration works properly.

- Codec- **TC7.3.0**
- Speaker Track- **MT7.3.0**
- Precision60- **HC7.3.0**

1. Make sure the codec, Speaker Track, and camera use the same software version (numbers) suffix.

2. Check the camera status and verify that the camera Serial number and Firmware are correctly detected. **xstatus Camera**

```
*s Camera 1 HardwareID: "55000000"
*s Camera 1 IPAddress: "169.254.1.43"
*s Camera 1 MacAddress: "E4:C7:22:65:3F:D3"
*s Camera 1 Manufacturer: "Cisco"
*s Camera 1 Model: "Precision 60 Camera"
*s Camera 1 Position Focus: 4200
*s Camera 1 Position Pan: 3600
*s Camera 1 Position Tilt: -650
*s Camera 1 Position Zoom: 4128
*s Camera 1 SerialNumber: "FTT181100R5"
*s Camera 1 SoftwareID: "HC7.3.0.8cb420c, 2014-12-12"
```

```
*s Camera 2 HardwareID: "55000000"
*s Camera 2 IPAddress: "169.254.1.44"
*s Camera 2 MacAddress: "E4:C7:22:65:3F:EE"
*s Camera 2 Manufacturer: "Cisco"
*s Camera 2 Model: "Precision 60 Camera"
*s Camera 2 Position Focus: 0
*s Camera 2 Position Pan: 3600
*s Camera 2 Position Tilt: -650
*s Camera 2 Position Zoom: 0
*s Camera 2 SerialNumber: "FTT181100R1"
*s Camera 2 SoftwareID: "HC7.3.0.8cb420c, 2014-12-12"
```

3. Check the Speaker Track status in order to verify the availability and status. **xstatus // speakerTrack**

```
*s Cameras SpeakerTrack Availability: Available
*s Cameras SpeakerTrack LeftCamera VideoInputConnector: 1
*s Cameras SpeakerTrack RightCamera VideoInputConnector: 2
*s Cameras SpeakerTrack Status: Active
```

4. Verify that the Speaker Track firmware is correctly detected. **xstatus // Peripherals**

```
*s Peripherals ConnectedDevice 1045 Name: "SpeakerTrack 60"
*s Peripherals ConnectedDevice 1045 SoftwareInfo: "MT7.3.0.8cb420c"
*s Peripherals ConnectedDevice 1045 Status: Connected
```

*s Peripherals ConnectedDevice 1045 Type: SpeakerTracker

Troubleshoot

This section provides information you can use in order to troubleshoot any issues with the configuration.

Verify the Speaker Track status in order to ensure that the cabling is set correctly.

```
xstatus // speakerTrack
*s Cameras SpeakerTrack Availability: Available
*s Cameras SpeakerTrack LeftCamera VideoInputConnector: 1
*s Cameras SpeakerTrack RightCamera VideoInputConnector: 2
*s Cameras SpeakerTrack Status: Active
```

The description of the output is:

***s Cameras SpeakerTrack Availability** can have one of these states:

- Off
- Unavailable
- Available

Each of the states has a different meaning:

- ***s Cameras SpeakerTrack Availability: Off** - this means that the Speaker Track option is turned off from the configuration.
- ***s Cameras SpeakerTrack Status: Unavailable** - this means that the Control (Speaker Track/Camera) has an issue.
- ***s Cameras SpeakerTrack Availability: Available** - this means that the control cabling is set correctly.

***s Cameras SpeakerTrack LeftCamera VideoInputConnector: 1**

***s Cameras SpeakerTrack RightCamera VideoInputConnector: 2**

This status depicts the HDMI connection of the camera to the codec. The previous status is the expected output if the connection is correct.

If the HDMI cable from the left camera is unplugged, the status changes to:

```
*s Cameras SpeakerTrack LeftCamera VideoInputConnector: 0
*s Cameras SpeakerTrack RightCamera VideoInputConnector: 2
```

If the HDMI cable from the right camera is unplugged, the status changes to:

```
*s Cameras SpeakerTrack LeftCamera VideoInputConnector: 1
*s Cameras SpeakerTrack RightCamera VideoInputConnector: 0
```

This can cause the Speaker Track to not function.

