Addressing Production Defects: Root Cause Analysis and Solution Plan

The Company is experiencing an increasing number of defective products in the assembly line, leading to higher costs and significant waste.

Uncovering the Root Cause: The 5 Whys Analysis

1

1st Why is there defective product in the assembly line?

Answer: The components are not assembled correctly.

2

2nd Why would components not be assembled correctly?

Answer: The involvement of the assembly workers involves some mistakes in the process.

3

3rd Why does assembly worker make some mistakes?

Answer: They are poorly trained on the new assembly procedures.

4

4th Why are they poorly trained on the new procedures?

Answer: The training sessions were not conducted for all the employees after updating the process.

5

5th Why training sessions were not conducted for all employees?

Answer: The management team kept their training schedules Secondary to their deadlines for producing because of a client's urgent order.

Root Cause: Management Prioritized Production

Urgent Client Order

Pressure to meet deadlines led to training neglect.

Employee Training

Proper training crucial for assembly line accuracy.

Unveiling the Impact: Data Analysis and Feedback

1 **Historical Data Analysis**

Identify trends in defect rates, correlate with production changes

2 **Worker Feedback**

Gather insights from workers about assembly process challenges

3 **Machine and Process Inspection**

Examine assembly machines, identify calibration or mechanical issues

Proposed Solutions: Building a Strong Foundation

Training Programs

Periodic training schedule for all assembly line workers

Process Review

Balance production deadlines with training and maintenance

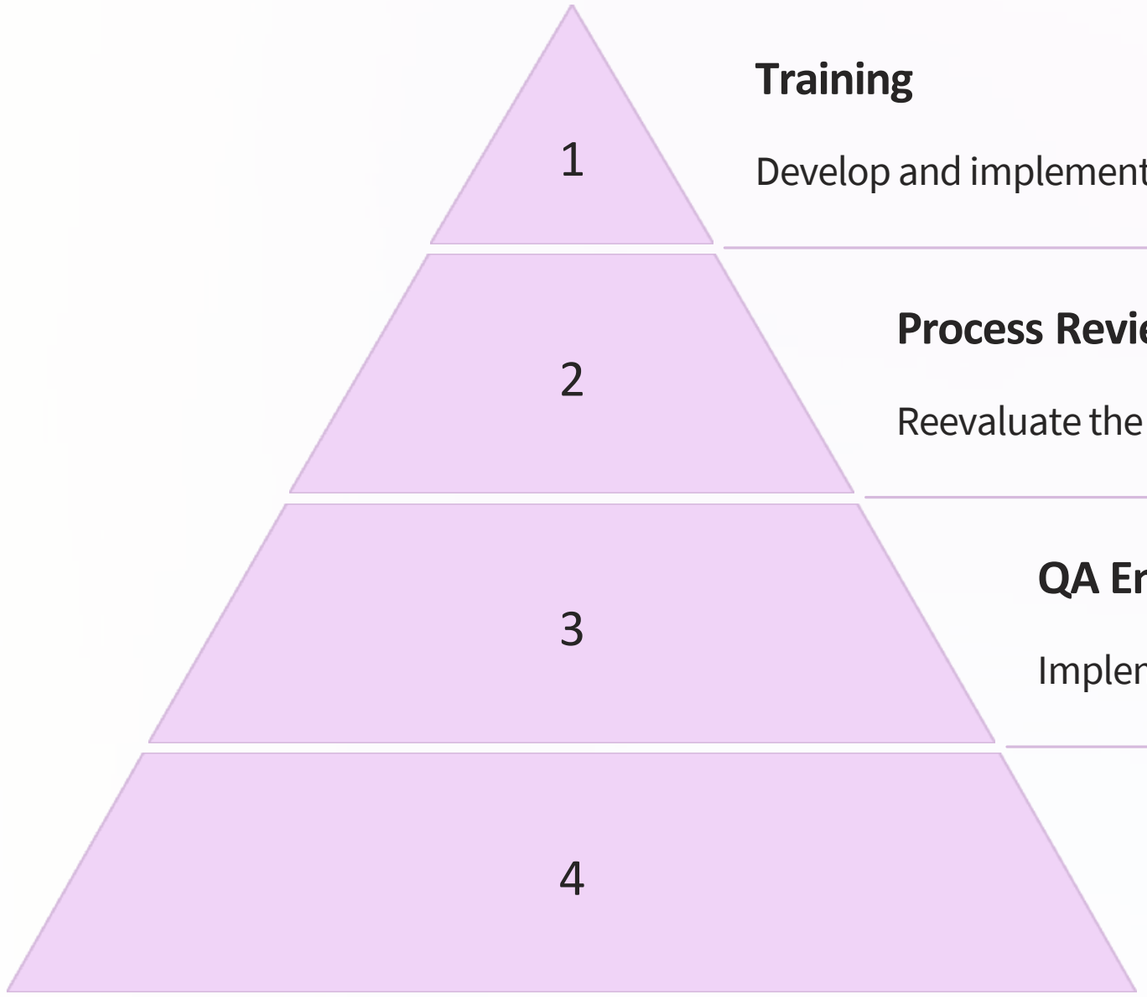
QA Enhancement

Strengthen quality checks, incorporate automated inspection

Employee Empowerment

Encourage feedback, provide rewards for defect reduction solutions

Implementation Plan: Bringing Solutions to Life



Training

Develop and implement a comprehensive training program

Process Review

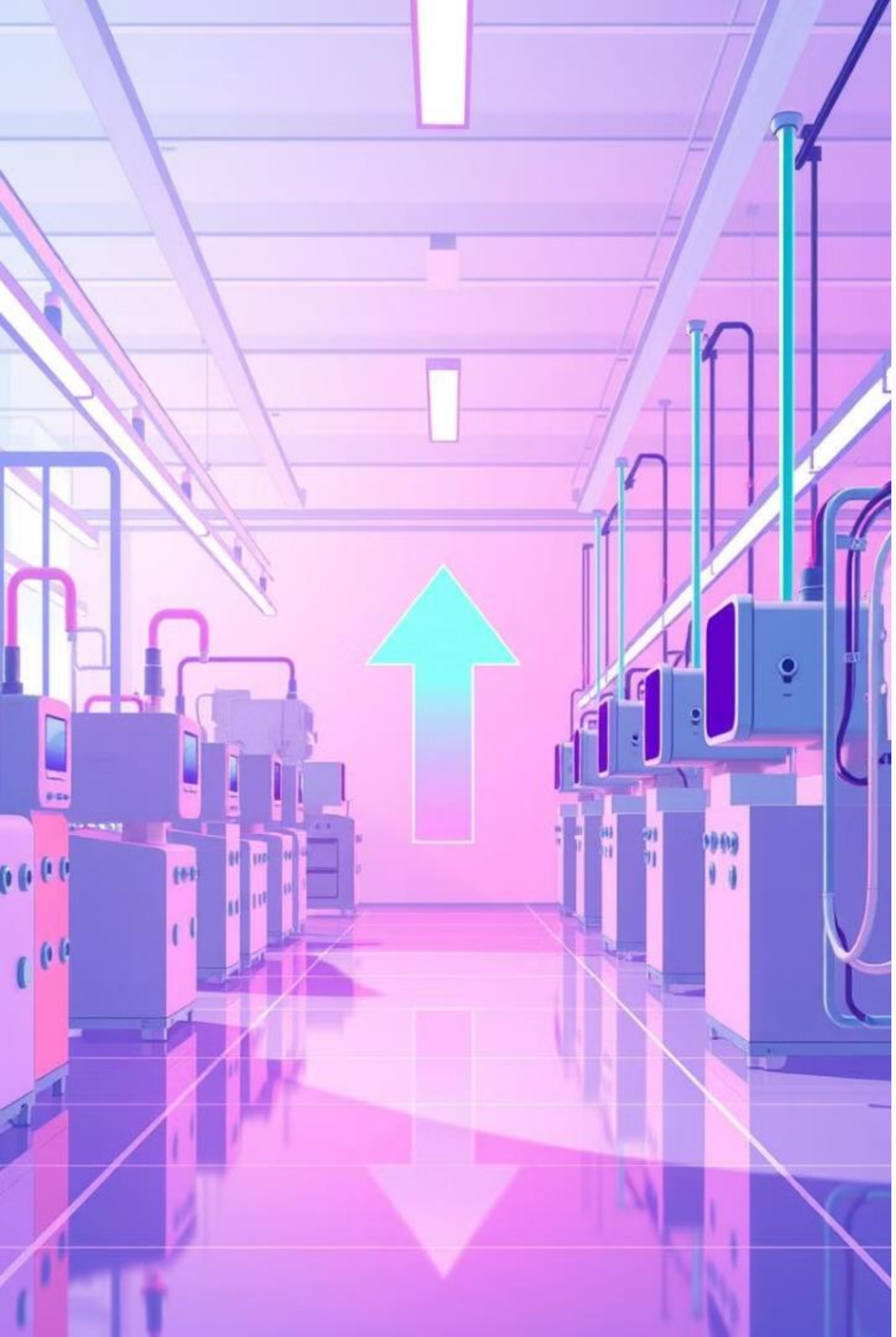
Reevaluate the production process for optimal efficiency

QA Enhancement

Implement automated quality checks to reduce errors

Employee Empowerment

Encourage worker feedback and reward innovative solutions



Expected Outcomes: A Path to Success

Reduced Defects

Minimized product defects and improved product quality

Reduced Costs

Lowered manufacturing costs and reduced waste

Improved Efficiency

Increased production efficiency and optimized assembly line operations

Next Steps: Implementing the Solution

1. Review and finalize proposed solutions with stakeholders.
2. Develop detailed implementation plan and timeline.
3. Execute training programs and process adjustments.
4. Monitor defect rates and measure progress regularly.