SUMMARY

Industry

Production Monitoring System for Pedhas.

Challenge

Monitor production quantity of different Pedhas, wastage of Pedha while production, machine health, machine efficiency & operator efficiency.

Solution

Using microcontroller, capacitive sensor, energy meter & cloud based platform parameters related to production, machine efficiency, operator efficiency is monitored.

Results

- Our solution can enhance efficiency of the production
- Increase the visibility of maintenance, production plan.
- Asset utilization monitoring

Benefits

- We can monitor production & wastage.
- Machine health is monitored.
- Production & machine maintenance can be planed.
- All the data will be available on cloud.
- Various reports can be generated.

Production monitoring systems playing important role in manufacturing industries. These systems are useful to reduce the human efforts & provide analytics to manage the maintenance & production.
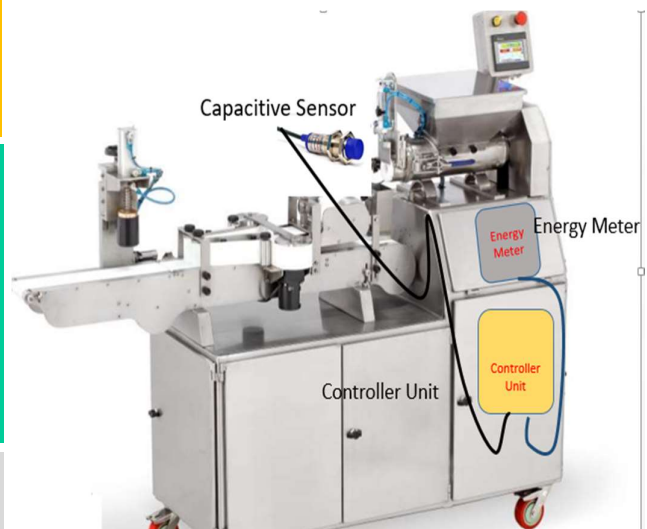
Pedha Making Machine

We can monitor production by mounting capacitive sensor on machine. Energy meter is mounted on machine to monitor machine health.

Using gateway device we can send production information, machine health to cloud. Using analytics on cloud we can calculate the future production rate, operator efficiency, create master data & various report in excel or pdf formats etc.

Analytics

All the data shared by microcontroller using Wi-Fi or Ethernet is visible on platform. Production count, wastage, electricity consumption is visible in different charts with proper date & time. By using this data & analytics we can plan the future production. We will able to identify the wastage of material. Energy meter data is used to calculate the electricity. Also we can monitor the ideal time of machine for which machine was not in production. We can plan the machine maintenance using energy meter data. Machine Operator person efficiency, machine efficiency can be identified using the analytics. All the data can be available in excel or pdf file for record purpose. Various reports are generated using the available data.

Rollout of System is quick and easy and can be used in conjunction with existing systems.
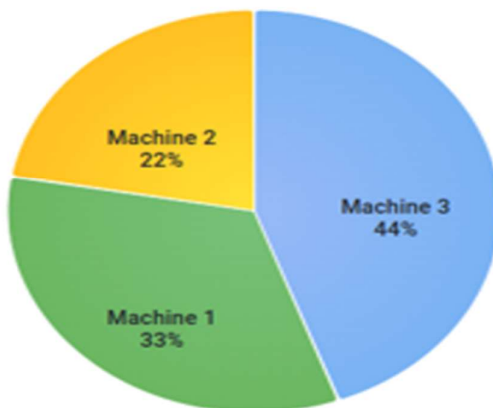
Production Vs Demand
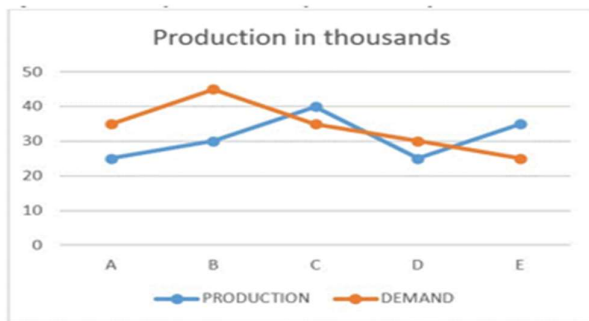
Operator Vs Production
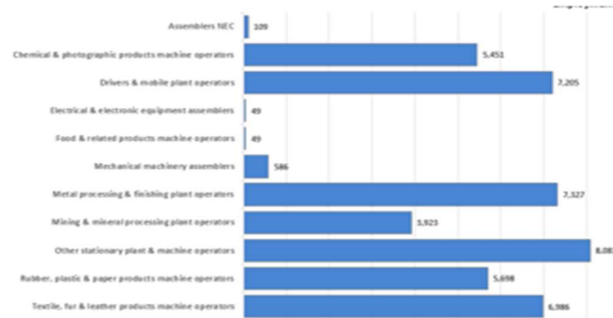
Machine Vs Machine Production

Percentage of pieces produced per machine

Production Reports per Month