Training Report

DASH Technologies

Distillery Automation Plant

Submitted in partial fulfilment of the requirements for the award of degree of Bachelor of Technology (Robotics and Automation)

Submitted to

LOVELY PROFESSIONAL UNIVERSITY

PHAGWARA, PUNJAB

Submitted By: Ruhani Rawal

Registration Number: 12004649

Student declaration

To whom so ever it may concern

I, Ruhani Rawal, Registration Number ;12004649, hereby declare that the work done by me on “Distillery Automation System” is a record of original work for the partial fulfilment of the requirements for the award of the degree, Bachelor of Technology.

Name of the Student: Ruhani Rawal

Registration Number: 12004649

Signature of the student:

Dated: 23/09/22

Internship Certificate

Dash Technologies and Labels Private Limited

Mfrs. of : Gun Labels, Computer Labels and Bar Code Labels
Deals In : Labeling Machines and Barcode Printers
H.O. : F-79-80, DLF Prime Tower, 828-B, 8th Floor, Okhla Industrial Area, Phase-1, New Delhi - 110020, India
Ph. : 011-41709919, 41709929, 41616571, 40567427 Mob. : 9818110242
E-mail : admin@dashinternational.in, info@dashinternational.in, Web.: www.dashinternational.in
CIN: U74900DL2019PTC345798.

Date: 09-11-2022

INTERNSHIP CERTIFICATE

(Issued on request)

TO WHOMSOEVER IT MAY CONCERN

This is to certify that Miss. Ruhani Rawal, has done her Training in Automation Project at Dash Technologies And Labels Pvt Ltd. From 1st June 2022 to 15th July 2022.

We wish her success in her future endeavors.

Thanking You

For DASH TECHNOLOGIES AND LABELS PVT LTD

For Dash Technologies And Labels Pvt. Ltd.

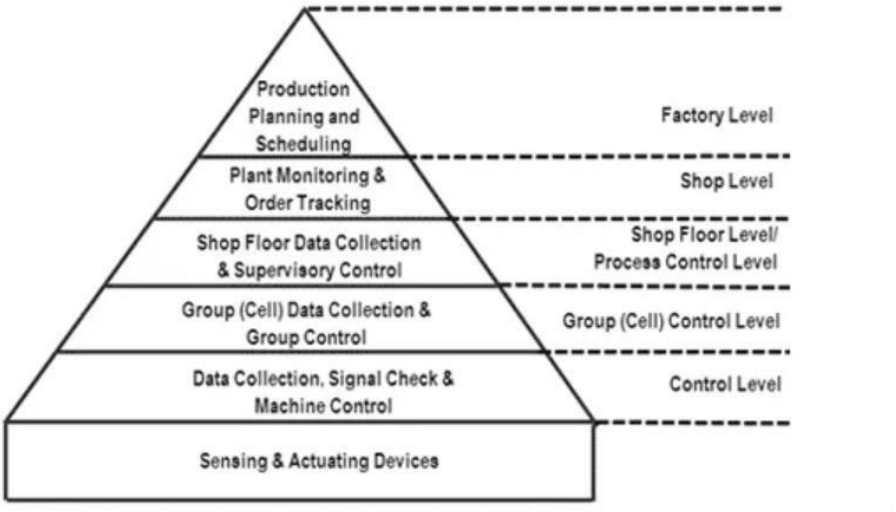
Director

INTRODUCTION

Due to the rapid advances in technology, all industrial processing systems, factories, machinery, test facilities, etc. turned from mechanization to automation. **Industrial automation** is the use of control devices such as PC/PLCs/PACs etc. to control industrial processes and machinery by removing as much labor intervention as possible, and replacing dangerous assembly operations with automated ones.

In industrial automation control, a wide number of process variables such as temperature, flow, pressure, distance, and liquid levels can be sensed simultaneously. All these variables are acquired, processed, and controlled by complex microprocessor systems or PC based data processing controllers.

The manufacturing industries make the product out of materials using machines/robotics. Some of these manufacturing industries include textile and clothing, glass and ceramic, food and beverages, paper making, etc.



