Whiteboard challenges are a popular format for assessing design skills in tech interviews because they give your interviewer the chance to observe your design process, communication, and collaboration skills live.  
  
Typically, you and your interviewer(s) are together in a room in front of a whiteboard. If you're interviewing remotely, you may screenshare a tool like Google Jamboard or Miro. You'll have about 45 minutes to answer a vague prompt such as "Design an app that tracks your emotions throughout the day."  
  
The keys to acing whiteboarding challenges are:  
To follow a set of steps that allows you to down-scope the problem statement quickly and logically, enabling better design decisions as you go, without losing focus or rambling.  
To focus on cleanly demonstrating your design process rather than stress over arriving at a working solution.  
To work with your interviewer throughout -- they're there to help!  
  
In this lesson, we'll teach you a framework for moving through whiteboarding challenges with ease, as we work through a real example: "Design an interface for ordering food on an airplane." Let's begin.  
  
What Interviewers Are Looking For  
  
The key thing to remember about whiteboarding challenges is not to focus too much on the solution. An hour is simply not enough time to come up with a complete and polished design, especially given all the problem-scoping you'll have to do upfront.  
  
So, if the solution isn’t the focus, what is?  
  
Interviewers are looking for:  
A cleanly-articulated and logical design process that satisfies both user and business requirements.  
Decisiveness in ambiguity.  
Communication and collaboration skills that will make you an effective team member.  
  
The whiteboarding challenge format was designed to emulate an organic working session; something that you'll do every day on the job. Interviewers know you can't possibly capture all the details you'd have before going into a real working session which is a great benefit to you - enabling you to bring your authentic self and show that you’re a great collaborator.  
  
Although the success criteria may seem nebulous, there are some surefire ways to ace the interview.  
  
Acing the Whiteboard Challenge  
  
Let's assume we're asked to "design an interface for ordering food on an airplane."

Step 1: Set Context (7-10 minutes)  
First, write down the prompt. It's the simplest way to immediately check for alignment. From there, you'll want to gather context that will help you scope the problem into something more workable. Some questions that would be helpful to ask:  
What is the goal we’re trying to achieve with this design?  
How will we know if we’re successful? Are there any metrics or indicators we’re trying to affect?  
Is there a specific platform we need to design for (i.e. web, iOS, kiosk, etc.)?  
What is the scope or timeline for this project?  
Are there any other constraints or contexts we need to consider?  
  
You're interviewer may not give you concrete data for all your questions - they may ask you to go with what you feel is the next best step. Remember, they're assessing your problem-solving and collaboration skills, so don't be afraid to check in with them early, and often. They’re there to help guide you, and provide enough information to help you feel ready to continue working. Remember, you can't go wrong if you show that you care more about understanding the problem than rushing to a solution.  
Returning to our example question design an interface for ordering food on an airplane, you could try asking:  
Why is it important that someone is able to order food on the plane? What’s the goal here?  
Can I assume that ordering would be done on the plane’s headrest screen?  
What other constraints or context would be helpful to know?  
Let's assume that, through your questioning, you've defined the following product goals and constraints:  
Goals: Alleviate flight attendant capacity, get food to customers faster, highlight premium food options  
Constraints Ordering must be done from the headrest, we're only accepting card payments (credit or debit.)

Step 2: Create a Persona (7-10 minutes)  
Once you've set context, you need to figure out who you’re designing for! As a product designer, especially in tech, it is essential to design with your users in mind.Your process for building user personas may look different depending on the type of prompt you receive, but here are some good basic questions to get you started:  
Age range or generation (millenial, Gen Z, etc.)  
Income  
Location  
Job or career  
...etc.  
These shouldn’t be the only questions you ask -- you don't want to run the risk of defining a solution based on stereotypes. The bulk of your questions should be relevant to the prompt, such that they help you learn more about your users’ behaviors and use cases.  
How often are the users we’re targeting using our airline?  
Are our users usually traveling alone or in a group?  
Is there a sense of what our users are ordering the most? The least?  
Are our users known to have any special dietary restrictions?  
Is there anything else we should call out about our target users?  
Just like when you’re setting context, your interviewers may not have the answers to everything. That’s okay -- you just want to create enough context to feel confident making design decisions going forward, and have enough clarity to trace design decisions back when talking through tradeoffs, answering followups, and summarizing at the end.  
Let's assume we're given the following information about our users: they typically range from age 18-45, they tend to have higher incomes, they're often frequent flyers, they usually travel alone, and they have a need for gluten-free and/or nut-free options.

