**Project Scope**

1. **Product Scope Description:**

* Dynamic pricing: Dynamic pricing based on basic principal of supply and demand .The AI system combined with IP cameras in the parking lot automatically provides real-time parking pricing changes depending on factors such as peak and non-peak times.
* Benefits of dynamic pricing for parking:
* Flexible demand management.
* Maximization of revenue.
* Reduce traffic and air-pollution.
* Better parking experience for users.
* Pre-Booking: Through a mobile app you can simply choose the time and location to reserve a parking space at your destination this can greatly:
* Reduce time spent looking for parking.
* Contribute to CO2 reduction.

Mobile notification will alert you when the reserved time is running low and you will have option to extend the time right on your phone.

* Cashless Payment: It is a complete ticketless parking solution implementing the state of the art license plate recognition technology to provide the most efficient and customer friendly parking experiences .No physical tickets are needed anymore and all entry and exit data is managed by LPR machine.
* In addition, it is not unusual we forget where we parked in such cases, you can easily find the kiosk, or simply open the smart phone apps enter your license plate number, choose your car, then it shows where your car is parked and how to get there.
* The system will make parking stress-free, save your time and fuel and help save the environment.

1. **Product Acceptance Criteria:**

* System must achieve these goals:
* Parking system will work on both Android and IOS.
* System includes Dynamic pricing for parking.
* System includes Pre-Booking.
* System includes Cashless Payment.
* System should be environmentally friendly.
* System should be easy to use and provider by its technical support.

1. **Project Deliverables:**

* Remain tools:
* Cameras
* Sensors
* Laptops
* Cables
* Light system
* Architectural model of parking system
* The project plan and ongoing reports
* Software system

1. **Project Exclusions:**

* The goals which project will achieve(in the project scope):
* Parking system will work on both Android and IOS.
* System includes Dynamic pricing for parking.
* System includes Pre-Booking.
* System includes Cashless Payment.
* Organization will provide technical support to its system for 500$ per month.
* The things which project will not achieve(out of the project scope):
* Parking system will not work on MAC devices.
* Parking system will not use AI.
* Parking system will be limited by its area only not the surrounding places.
* Technical support will stop if there is any delay in payment of fees.
* The customer has no right to sell or dispose of the system, he has only the right to use it and if this happen, the organization will sue the customer.

1. **Project Constraints:**

* The budget should not exceed 1000000$.
* Deadline of the whole project is 7/7/2022.
* Resources should not exceed 10 resources.
* Any laptops or computers needed must be bought from HP Company.

1. **Project Assumptions:**

* Every task ends in its deadline.
* System will be very fast and easy to use by different categories.
* Hardware and software compatibility.
* Resource availability.
* Longevity of all solutions of risks.