QFR No - 8000873532

Defect Details

NC No.	8000873532
NC Date	06/05/2024
NC Submission Date	
Part No.	F2DZ04603B
Part Name	FORK BOLT J1A & J1D
Supplier Name & Code	100189-SANGKAJ STEEL PVT LTD.
ETL Plant	1117-ETL K-228/9 Suspension
Defect Details	NOT AS PER SPECIFICATION-THREAD OD U/S, FACE DAMAGE

1. Problem Description

Defect Description	THREAD OD U/S
Detection Stage	Inprocess
Problem Severity	Fitment
NG Quantity	2
Is Defect Repeatative?	Yes
Defect Sketch / Photo	

Supplier Communication Details

Quality Head Email ID	qualityassurance@sangkaj.com
Plant Head/CEO Email ID	steel@sangkaj.com
MD Email ID	anirudh.2007@hotmail.com

2. Stock Details & action taken for NG parts

Location	ETL End	Warehouse	Transit	Supplier FG	Supplier WIP	Total
Total Qty	500	0	0	350	833	1683
Check Qty	500	0	0	350	833	1683
NG Qty	2	0	0	1	1	4

Action taken on NG part

Scrap	4
Rework	0
Under Deviation	0

Containment Action
All Material at sangkaj Steel End & ETL End Segregated for the above Defect & NG Qty Quantity is Scrapped.

3. Process Flow

Process Flow Description
RM Inward-RM Inward Inspection-Traub Blank Cutting-CNC Machining 1st-CNC Machining 2nd-Milling-Deburring-Tapping-Plating -Final Inspection-Dispatch

4. Process Details

Process / Operation	CNC Machining 2nd
Outsource	Yes
Machine / Cell	CNC Machining
Machine / Cell No.	02

5. Problem Analysis

Type	Possible Cause	Fact Verification	Jud
Material	Input Material Not OK	Semi-finish Blanks are made from Uniform Diameter Bar, Cut blanks Found OK	O
Method	Inadequate inspection method	Only Visual Inspection is done for threading	X
Man	Wrong Offset given by operator	defective parts all dimensions found undersize, this happens only due to Wrong Offset	X
Tool	Tool Worn out	Insert Worn out doesn`t lead to Dimensions undersize	O
Machine	Variation due to Machine	Machine Condition is OK, Not Contributing for Dimension Variation.	O

6. Inspection Method Analysis (Current)

Inspection Method	Other
Other Inspection Method	Visual Inspection
Check Point at Final Inspection	Yes
Checking Freq.	100%
Sampling	No
Sample Size	100%

7. Root Cause Analysis (Occurance)

Why 1	Thread Major Dia. Undersize parts found at Customer End
Why 2	During CNC turning, major Diameter became undersize
Why 3	Wrong Offset given by operator
Why 4	Operator was not trained to give offset
Why 5	Training needs to operator not identified and followed.
Root Cause (Occurance)	Training needs to operator not identified and followed.

Root Cause Analysis (Outflow)

Why 1	Thread Major Dia. Undersize parts found at Customer End
Why 2	Defective parts didn`t get arrested during Final inspection
Why 3	Only Visual Inspection is done for threading
Why 4	Inadequate inspection method is Followed
Why 5	

Root Cause (Outflow)	Inadequate inspection method is Followed

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

Type	Countermeasure Details	Responsibility	Target Date	Actual Date	Status
Occurance	1.Training given to Operator about giving Offset. 2.Offset Interlocking is done with in 0.1mm. if by mistake operator gives more offset, it will not get executed.	Mr. Santosh Raut	10/05/2024	10/05/2024	Completed
Outflow	Inspection Method Changed, Snap Gauge implemented for 100% Inspection of major Diameter	Mr. Anil Chaudhari	12/05/2024	10/05/2024	Completed

9. Inspection Method After Customer Complaint

Change In Inspection System	Yes
Change Details	100 % Inspection of Major Diameter with Snap gauge of 37.68-37.75mm
Inspection Method	Gauge
Other Inspection Method	
Check Point at Final Inspection	Yes
Checking Freq.	100%
Sampling	No
Sample Size	100%

10. Evidance of Countermeasure

Occurance (Before)	No Offset interlock Provided for the Dimensions, Operator by Mistake can give to much Offset. 785_Occurance_Before.pptx
Occurance (After)	Offset Interlocking is done within 0.1mm, if operator gave offset more than0.1mm, it will not be accepted. 785_Occurance_After.pptx
Outflow (Before)	Only Visual Inspection is done for threading. 785_Outflow_Before.pptx
Outflow (After)	Inspection Method changed, Snap Gauge implemented for Measurement of Major dia. 785_Outflow_After.pptx

11. Horizontal Deployment

Horizontal Deployment Required	Yes
Applicable Machine / Model / Plant	Fork Bolt AABM

12. Document Review

Documents	ControlPlan, WISOP, InspCheckSheet
Specify Other Document	None

13. Effectiveness Of Action

Reviewed Quantity	100
Reason for submission	OK