ViewSonic IFP6552 View Board Interactive Display

ViewSonic IFP6552 View Board Interactive Display Instructions

Contents

1 ViewSonic IFP6552 View Board Interactive Display
2 Product Usage Instructions
3 Introduction
4 Air Class
5 AirPlay Service
6 Chromecast Service
7 Display Service
8 Manager Service
9 Miracast Service
10 Over-the-air (OTA) Service
11 vCast & vCastSender Service
12 FAQ
13 Documents / Resources
13.1 References

ViewSonic IFP6552 View Board Interactive Display

Specifications:

- **Wireless Access Points:** Dual-band (5G) preferred
- **Network Connection:** Ethernet cable to in-room wireless access point

Product Usage Instructions

Air Class:
To enter Air Class:

- **For Android phone/tablet:** Scan QR Code
- **For other devices:** Connect to the same Local Area Network and enter the on-screen URL: hp:///(enter your URL here):8080

AirPlay Service:
To use AirPlay:

- Ensure mDNS is enabled on the network/access point/wireless controller
- Connect to in-room wireless access point via Ethernet cable
- Select 5G mode for optimal casting
- Ports for AirPlay: TCP 51040, 51030, 51020, 51010; UDP 5353, UDP random port range 52000-53000

Chromecast Service:
To use Chromecast:

- Ensure mDNS is enabled on the network/access point/wireless controller

Introduction

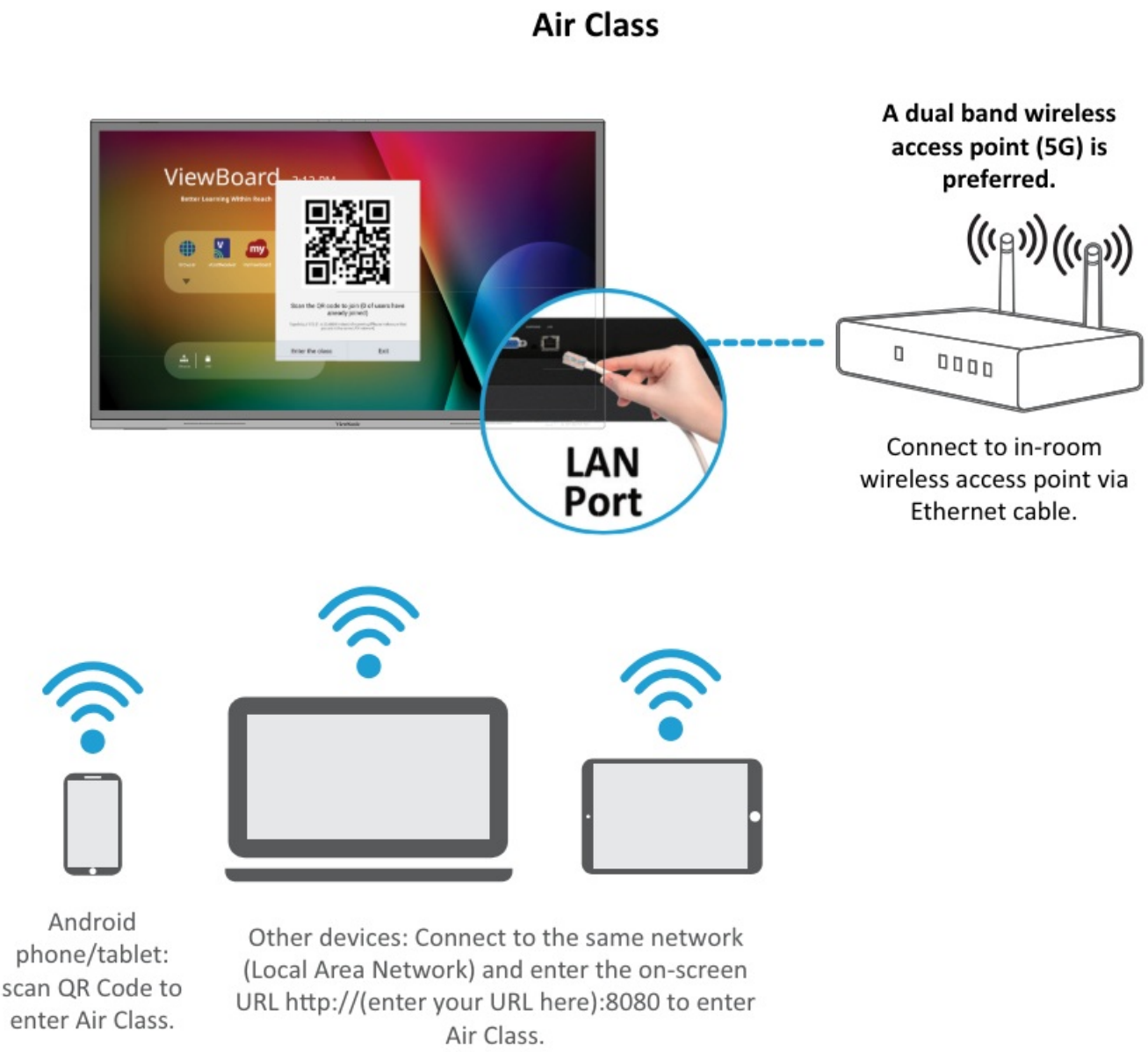
This guide will introduce the network requirements for ViewBoard’s preloaded software and help IT administrators set up ViewBoard products within their IT infrastructure.

