DREAM FIELDS
FARM WITH FUN

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Problem

- Farmers lack time/energy for proper cultivation
- Agricultural lands are located at great distances from the residences
- Lack of lands

Our Solution

- Design a WiFi based remote controlled robot, which can:
  - prepare soil
  - plant seeds
  - look after plants

Current Solutions

- Hiring other farmers
- Renting agricultural lands
- Using new machines
  - ✓ Tractors
  - ✓ Automated machines

System Model / Implementation

Hardware

- ✓ Gear motors - to move the robot
- ✓ Motor drivers - to take a low-current control signal and then turn it into a powered signal
- ✓ Stepper motor - to rotate the robot.
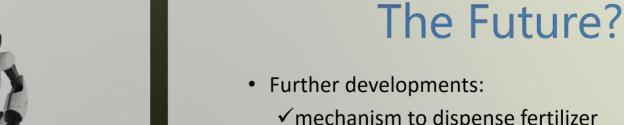- ✓ Arduino MEGA Board with WiFi shield - control the above components

System Model / Implementation

- ### Software

  - ✓ Arduino API - to write the controlling program
  - ✓ Eclipse - to use as a Java IDE

Results

- Build a robot with facilities
  - ✓ Digging
  - ✓ Seeding
  - ✓ Watering
- Make a software to control and can get a video feedback

The Future?

- Further developments:
  - ✓ mechanism to dispense fertilizer
  - ✓ work with mobile devices - tablets, smart phones
  - ✓ improve efficiency
- Agricultural lands can be cultivated without visiting them
- This product gives a new face for farming.
- Farmers can get a better income from their cultivations

Second Annual
Embedded System Projects Expo 2016
presented by Third Year Students
Department of Computer Engineering, University of Peradeniya