



SCREMS – SMART CAR RENTAL MANAGEMENT SYSTEM

UNDERGRADUATE THESIS

**Submitted as one of the requirements to obtain
Sarjana Komputer**

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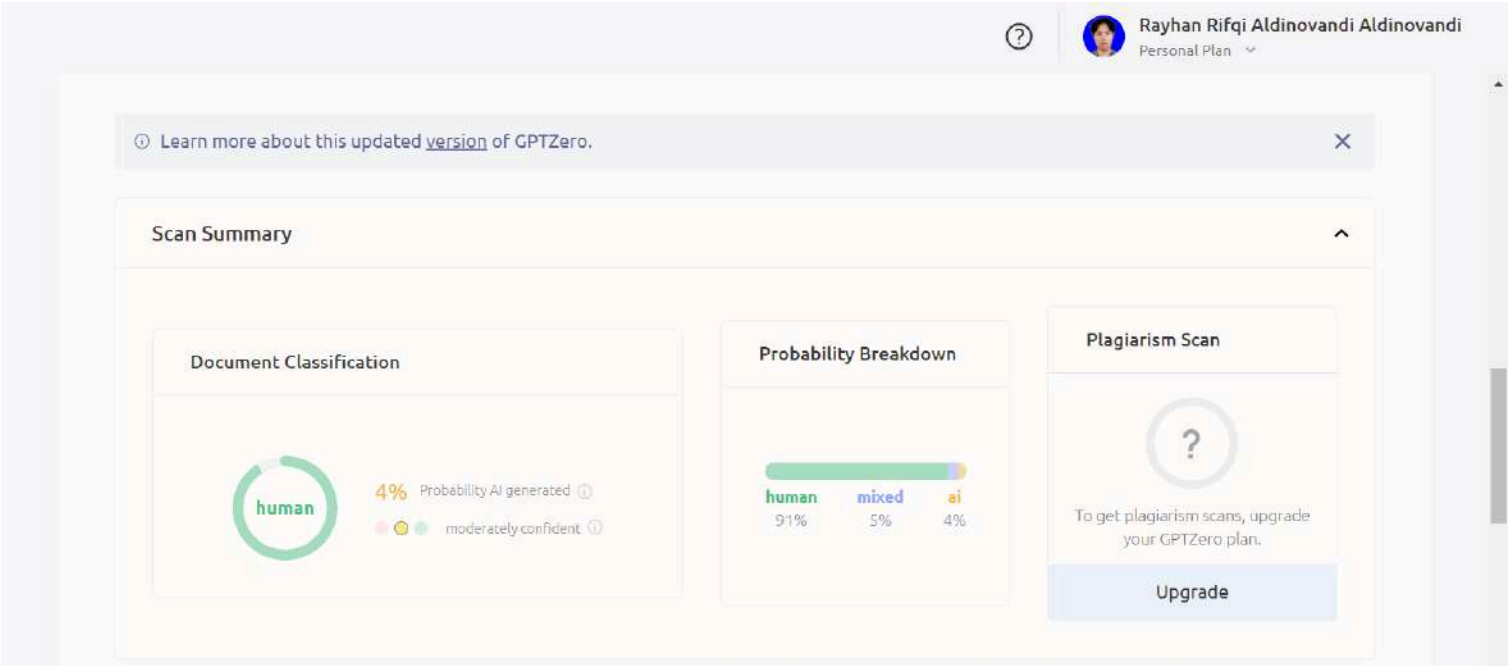
**FACULTY OF COMPUTING
INFORMATICS STUDY PROGRAM
CIKARANG
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SCReMS-SMART CAR RENTAL MANAGEMENT SYSTEM

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ABSTRACT

Car rentals are a business that has seen high demand in current times. The need to experience comfortable transportation without spending a huge amount of money to own and maintain an individual transportation unit in addition to paying for its taxes are the main driving factors behind the success of the car rental business.

Like any other business, it is not exempt from the risk of failure. Several factors can cause disadvantages in running this business. One of the main challenges faced is the risk of car theft. Losing a car creates significant financial and operational losses for car rental businesses. Another factor that can become a risk to car rentals is non-compliance with rental regulations which could result in car unit damage, ultimately leading to a decrease in the quality of the car unit that is owned by the car rental.

Our Smart Car Rent Management System will help car rentals in monitoring the location, temperature, and smoking presence of their currently used cars using location tracker module, smoke detection sensor, and a temperature sensor. Additionally, our system also offers functionalities to manage car units, create bookings, manage customers and track revenue from each car unit. Through various testing and evaluation, the system has proven to solve the potential problems that endangers car rental businesses.

Keywords: Car rental, car theft, Smart Car Rent Management, location tracking, temperature detection, smoke detection

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