NOTE:

- Please ensure the wireless infrastructure supports broadcast service and it is turned ON.
- For a more stable connection, it is recommended to have any ViewBoard® connected via LAN by Ethernet cable, and client devices on a 5 GHz Wi-Fi band.

Air Class

Display quiz questions on a ViewBoard and allow up to 30 mobile users to submit answers remotely. Whether administrating single or multiple-choice questions, the ViewBoard® will record the results of each device being used.

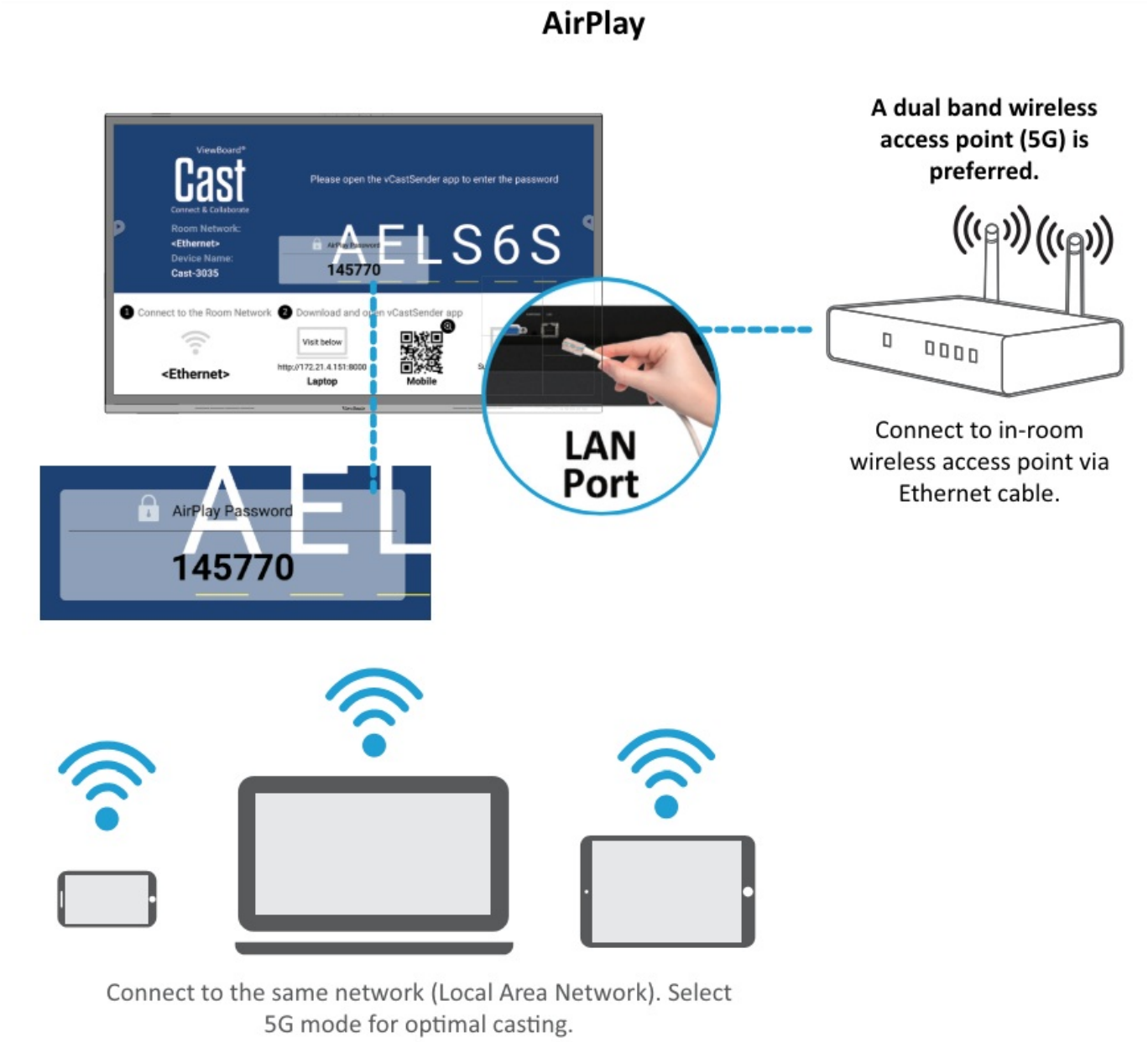


Network Information

- PC (Windows/Mac/Chromebook) and tablet/mobile (iOS/Android) devices, as well as the ViewBoard, need to be connected to the same network subnet.
- **Port**: TCP 8080

AirPlay Service

NOTE: Please ensure that mDNS is enabled on the network/access point/ wireless controller (if applicable).



