

## Defect Details

<b>NC No.</b>	7001067878
<b>NC Date</b>	25/10/2024
<b>NC Submission Date</b>	
<b>Part No.</b>	F1DZ00902B
<b>Part Name</b>	FORK BOLT K86A
<b>Supplier Name &amp; Code</b>	100106-SHARP ENGINEERS.
<b>ETL Plant</b>	1136-ETL Suspension Sanand
<b>Defect Details</b>	MATERIAL DEFECT-Pitting mark

## 1. Problem Description

<b>Defect Description</b>	Pitting marks (Material defect)
<b>Detection Stage</b>	Receipt
<b>Problem Severity</b>	Aesthetic
<b>NG Quantity</b>	1870
<b>Is Defect Repeatative?</b>	No
<b>Defect Sketch / Photo</b>	

## Supplier Communication Details

<b>Quality Head Email ID</b>	quality@apw3.co.in
<b>Plant Head/CEO Email ID</b>	kurund.ma@sharp-engineers.com
<b>MD Email ID</b>	urkhandelwal@sharp-engineers.com

## 2. Stock Details &amp; action taken for NG parts

Location	ETL End	Warehouse	Transit	Supplier FG	Supplier WIP	Total
<b>Total Qty</b>	2600	0	0	1500	0	4100
<b>Check Qty</b>	2600	0	0	1500	0	4100
<b>NG Qty</b>	1870	0	0	1400	0	3270

## Action taken on NG part

<b>Scrap</b>	0
<b>Rework</b>	3270
<b>Under Deviation</b>	0

## Containment Action

All pipeline material segregated

## 3. Process Flow

**Process Flow Description**

RM inward-Paring and drilling-CNC setup-OD grinding-Milling-Roliing-Plating-FID-Packing and forwarding

**4. Process Details**

<b>Process / Operation</b>	RM inwarding
<b>Outsource</b>	Yes
<b>Machine / Cell</b>	RM supplier
<b>Machine / Cell No.</b>	RM supplier

**5. Problem Analysis**

Type	Possible Cause	Fact Verification	Jud
Material	Material changed	Material found as per specification	O
Man	manpower changed	manpower deployed as per skill matrix	O
Machine	Operation missing	OD turning operation not done	X
Method	part not clamp properly	part clamp properly	O
Tool	Tool Change	no tool change	O

**6. Inspection Method Analysis (Current)**

<b>Inspection Method</b>	Other
<b>Other Inspection Method</b>	Visual
<b>Check Point at Final Inspection</b>	Yes
<b>Checking Freq.</b>	Sampling
<b>Sampling</b>	No
<b>Sample Size</b>	5 nos

**7. Root Cause Analysis (Occurance)**

<b>Why 1</b>	Pitting Mark
<b>Why 2</b>	Pitting Mark at OD Collar
<b>Why 3</b>	OD turning Operation not done
<b>Why 4</b>	OD turning operation not available in program
<b>Why 5</b>	
<b>Root Cause (Occurance)</b>	OD turning operation not available in program

**Root Cause Analysis (Outflow)**

<b>Why 1</b>	Pitting Mark
<b>Why 2</b>	Skip From inspection
<b>Why 3</b>	Inspector not aware about defect
<b>Why 4</b>	
<b>Why 5</b>	
<b>Root Cause (Outflow)</b>	Inspector not aware about defect

## 8. Countermeasure ( Occurrence , Outflow & System side Actions )

Type	Countermeasure Details	Responsibility	Target Date	Actual Date	Status
Outflow	Onjob Training given to inspector	Mr. Omkar Bhange	28/10/2024	28/10/2024	Completed
Occurance	1)OD turning Operation added in CNC program 2) RM Size increase by 0.05mm	Mr. Manoj Kadam	28/10/2024	28/10/2024	Completed
Outflow	OPL displayed st final and machine stage	Omkar Bhange	26/10/2024	26/10/2024	Completed

## 9. Inspection Method After Customer Complaint

<b>Change In Inspection System</b>	Yes
<b>Change Details</b>	Started 100% inspection at final inspection
<b>Inspection Method</b>	Other
<b>Other Inspection Method</b>	Visual
<b>Check Point at Final Inspection</b>	Yes
<b>Checking Freq.</b>	100%
<b>Sampling</b>	No
<b>Sample Size</b>	100

## 10. Evidance of Countermeasure

<b>Occurance (Before)</b>	RM of OD 29.50 +0.1 mm were used for fork bolt K-86 <a href="#">1189_Occurance_Before.pdf</a>
<b>Occurance (After)</b>	Now, RM of OD 29.55 +0.1 mm are using for fork bolt K-86 <a href="#">1189_Occurance_After.pdf</a>
<b>Outflow (Before)</b>	Inspector were not aware about defect <a href="#">1189_Outflow_Before.png</a>
<b>Outflow (After)</b>	On job training given to the inspector <a href="#">1189_Outflow_After.pdf</a>

## 11. Horizontal Deployment

<b>Horizontal Deployment Required</b>	Yes
<b>Applicable Machine / Model / Plant</b>	All fork bolt

## 12. Document Review

<b>Documents</b>	InspCheckSheet
<b>Specify Other Document</b>	NA

## 13. Effectiveness Of Action

<b>Reviewed Quantity</b>	5
<b>Reason for submission</b>	Material defect -Pitting mark

