Video conference case study

Build a simple video conferencing web app (frontend ReactJs app and backend Node server). The app should do the following

Build two pages in ReactJs

1. Host view page (refer attached image for design)
2. Participant view page (refer attached image for design)

When host clicks on the timer (15 sec, 30 sec, 45 sec, 60 sec etc), there should be a countdown timer displayed on the participant page. The timer should refresh every second and should be on the screen till it reaches zero. Once the timer reaches zero, it should play any sound. Please use websockets to communicate between host and participants.

Technologies/libraries/languages to use: React, NodeJs, Typescript, MaterialUI

Please note: You don't need to integrate actual video streaming API. You just need to build the pages and a server to send the timer details to the participants.

Bonus:

1. Host can remove any participant during the video session
2. Host can mute all the participants
3. Once host ends the video session, it ends for all the participants