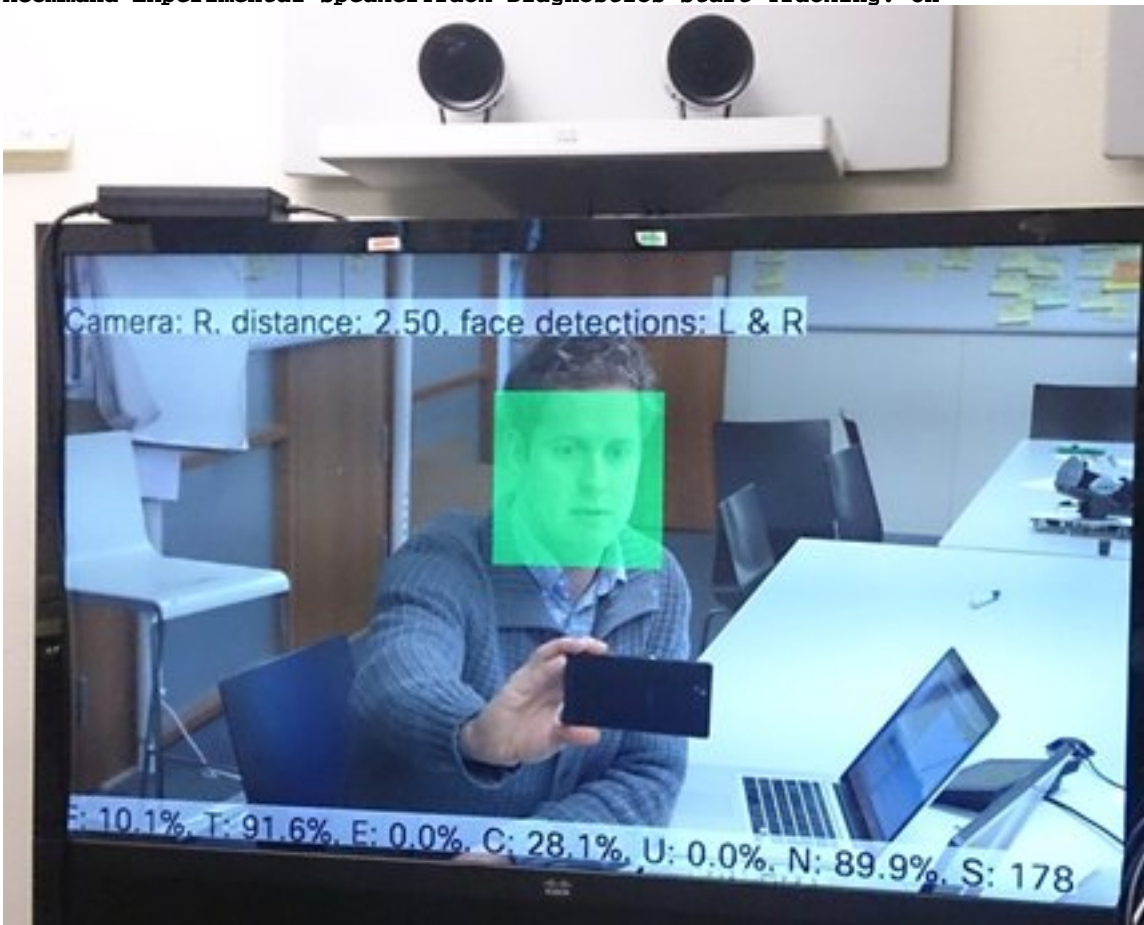
***s Cameras SpeakerTrack Status: Inactive**

The user has selected Manual Tracking and Auto Tracking has been disabled from the touch panel. This can be enabled with the **xCommand Cameras SpeakerTrack Activate** command.

Diagnostics

In order to verify the functionality of the face detection mechanism, enter this command to start the active speaker and face detection:

```
xCommand Experimental SpeakerTrack Diagnostics Start Tracking: On
```



Logs

The logs show a good output sample for a successful install of the Speaker Track.

Endpoint captures the logs at the time of the Camera and Speaker Track Pairing as shown:

```
15342.61 CAMERA I: PairingStatus Starting: 1 Paired: 1 Connected: 1
```

```
15342.61 CAMERA I: PairingStatus MacAddr: 'E4:C7:22:65:3F:D3'
```

```
Ipv4: '' Ipv6: '' Ipv6Global: 'fe80::e6c7:22ff:fe65:3fd3'
```

```
15342.78 CAMERA I: PairingStatus Starting: 1 Paired: 1 Connected: 1
```

```
15342.79 CAMERA I: PairingStatus MacAddr: 'E4:C7:22:65:3F:EE'
```

```
Ipv4: '' Ipv6: '' Ipv6Global: 'fe80::e6c7:22ff:fe65:3fee'
```

```
15342.81 SpeakerTrack I: Peripheral C0:67:AF:58:B8:2D does not need SW upgrade
```

```
15342.90 CAMERA I: PairingStatus Starting: 0 Paired: 1 Connected: 1
```

```
15342.90 CAMERA I: PairingStatus MacAddr: 'E4:C7:22:65:3F:D3'
```

```
Ipv4: '' Ipv6: '' Ipv6Global: 'fe80::e6c7:22ff:fe65:3fd3'
```

The connected status shows that the Speaker Track is successfully installed.