Eric James
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Research Scientist

Dear Facebook Reality Labs hiring team,

I believe that by better understanding how humans interact with their environments and with each other, we can drive innovation and understanding of how to create more positive experiences in how we interact with computers. I believe that we are at a unique point in time where this understanding is greatly coupled with the psychology and biology of the person; where we can learn both from overt behaviors, and also through biosignals which were once hidden to us. I believe that Facebook Reality Labs is well positioned to tap into these components through elegant research design and interdisciplinary efforts to give users a next level experience. Finally, I believe that you should hire me.

You should hire me because the concepts of "Neuroscience, Psychology, Data Science, Research Design, User Insights, Biosignals, Machine Learning, VR, AR, EEG, HCI, BCI" are not just a list of words I gathered while learning more about this position, but rather a list of things that I have worked on in depth over the last 4 years as a PhD researcher in Neural and Behavioral Science.

My latest projects involved combing sensor inputs from EEG, EMG, motion tracking, and eye tracking to create a comprehensive profile for different physiologically-relevant movements made in VR, and then transforming this input into feature vectors for classification. I've also run similar analysis at mock real-time speed to predict upcoming movement intention on the go. My latest design piggy-backs off of the Rubber Hand Illusion and Ramachandran's Mirror Box to give stroke patients an experimental therapy based on illusion through an embedded gain factor relative to their degree of hand opening, answering the question: Does the illusion of success influence success?. Alongside VR, I've had experience designing AR applications too, as my team won 1st place in the "VR4REHAB" hackathon with an exploratory memory game for children in the clinic.

I am also no stranger to statistics or general data crunching, and I have done analyses ranging from employing large-scale machine learning methods to running t-tests, and everything in between. Having experience as a researcher in academia has taught me to design effective end-to-end experiments, while becoming confident in multiple programming languages such as MATLAB, Python, C#, basic SQL, and even Unity3D to create environments and games.

That said, I was not limited to only working with computers: My degrees in Psychology and Neural and Behavioral Science prepare me to assess situations and better understand users, motivations, and behaviors. At the same time, my research projects taught me to effectively collaborate at an international level across disciplines with game designers, scientists, and businesses to create my paradigms and deliver results.

In addition to these experiences, I maintain a role as a technical and business liaison for a medical innovations incubator. Here, I have put my skills toward building consumer products and services for companies and startups, all the while further diversifying my insight and understanding of market and user behavior. I even have led teams during two 100-day startup accelerator programs, where I learned the importance of iteration, conducting effective customer interviews, and building consumer archetypes. Together, we communicated effectively and worked agilely in order to refine our concept and successfully pitch the idea at the end of this 3-month period, achieving a first- and a second-place. One of these ideas revolved around gamified VR for rehabilitation, the other around 3D printed biology labs.

My track record will show you multiple relevant first-author publications exploring VR, biosignals, and machine learning; in-depth insight into deciphering customer needs and behavior; dual-wield experience in both science and business; international collaboration and team-building experience; and an aptitude for presenting clear results and concepts to my peers and the general public.

I am ready to bring my broad skill set and deep expertise to the Facebook Reality Labs team. Working together, I believe we will create additional value to the company by better understanding users, further refining user experience, and delivering the next level of human-computer interaction.

This is why I think you should hire me.

Need more to be convinced? Please feel free to contact my references:

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