Network Information

- **Ports**
  - TCP 51040, 51030, 51020 & 51010
  - UDP 5353 (mDNS to broadcast Airplay)
  - UDP random port with a range of 52000~53000 (Transfer audio; assigned by AirPlay protocol)

How to Verify AirPlay is Broadcasting

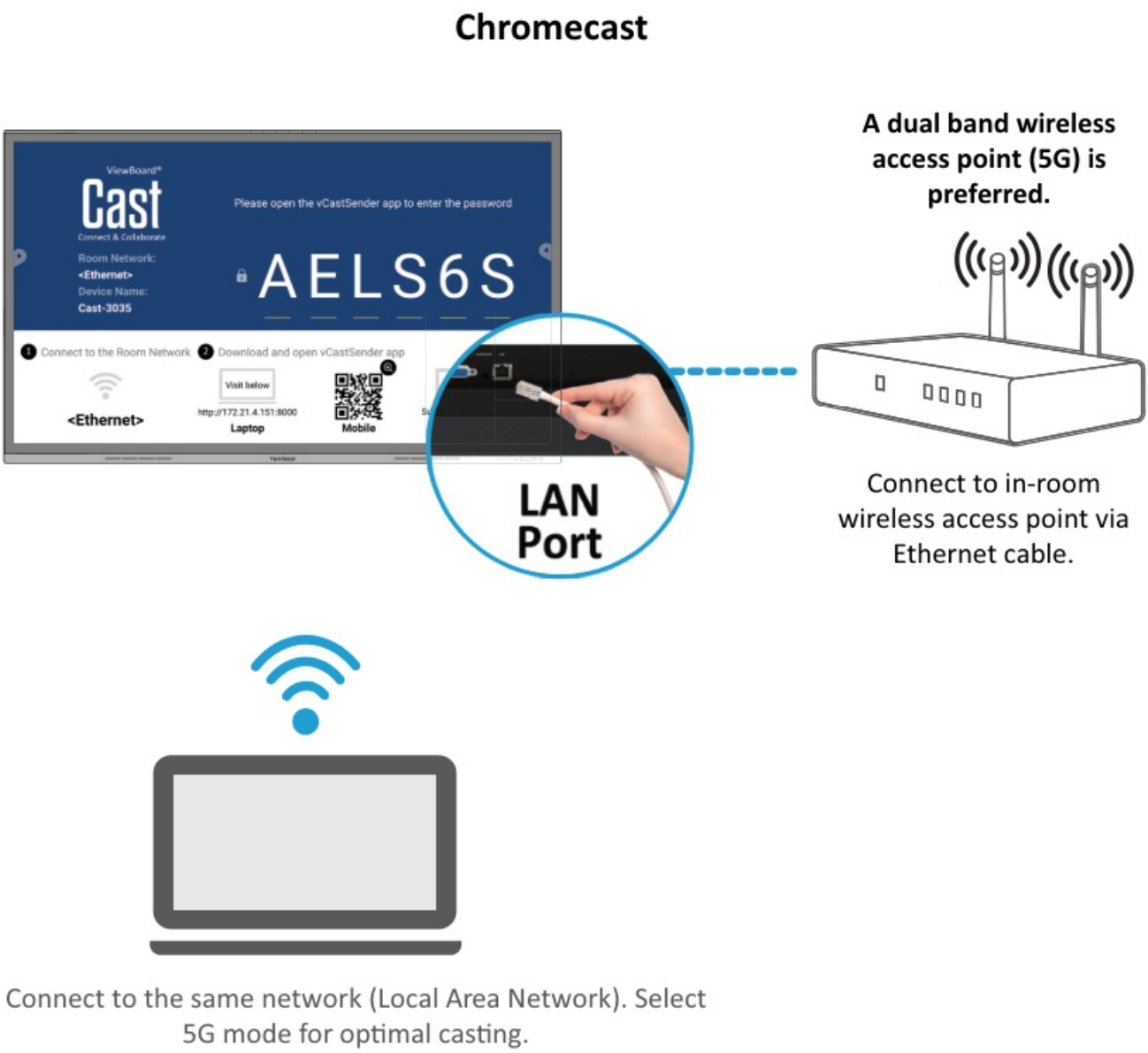
1. Ensure that your iOS device and the ViewBoard® are connected to the same subnet network.
2. Open the Control Center and select AirPlay Mirroring on the iOS device (e.g., iPhone/iPad).
3. Find a device prefixed with “Cast-xxxx”.
4. If “Cast-xxxx” is showing then this confirms that vCast is broadcasting AirPlay services.

