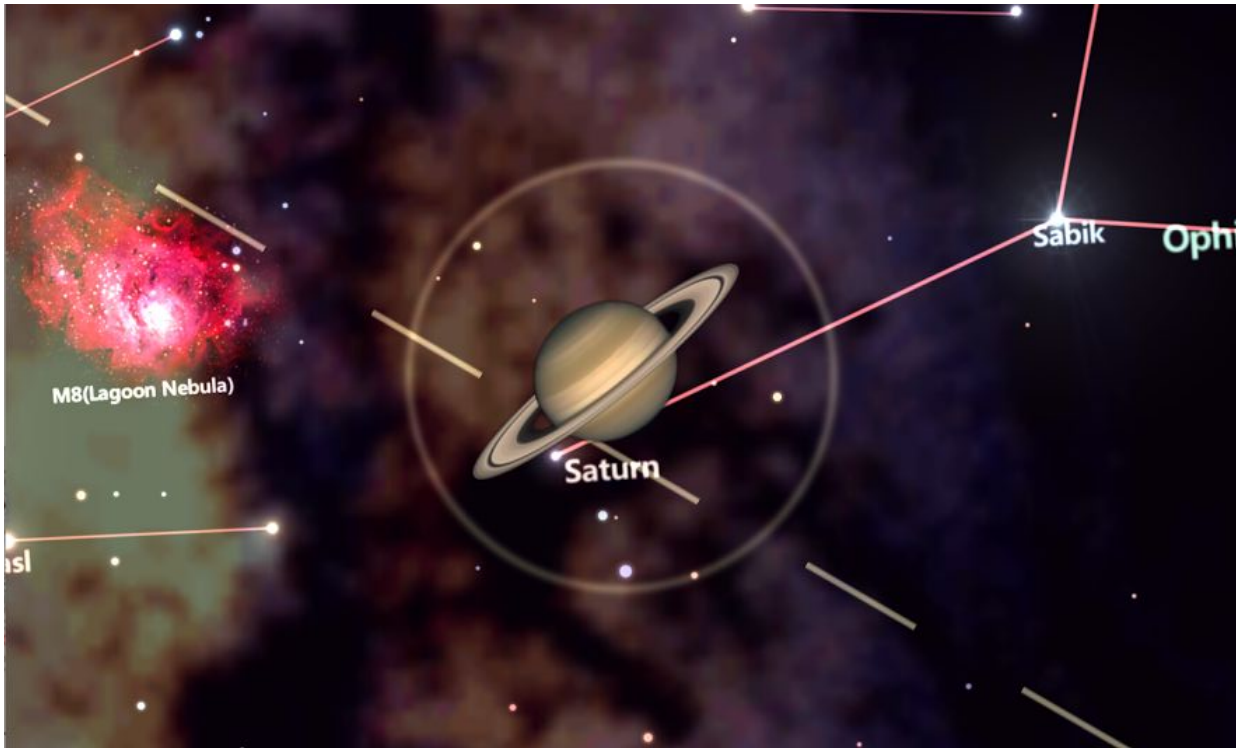
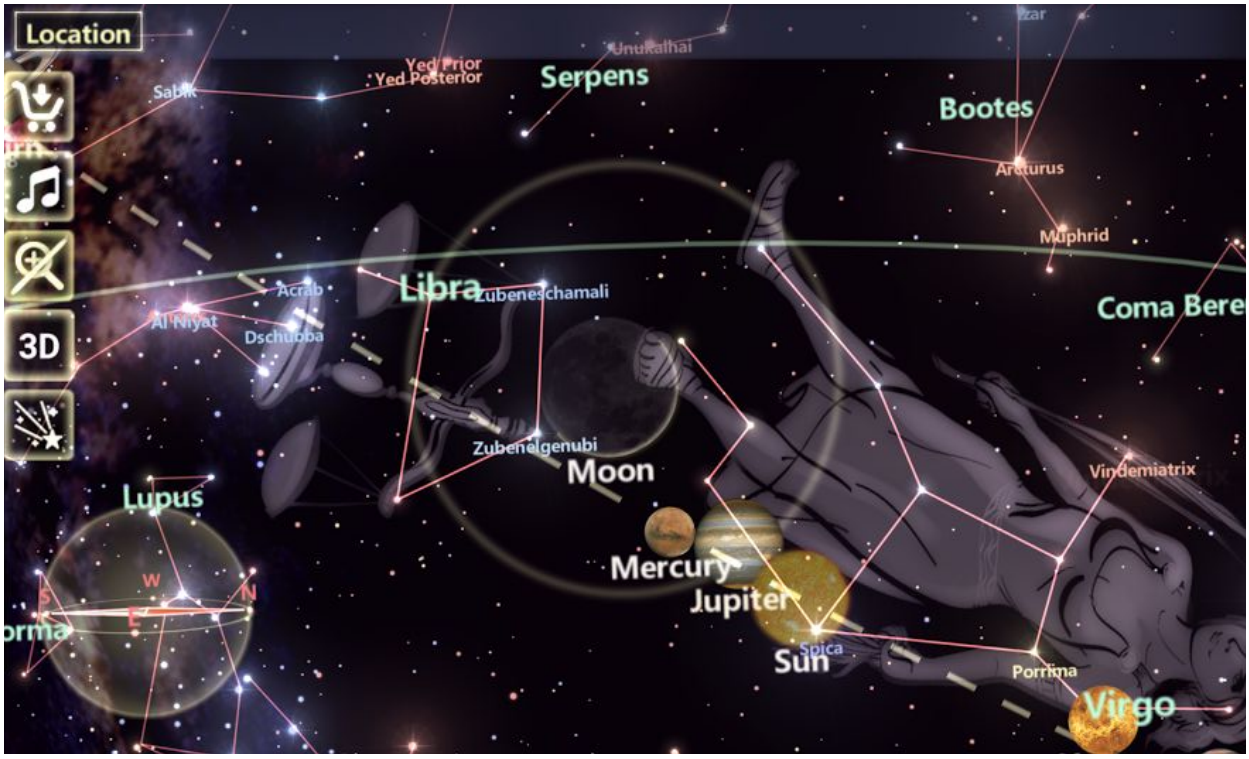


