***Reducing the probability of the buyer in the second hand car market to be victimized to a lower rate***

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***DESCRIPTION OF THE PROBLEM***

The decrease in purchasing power as a result of the lost value of the Turkish lira recently, people's turn to other alternatives for everything that is expensive, and the great effect of this on the car market. This decline of power turned into a perfect chance for the opportunists. They did not do what was necessary for cars that had to be scrapped or cars that were dangerous to use, and they preferred to market them to the market, even though they knew that they would have a negative impact on the health of the public. In according to NTV news,[1] “There are currently 2 million heavily damaged vehicles in traffic”.In according to Haberturk news,[2] “ 9 out of every 100 vehicles inspected in 2020 were waste car”. In according to car expert which name is Tarcanlar told that in video document,[3], "The car's airbag was stolen and replaced with rags and the resistors were tricked with tape.". For these reasons, a certain law or regulation must now be enforced, and we must minimize the negative effects of these situations in the future.

***AIM OF THE PROJECT***

- This project aims to minimize the possibility of user's buying-selling grievance problems in the automobile market and we foresee to prevent this by keeping a record of the details about the car.

-It aims to make this system mandatory for all businesses, such as value added tax, by the state, and to prevent illegal and undeclared works.

-The method to be used is to keep records and design them so that they are accessible to the public.It seems like types of a blockchain technologies as public(permisionless).

***OBJECTIVE OF THE PROJECT***

- Developing a mobile applications that runs on Android devices.  
- Special applications according to usage area and better user experiement design.  
- To provide a self-audit mechanism for institutions as records can be easily accessed when necessary.

***EXPECTED OUTCOME***

- Clients for used from business,experts,admin,user and database.

All of them will have document with how to use,diagrams and document.

-In database all sign in inputs(car service,expert,admin) as will be hold like hashed in database.

-In database all datas will be hold in encrypted form.It will be sendto database as encrypted.Encryption and decryption operations will be client side.

The main aim for hash and encryption,decryption, manipulation of data is unacceptable, security and inaccessibility of data.

-Verification system with code to be sent to sms or e-mail so that data is not manipulated.

- Log query restriction can be added to detect dangerous data transfer.

-PDF design to share with the user as a result of the actions taken or to keep them on their own phone.

- Weekly reports and presentations.

Project will be developed and upgraded continually and Project details,updates will be in weekly reports and presentation.

***TYPE OF PROJECT***

-Development of distributed systems.Implementing a system which will be used area of garage,expertise on car,state side and user applications.

***KEYWORDS***

-Mobile development, system automation.

***METHODS***

-It will include development methods similar to agile.Difference just be implementation and test will be later than 2 months then apply agile.

***RESOURCE REQUIREMENTS***

-Database have to be real time.  
-Mobile apps is better or not for usage.  
-Authentication sign in and sign up to system.  
-Encryption and decryption functions.  
-Hash algorithm.  
-Efficient database architectıre that does not need normalization.  
-Lowest time complexity of functions.

***References***

[1] https://www.ntv.com.tr/otomobil/dolandiricilara-dikkat-trafikteki-agir-hasarli-arac-sayisi-2-milyona-ulasti,jEZ7aKDnok2-TGH4W-l4jw

[2] <https://www.haberturk.com/2020-de-100-aractan-9-u-pert-cikti-2960736-ekonomi>

[3] https://www.youtube.com/watch?v=ZEZZiBdMvRQ