5. Click on the broadcasted “Cast-xxxx” device to mirror your iOS device to the ViewBoard®.

Chromecast Service

ViewBoard® Cast software supports native Chromecast screen sharing via the Chrome browser casting with the Chromecast feature enabled.

NOTE: Please ensure that mDNS is enabled on the network/access point/ wireless controller (if applicable).



Network Information

- **Ports:**
  - TCP 8008 & 8009
  - UDP 5353 (mDNS to broadcast CCast)

How to Verify Chromecast is Broadcasting

1. Ensure that your Chromebook and ViewBoard are connected to the same subnet network.

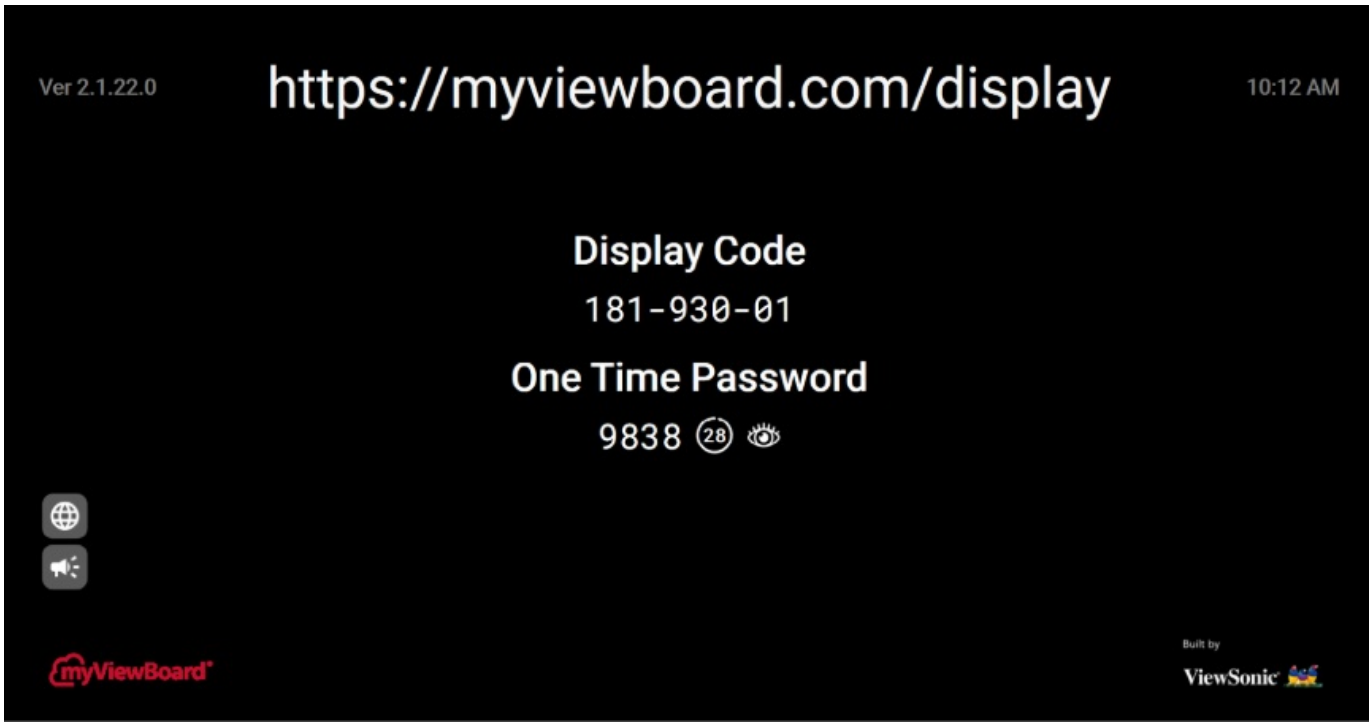
2. **Bandwidth**: At least 2~5 Mbps per user in a typical deployment. Latency should be less than 100 ms when pinging Google's public DNS server at 8.8.8.8; for HD video streaming > 5 Mbps is required.
3. **Access points:**
    - For small deployments of under 30 devices, consumer-grade networking equipment is sufficient.
    - For deployments greater than 30 devices or involving multiple rooms, enterprise-grade, centrally managed networking equipment is recommended.

NOTE:

- It is recommended to use Wi-Fi 802.11n 5 GHz.
- Please refer to a 5 GHz channel guide for a table on non-DFS channels in your country. In the USA, those channels are 36~48 and 149~165.