Step 3: Design the Experience (20-25 minutes)  
Now that you have all the context you need around the problem and user base, you’re set to start designing a solution. The experience can be broken down into two parts:  
User flow → A user flow is a series of steps that represents the tasks or interactions the user would go through when using your solution. This can be drawn out as a flow chart or a simple enumerated list.  
Key screens → Key screens are low-fidelity sketches that highlight the important steps of your user flow. This is a great opportunity to show how you ideate visually, sketching out wireframes to bring the user flow to life.  
Remember, there isn’t much room (or need) for polished designs. The key is to show how you translate the goals outlined when setting context into a tangible solution.Ask yourself, “if I only had this hour to design something that’ll be built immediately, what absolutely needs to be shown?”  
With an airline interface for ordering food, the user flow might look like this:  
User taps ‘Menu’ option.  
User browses options.  
User selects options to add to cart.  
User goes to checkout.  
User can insert card into terminal.  
Once payment is complete, the order is sent to the flight attendant to finish the order.  
And with that flow, key screens to show might be:  
The home screen, where users first access the food menu, which emphasizes ordering food in order to encourage fliers to order from the app.  
The food menu, where users can choose between food and drink and also filter options by price or dietary needs.  
The checkout screen, where users can review and edit their cart.

Step 4: Summarize (2-6 minutes)  
You’ve answered the prompt -- congratulations! However, you're not done yet. Leaving time for a clean, reflective summary provides some important benefits:  
Summarizing the challenge helps remind your interviewers of how much ground you've covered in a short amount of time, which, if you’ve done everything, is a lot!  
You give yourself an opportunity to reflect on what you could’ve done differently. It’s understood that these challenges won't always go smoothly -- this is hard, and with the time pressure and high-stakes, interviewers expect some hiccups -- but it’s important to acknowledge mistakes and call out what you'd do differently, perhaps with more time or resources. This signals your appetite for growth and feedback (always valuable character traits) and reinforces your decision-making and problem-solving skill.  
A common phrase in the industry is “design is never finished.” With that in mind, take this time to express what you would do next. Now that you’ve designed a solution, would you iterate? Could this solution immediately go into testing? How would you make sure this design is successful?  
The goal here is to reinforce your success in answering the prompt well by highlighting your design process and skill set. Some questions to think about:  
Could you have taken a different, more compelling, direction?  
If you had more time, what would you have done differently?  
Were there any use cases worth exploring that you didn’t get to?

Returning to our prompt, your summary might look like this:  
Looking at the work we’ve done, I want to synthesize how we solved for designing an interface for ordering food on an airplane.  
Before working through a design, we agreed that this is something we needed to do because flight attendants aren’t able to handle receiving orders and fulfilling them fast enough, so this solution should help flight attendants and fliers alike. We also determined that this solution is mainly so fliers can order meals and beverages outside the standard offerings, particularly for those who are allergic to nuts but still would like a snack.  
Looking at the designs, I think I may have overindexed on the menu browsing experience. I didn’t focus enough on the fact that there are only a few popular food and drinks at most. If I could go back and update this design, I would probably make the main menu screen surface the popular choices more prominently. Something else that comes to mind is accepting other payment methods. I know we limited this to card payments, but what if we allowed cash or even crypto payments?  
Another consideration that could help us further achieve our goal of lowering flight attendants’ burden is designing the experience of how fliers would be notified of this capability. An idea that comes to mind is after the safety instruction, airing a quick video or even static screen explaining that ordering from the headrest of front of you is simple and fast.  
Something I also would’ve done is quickly prototype a screen and visualize that on a headrest screen. I’m actually not too familiar with the size or form factor so it would’ve been helpful to double check all my tap targets were accessible.  
The whiteboarding challenge can be one of the most daunting portions of the design interview process. There’s only so much you can do to prepare -- in the end you’ll have to trust your critical thinking skills. Going through these steps, you should be able to succeed in exemplifying a clean design process, decisiveness in ambiguity, and communication and collaboration skills.