StarTracker - Android (Saturn View 1)

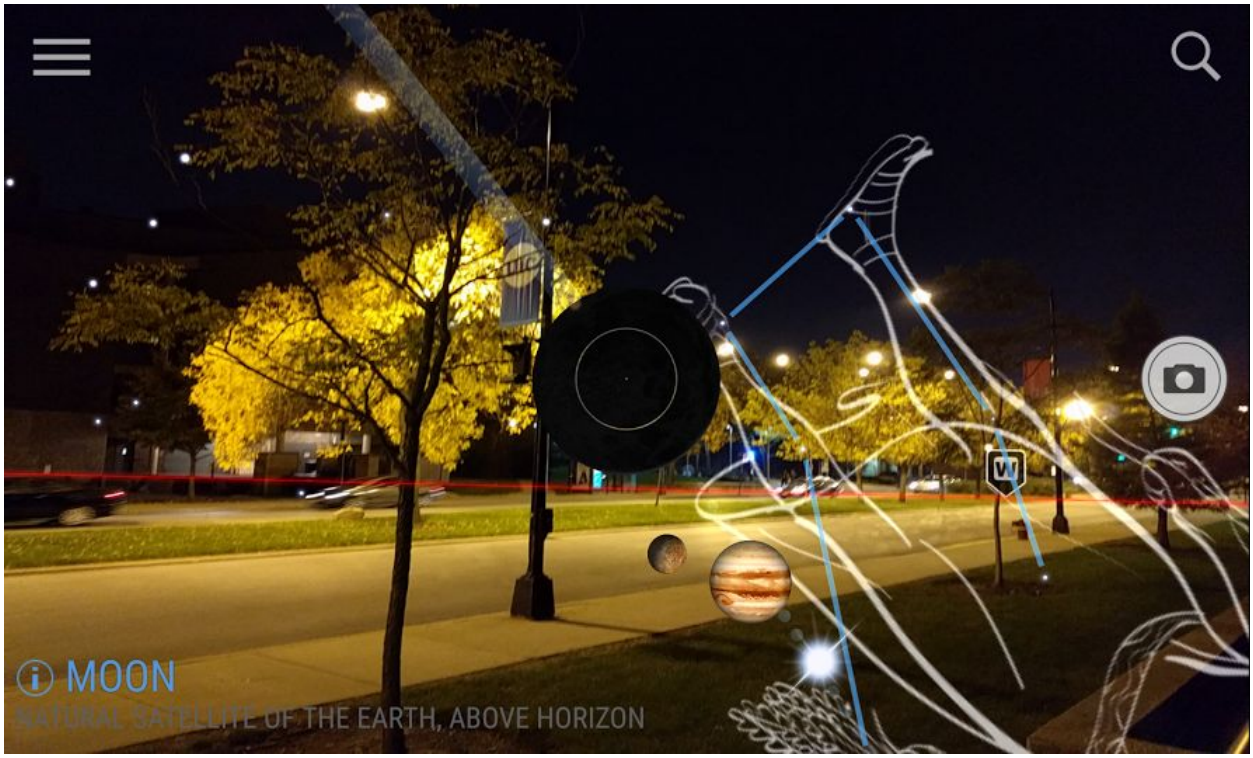
StarTracker - Android (Saturn View 2)

SkyView - Android (Saturn View 1)

StarTracker - Android (Moon View 1)



StarTracker - Android (Moon View 2)



SkyView - Android (Moon View 1)

I tried two augmented reality (AR) android applications for this assignment. The first one was StarTracker and the second was SkyView. Well, even though both applications overlay astronomical data, only SkyView implements AR (combines the camera view with computer-generated images). StarTracker overlays fully computer-generated images. Besides that, the mechanics in both applications are essentially the same. The above photos illustrate the differences quite well.

StarTracker generates some really beautiful scenes, but there is just something about AR that makes SkyView really enjoyable and draws me towards it. I love seeing virtual objects overlaid on the camera view. It's quite mystical, and makes me ponder about all the possibilities for AR technology in the future.

There are so many potential data sources you can integrate in applications like SkyView. For starters, tracking airplanes (and maybe those secret drones the government has flying around and watching us, even though that's classified). Most airplanes are too high for us to see, so integrating flight data could be useful, especially for hobbyists. Elaborating further on this, overlaying fly zones would be useful for consumer drone operators so they know where they are allowed to fly. But why stop there, we can go higher and higher, and overlay satellite information. Seeing where GPS satellites are would be cool, or even any government satellites. Going even further, we can overlay the ISS!

Another interested data source to overlay would be bird migration paths, and even the birds themselves! Scientists are already embedding sensors on animals and tracking them. It would be really cool to see what species fly over Chicago or the United States and when their migrations start, and their realtime locations on top of that.

In general, the first layer of information that I would like to see is the image or 3D model of the data being integrated. That would make learning immersive and fun. The second layer could be details on demand. When I touch the image or model, text can appear with the respective details. It will truly be an exciting time when my question "What is that?!" can immediately be answered using AR.