Display Service

- myViewBoard Display allows users to mirror their desktop wirelessly to supported Interactive Flat Panels (IFP) and Wireless Presentation Displays (WPD).
- myViewBoard Display comes pre-installed on select ViewBoard® hardware, but can also be installed manually on any IFP or WPD that runs Android 6 or higher.
- Once myViewBoard Display is installed on an IFP or WPD, users will only need to use a compatible browser to start mirroring their device screen to the host.



Network Information

Ports:

- **TCP Port 443 (HTTPS):** outbound
- UDP and TCP port 3478 bidirectional to the WebRTC servers

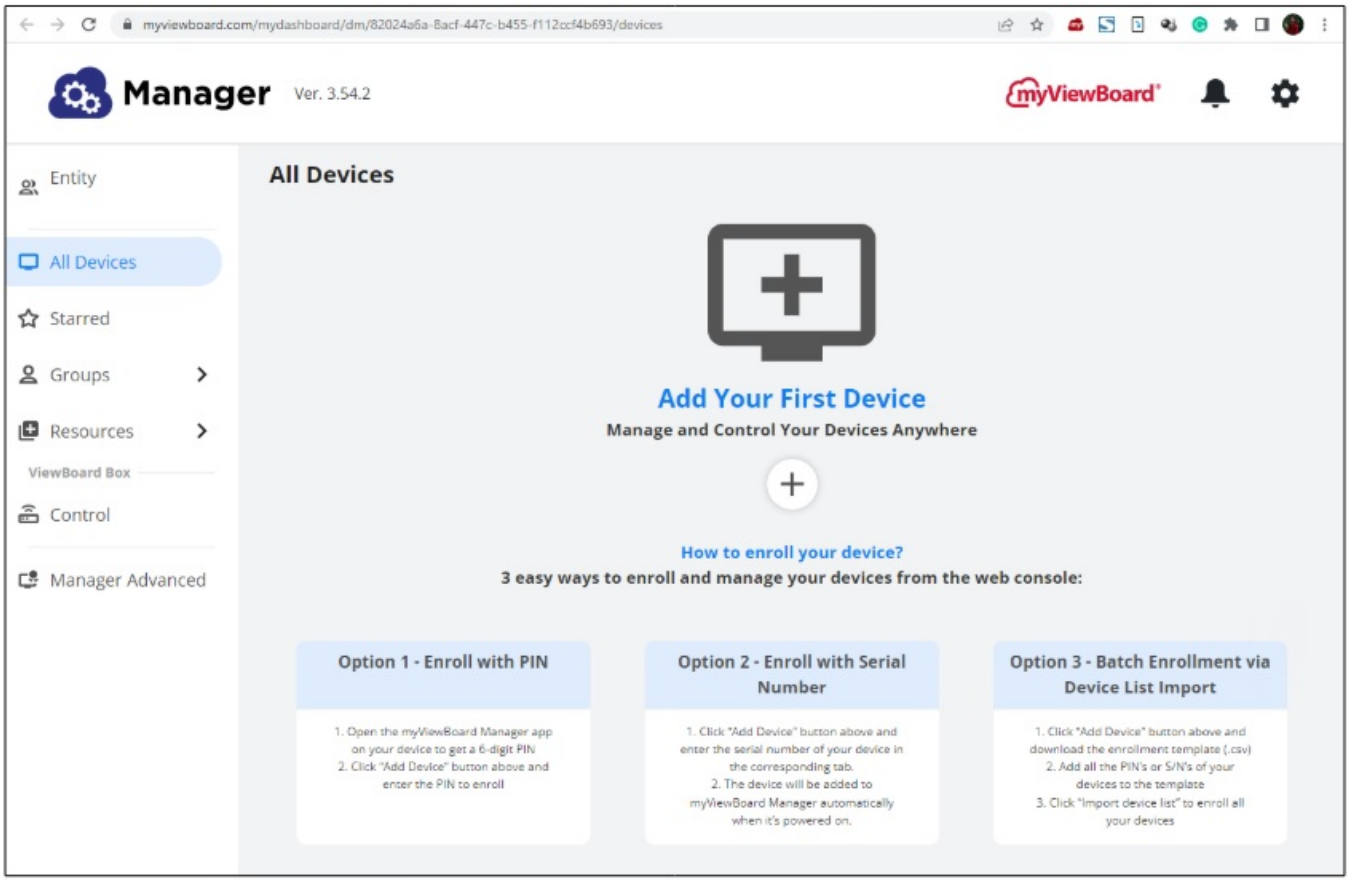
- UDP Ports 50,000 – 65,535 (RTP/sRTP/RTCP) bidirectional to the WebRTC servers (These ports are optional; if blocked, media will be proxied using TURN on port 3478.)

Manager Service

myViewBoard Manager is a tool for Entity Administrators to remotely manage multiple installations of ViewSonic visual solution devices such as a ViewBoard®. To access, select the Entity Management tile, then All Devices on the side panel.

