## Class Exercise – 6.2

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Submission: Save this Word document with your answers as a PDF file and upload the PDF file to

Canvas.

## **Area Transit Authority**

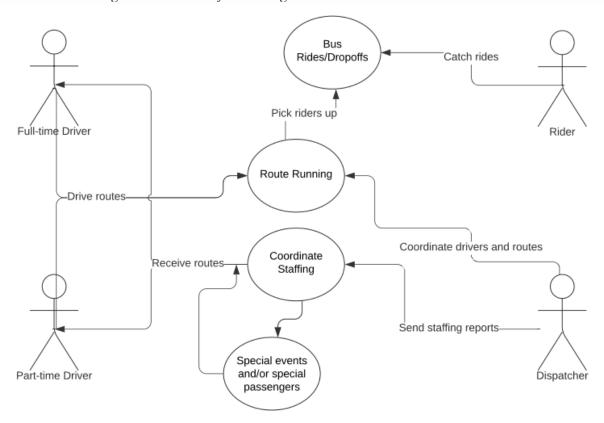
The Area Transit Authority (ATA) is a rural public transportation company. ATA operates a fleet of 25 buses that serve approximately 1,000 riders each day. The bus operation involves 10 regular routes, plus routes for special events. The ATA employs 20 full-time drivers and 10 to 15 part-time drivers. A dispatcher coordinates the staffing and routes and relays messages to drivers regarding traffic information and special passenger pick-up arrangements.

Use one of the diagramming tools identified on the "External Tools Page" in Canvas. You'll need such a tool for this chapter's case study.

## **Tasks**

1. Identify possible actors involved in ATA's bus operations. Rider, Full-time driver, part-time driver, Dispatcher

2. Create a use case diagram for the bus system using the actors identified above.



3. BONUS: Create a state transition diagram that describes typical passenger states and how they change based on specific actions and events.