Manufacturing Automation System Hierarchy

IMPLEMENTATION AND EXPERIMENTATION

PRODUCTION PLAN

(Overview of the plant)

1. Monthly production plan is entered in the DASH system
2. Data is fetched from portal
3. Hologram is applied with applicators
4. Non readable barcode rejected after scanning
5. Rejected bottle moved to turn table
6. User selects line, brand, pack size and enter batch number, manufacturing date and expiry date
7. System stops filled cartons via stoppers and bulk read bottle barcodes using vision cameras.
8. Case label will be printed and applied using print and apply system
9. Case label verification and production confirmation done using mount reader
   Note: incase the bulk read is unsuccessful the red marked bottle is replaced by the user with another hologram affixed bottle

PLANT WAREHOUSE

PROCESS

1. Scan and pick cases against entered IP
2. User selects case barcode label and the material as per IP
3. Dispatch cases data is transferred to excise portal
4. Import permits are manually entered in DASH application and details are downloaded from excise portal

REQUIREMENTS

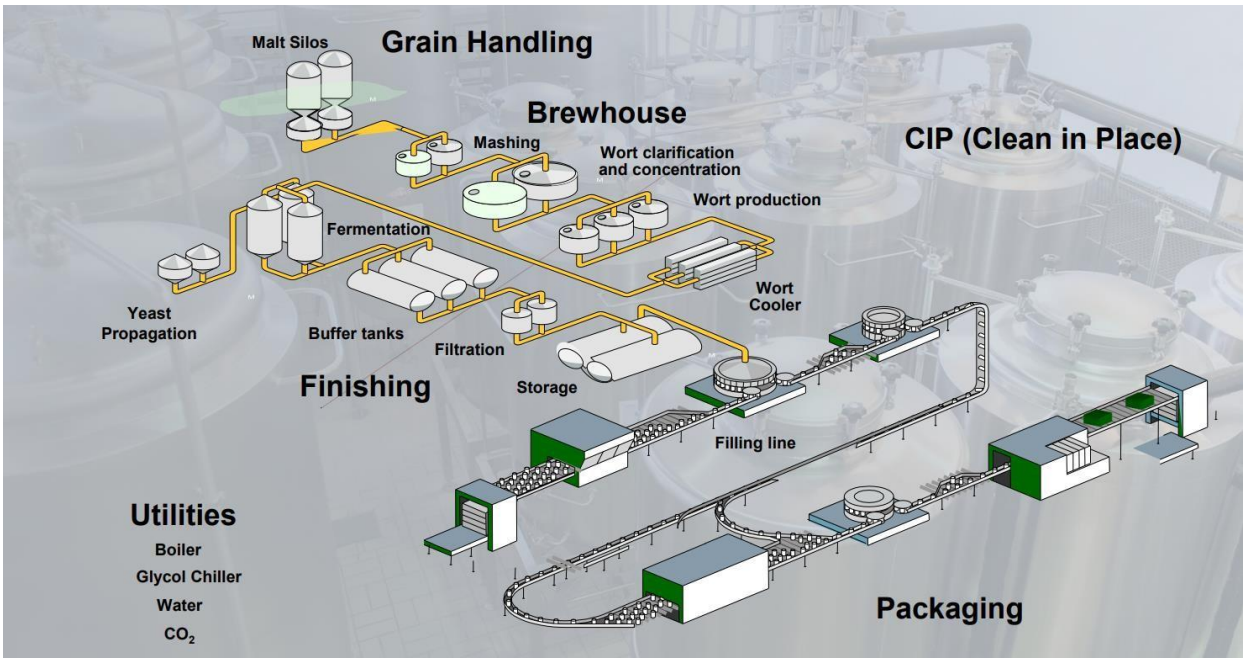
Vision Cameras

DataMan 150/260 series image-based barcode reader

->For 1D linear barcodes, high density 2D matrix codes or direct park mark (DPM)

->High read rate

TOTAL PROCEDURE



CONCLUSION

Industrial automation has recently found more and more acceptance from various industries because of its huge benefits, such as, increased productivity, quality, and safety at low costs.

The reduction in costs associated with the **automated industry** will offer more products, at better prices and at a higher quality.

Industrial Automation is ought to grow in all aspects of the production process all around the world.

REFERENCES

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