NOTE: This option is only available for users signed in using an Entity Administrator account.

To learn more, visit: https://myviewboard.com/kb/manager.



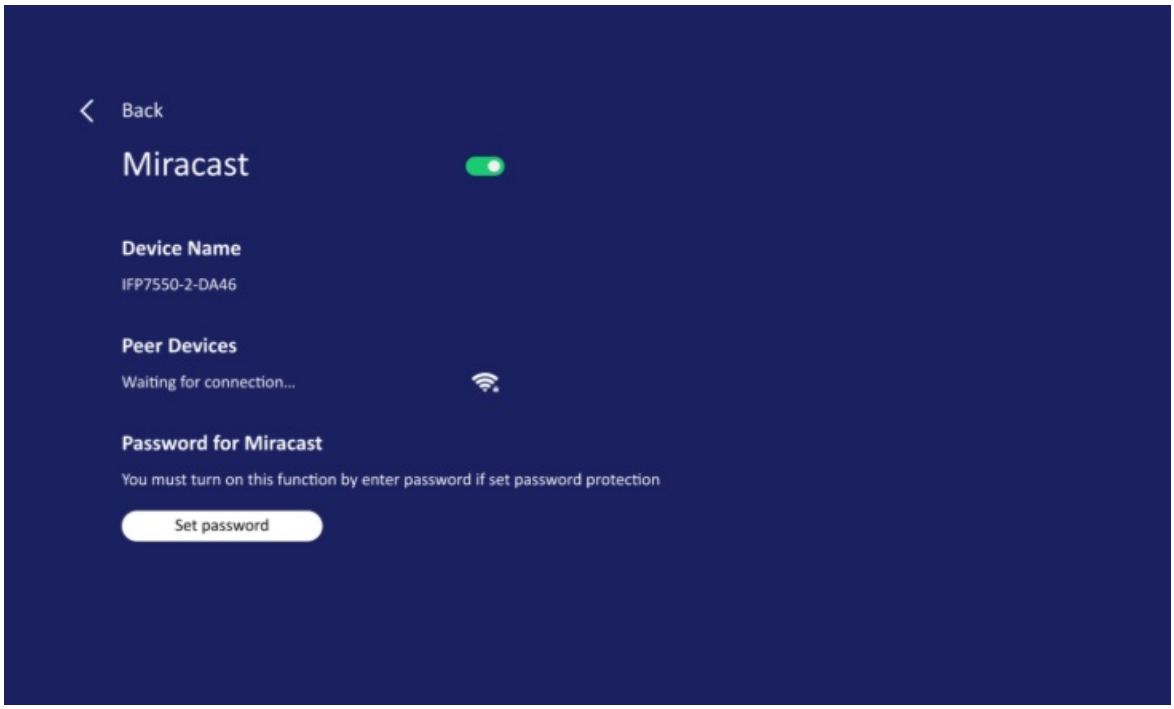
Network Information

- **Ports:**
  - TCP Port 443 (HTTPS): bidirectional
- **Whitelist Domains:**
  - **myviewboard.com**
  - myviewboard.cloud
  - **myviewboardclips.com**
  - **firebaseio.com**
  - **amazonaws.com**

Miracast Service

Miracast helps you wirelessly stream content from Windows and Android devices to an Interactive Flat Panel (IFP) or Wireless Presentation Display (WPD).

NOTE: Please ensure that mDNS is enabled on the network/access point/ wireless controller (if applicable).

