

Department of Electrical and Computer Engineering
North South University



Senior Design Project

Multipurpose Agro System

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Faculty Advisor:
Dr. Shahnewaz Siqqique
Assistant Professor

ECE Department
Summer, 2018

DECLARATION

This is to declare that this report is a hardware-based implementation and is self-contained for the purpose of submission as a part of the Senior Design course in summer 2018 at North South University and has not been used elsewhere for any other reason. The materials that are obtained from other source are duly acknowledged in this project. Any similarities, in wording, if found to other papers, which has not been cited, is a subject of pure coincidence.

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Md. Omar Faruque Shah
ECE Department
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Approval

The senior Design Project entitled “**Multipurpose Agro System**” by

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has fulfilled all the criteria required for the completion of bachelors in Science Electrical and Electronic Engineering program at NSU on December 2018.

Supervisor’s Signature

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Department Chair’s Signature

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Acknowledgement

We would like to begin with our gratitude towards North South University's Department of Electrical Engineering and Computer Science for providing us with the platform to showcase our design capabilities, troubleshooting ability and implementation of theoretical knowledge fed to us through the core courses designed in the program and ultimately leading to the completion of senior design project.

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MULTIPURPOSE AGRO SYSTEM

Abstract:

An agricultural mechanism or agro mechanism could be a mechanism conveyed for agricultural capacities. The most space of use of robots in agriculture is seeding robots square measure intended to trade human work. The agricultural business is behind elective integral businesses in exploitation robots because of the sort of occupations worried in agriculture are no and burrow. This project talks about building up a mechanism fit for movement activities like programmed seeding and burrow. It also gives manual administration once required and monitors the wetness with the help of wetness sensors. Then primary part here is that the small scale controller that manages the entirety strategy. The agro-robots are fit for performing self-ruling driving also, three programmed agricultural activities, viz. hilling, mulching, and sowing of seeds in the separate request. The information got from different sensors on the field is later transmitted to the controller through ZigBee system to roll out the improvements in the control program to get wanted field yield. The exploration is directed to give help to farmers by decreasing work hours for agricultural exercises by implementing automation. This study will give another option to the existing systems with apparatuses appended behind tractors and thorough manual activities on agricultural field at successful cost.