## DriverPass System Design UML Diagrams

Austin Frey

### UML Use Case DiagramDiagram Description automatically generated

### Diagram Description automatically generatedUML Activity Diagrams

**Diagram

Description automatically generated**

### Diagram Description automatically generated

### UML Sequence Diagram

A picture containing text

Description automatically generated

### UML Class Diagram

## Technical Requirements

**Hardware Requirements**

DriverPass does not wish to be responsible for many technical aspects of the application. Therefore, the application will be designed utilizing a Platform-as-a-Service (PaaS) vendor. Using PaaS will leave DriverPass responsible *only* for the application and the data it manages (Watts & Raza, 2019). The only hardware requirements necessary for DriverPass to operate the system are standard pc equipment (computer, monitor, keyboard, and mouse). The exception to this is the computers for the admin and the IT Officer who may have more powerful requirements for managing the database, code, and PaaS software.

**Software Requirements**

* Operating system compatible with the programs below
* A web browser for interacting with the PaaS
* The PaaS software (such as AWS or Microsoft Azure)
* Standard office programs such as the Microsoft Office suite
* Database software (such as Microsoft SQL, MySQL, MongoDB, etc.) for managing user accounts, learning modules, appointments, etc.
* Code editor or integrated development environment (IDE)
* Third party payment processing vendor such as PayPal, Square, etc.

**Tools**

* IDE or Code editor – Visual Studio, Atom, Eclipse, etc.
* Database software – Microsoft SQL, MySQL, 3T Studio, etc.
* Frameworks for simplifying development
  + Bootstrap
  + HTML5 Builder
* Source control – GitHub
* Contact methods - SendBird

**Infrastructure**

Infrastructure is primarily managed by the PaaS vendor, but each computer should be equipped with firewall, VPN, and antivirus software for the sake of security.

**References**

Watts, S., & Raza, M. (2019, June 15). *SaaS vs PaaS vs IaaS: What’s The Difference & How To Choose*. BMC Blogs. Retrieved August 16, 2022, from https://www.bmc.com/blogs/saas-vs-paas-vs-iaas-whats-the-difference-and-how-to-choose/