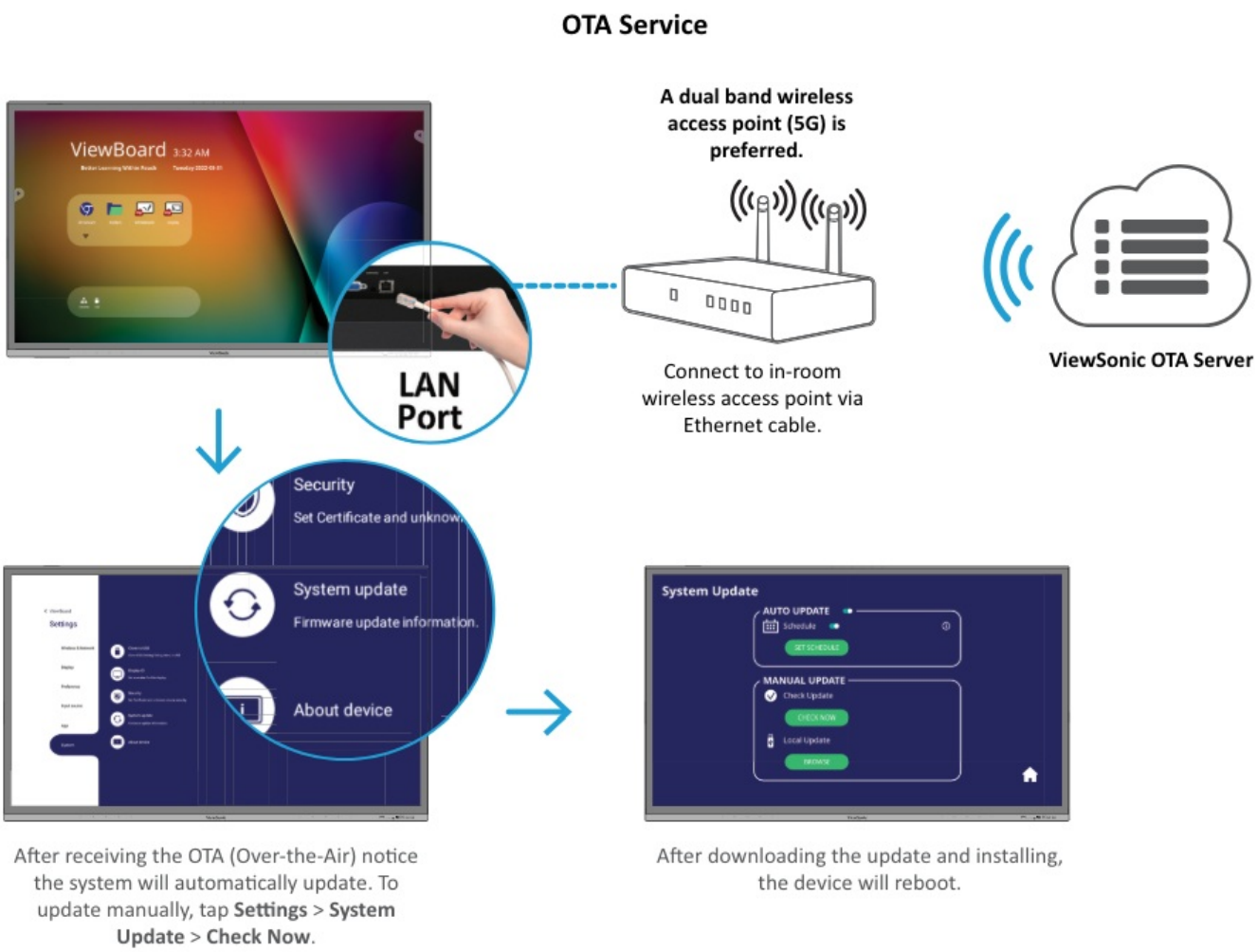


Network Information

- **Ports:**
  - **TCP Port 7236:** Wi-Fi direct control port used to establish and manage sessions between the source device and ViewBoard.
  - UDP port 21200 for RTP packets and UDP port 21201 for RTCP packets.
  - UDP 5353 for multicast DNS (mDNS) broadcast to the local subnet.
  - **IP address(s):** IPv4 address: 192.168.49.0, subnet mask: 255.255.255.

Over-the-air (OTA) Service

If Auto Update is enabled on a ViewBoard® and it is connected to the Internet, it will automatically search for firmware updates. If an update is available, the ViewBoard® will automatically download and install it then reboot.



Network Information

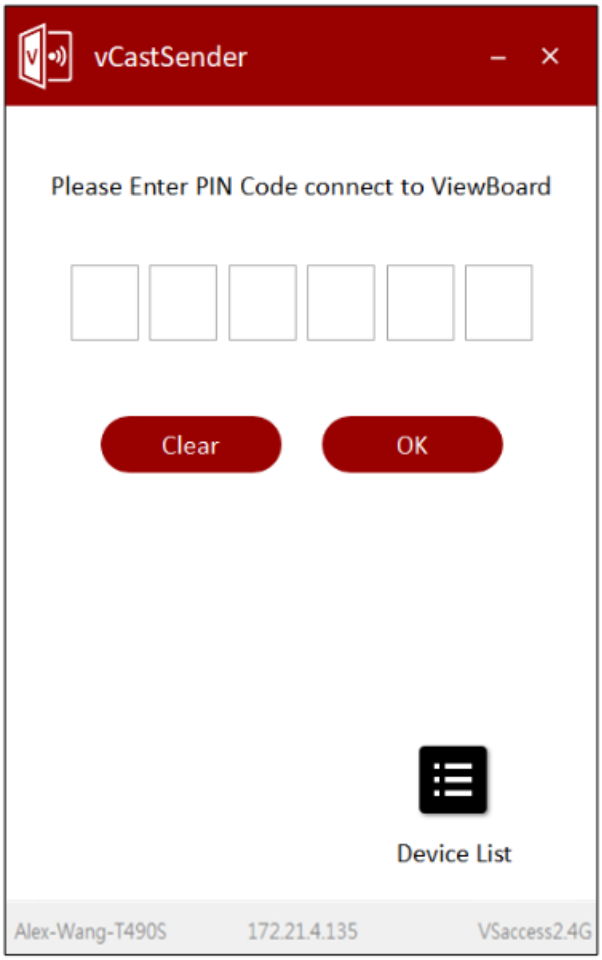
- **Server FQDN Name:** ifp-ota.s3-accelerate.amazonaws.com, www.viewsonicglobal.com
- **Server Port:** TCP 443

