Seeds and Fertilizers Supply System for Farmer using Web Portal and Android Application

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Abstract: This system provides its user to get online seeds and fertilizers for farmers and also provides rental system to the user. The trends of the crops act so that these will be pretty important to the users who access these via the internet. The main feature of the system includes purchasing seeds and fertilizer and also take equipment's on rent for user from anywhere. The system allows retrieving facilities but also updating facilities to the authorized person. A service model is required to derive necessary service features that support these missions. Therefore, the service model and related service requirements are proposed in this paper for the future standardization.

Keywords: Farm management, Farm website, Farm Based application

1. Introduction

The main objective of this proposed system is to introduce and agriculture online shopping system for the farmer for purchasing seeds and fertilizer online and also renting the different agriculture equipment's. The agricultural sector is in a continuous development, and lately there is an increasing shift from the traditional to smart agriculture (or smart farming), where the idea of connecting devices, sensors, decision systems and users is crucial. The use of Cloud Computing is also adding to this field by enabling complex data analyses, seemingly infinite resources and the ability to correlate in real time data received from multiple sources. Lately, a number of projects were developed that focus on service and information management for smart farming. If farming is done with the help of web service it will help the farmers to work with some goal of greater profitability by direct communication between; farmer and supplier and even one farmer to another farmer mobile phone usage in third world countries is playing a vital role for the enhancement of farmers business towards agriculture.

The increase in the complexity of the systems behaviours easy adoption and makes calculations as to the financial benefits uncertain. These are some of the issues which can be resolved by improving the decision-making process though even better Management Information Systems, improved data interchange standards and clear management methods. At the moment, the utilization of scientific models together with the large amounts of data in different formats produced by modern farm machinery, sensors located within the farm, remote sensing, etc. is an open area of research and new methods are developed continuously. The seamless incorporation of new functionality and assisting features into an existing system is of paramount importance.

Design management of a project could be defined as the organization, controlling, coordination and management involved in the whole process of design. As a result, design management of architectural projects involves obtaining supports and social resources from the government, project owner and other sides of the market based on the economical foundation, design level and production level of the company as well as managing early panning of the project and the whole process of design to make sure that the design could meet demands of the market and society and accord with relative principles and standards. The agricultural sector is in a continuous development, and lately there is an increasing shift from the traditional to smart agriculture (or smart farming), where the idea of connecting devices, sensors, decision systems and users is crucial.

2. Problem statement

To developed in android platform, for farmers to keep track of their details and farm related activities app.

3. Literature survey

In existing system number of projects were developed that focus on service and information management for smart farming. and many apps are built but the farmer cannot order the products on their own. the farmers need to go to the store to buy the products. sometimes the people are unaware of the products better suited for their crops. The new products launch in the market and the new offers on those products, the poor farmers are unknown of these things and they go after the traditional approaches. The result will inconvenience of handling products with less knowledge.

In the field of website development that can have a lot of small, but time-consuming problems. Like ensuring your website is capable of being visited without error on four different browsers. Even After setting up a website a farmer needs to maintain and operate over the web content. The
farmers spend their valuable farming hours on: Blog posts, farmers market times, responding to customer feedback, posting photos, etc. There are options that add more or less time in operation. They can be time sucks but they don’t have to be. Most farmers won’t have extensive web design experience.

The first paper "Development and Application of an Efficient Sugar Refinery Farm Management Information System", in the year 2012, describe an efficient sugar refinery farm management information system was developed by integrating advanced technical means—WEB technology, and the application of the system achieved good results in the sugarcane growing areas of Guangxi, Yunnan are discussed but probably the paper only discussed about one crop only. In the paper name "Integrated Cloud Frame work for Farm Management" in year 2016. The system is addressed to farmers and other actors involved in farming operations, such as rural service companies and banks, but the complex data analysis needs to be made available to the farmer, in order to further optimize the farming output. In "Cloud farming Project Official Site URL: http://code.google.com/p/cloudfarming/" in year 2015 Cloud farming is a client platform that offers a modular system for farm management but the most of the specific agricultural knowledge is held by small companies that are not able to develop an overall system for farm management.

4. Proposed system

The system consists of an android application and web application which will have the details of all the offers and the new launch products. It is Android based mobile application which would provide all the facilities to the farmers related to their agricultural activities. It would be helping them in getting the weather updates and they can also access the news related to agriculture and farms. The ‘Krushizone’ system is based on client-server architecture. The server that will responsible for providing all the required agricultural market information. It is designed to meet the needs of the Indian farmers. The application provides its users with a variety of valuable features. • The application is easy to use because of Graphical User Interface (GUI). The app again also provides the capability of creating, editing, deleting photos that store the user preferences of market prices. The propose system will embody an android application and web application which will have the details of all the offers and the new launch products. We are going to developed in android platform, for farmers to keep track of their details and farm related activities app which can be divided into two

A. Main categories

- Application module
- Portal module

The application will be the mobile app which will have different categories related to farming. The farmers need to register and then login into the system. The application has different sections for various policies, offers, pesticides and fertilizers, seeds, crops, soil, different equipments etc. All the authorized member has access to these sections and they can order the items as per there need. The next module is the portal, the website which will have all the sections in the application. Here also one need to register and then login to get the access. The farmer can view the rating for different crops, having customer support. The new released schemes by the government can be seen here.

B. Architecture diagram

![Architecture diagram](image1)

C. Flow-chart diagram

![Flowchart](image2)

D. Objectives and scope

The agricultural sector is in a continuous development, and lately there is an increasing shift from the traditional to smart agriculture (or smart farming), where the idea of connecting
devices, sensors, decision systems and users is crucial. The use of Cloud Computing is also adding to this led by enabling complex data analyses, seemingly initiate resources and the ability to correlate in real time data received from multiple sources. Lately, a number of projects were developed that focus on service and information management for smart farming. The most obvious benefit is the simplest. A web presence is likely the first resource conceivable customers will turn to. The costs and grace of a website, but it bears repeating. Web sites offer the fortuity to spread your brand, illustrate your product offerings, and speak directly to customers. If you plan on sharing links, posting broadside on media platforms, or hosting some “learn more” content, then you need somewhere to host it.

1. General users can also get benefit by using several sections.
2. The Farmers will get to know the offers and schemes all together in one app.
3. To provide Ease and Awareness among the farmers.

E. Advantages

1. Ease of posting job vacancy by employer
2. Ease of filtering applications that fit into eligibility criteria by scanning the resumes.
3. Ease of communication between job seeker and employer by internal messaging Easy generated reports.

5. Conclusion

Farmers can directly contact suppliers by searching online, may submit their grievances online and get notification of any new offers/schemes by using this web services but the issues to be sorted out are testify of the users cannot be done online. The most common anodyne of mobile found in the research was derived from the use of mobile phones as a basic communication device. As for many of the farmers interviewed, it was the only well-suited mode of communication they had access to. The application Krushizone would play vital role in the farmers with its various capabilities, as it addresses the key problems of getting the market updates of different products. The farmers will have ample benefit when they can make better decisions about where to sell their output after getting market prices for a variety of local and distant markets.

References

[10] Socio-Economic Impact of Mobile Phones on Indian Agriculture http://www.mobileactive.org/fi