vCast & vCastSender Service

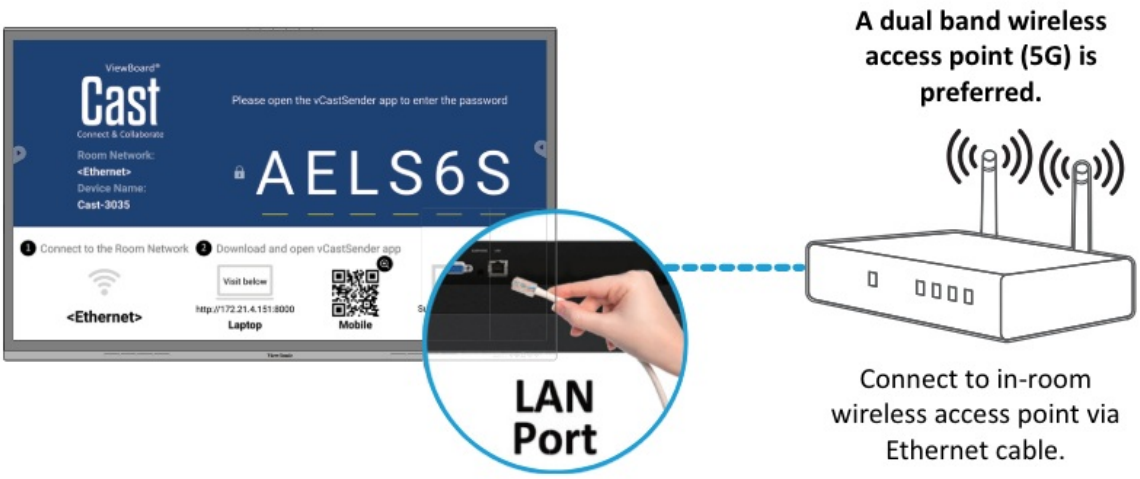
Working with ViewBoard Cast software, the vCast application, will allow the ViewBoard to receive vCastSender laptop screens (Windows/Mac/Chrome) and mobile (iOS/Android) users' screens, photos, videos, annotations, and camera(s).

Network Information

- ViewBoard Cast software, laptops, and mobile devices can connect to both the same subnet and cross subnet network.
- Please enter the on-screen PIN-code to connect to the ViewBoard



vCast



A dual band wireless access point (5G) is preferred.

Connect to in-room wireless access point via Ethernet cable.

Connect to the same network (Local Area Network). Select 5G mode for optimal casting.

- **Ports:**
  - TCP 56789, 25123, 8121 & 8000 (Controlling message port & client device audio transfer)
  - TCP 8600 (BYOM)
  - TCP 53000 (Request share screen)
  - TCP 52020 (Reverse control)
  - TCP 52025 (Reverse control for ViewBoard Cast Button)
  - TCP 52030 (Status sync)
  - TCP 52040 (Moderator mode)
  - UDP 48689, 25123 (Device searching and broadcast & client device audio transfer)
  - UDP 5353 (Multicast search device protocol)
- **Port and DNS for Activation:**
  - **Port**: 443
  - **DNS**: **https://vcastactivate.viewsonic.com**
- **OTA Service**
  - **Server Port:** TCP 443
  - **Server FQDN Name:** **https://vcastupdate.viewsonic.com**

FAQ

How to Verify AirPlay is Broadcasting?
To verify AirPlay broadcasting, follow these steps:

1. Connect to the same Local Area Network
2. Open the Control Center on iOS device
3. Select AirPlay Mirroring
4. Find a device prefixed with Cast-xxxx
5. If Cast-xxxx is showing, vCast is broadcasting AirPlay services
6. Click on the broadcasted Cast-xxxx device to mirror your iOS device

How to Verify Chromecast is Broadcasting?
To verify Chromecast broadcasting:

1. Connect to the same Local Area Network
2. Check for broadcasting Chromecast services

Documents / Resources

	**ViewSonic IFP6552 View Board Interactive Display** [pdf] Instructions IFP6552 View Board Interactive Display, IFP6552, View Board Interactive Display, Board Interactive Display, Interactive Display, Display

References

- Cloud Computing Services - Amazon Web Services (AWS)
- ifp-ota.s3-accelerate.amazonaws.com
- ViewSonic - Home
- Manager myViewBoard Knowledge Base
- vcastactivate.viewsonic.com
- User Manual