

**MANUFACTURER** ALSTOM Ubunye  
 Marievale Road, Vosterkroon, Nigel, 1490  
**CUSTOMER** Gibela  
**CONTRACT**  
**PROJECT** PRASA

### MANUFACTURER'S DELIVERY DOCUMENT

**PRODUCT TYPE** TRAILER BOGIE type TBEXT  
 DTR0009706803  
**SERIAL NUMBER** TBEXT - 593

#### CONTENTS

- Compliance certificate.....	Page 1/2	<input checked="" type="checkbox"/>
- List of deviations and missing parts.....	Page 2/2	<input checked="" type="checkbox"/>
- Products traceability.....	1 page	<input checked="" type="checkbox"/>
- Load test report.....	1 page	<input checked="" type="checkbox"/>

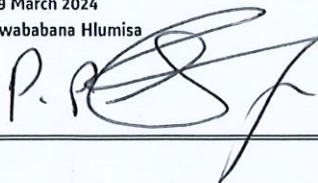
#### COMPLIANCE CERTIFICATE

We hereby declare, barring exceptions, reservations, or exemptions listed in this statement of conformity, that the listed supplies comply with the contract requirements and that, after completions of testing and verification, they completely satisfy all specified requirements and applicable standards and regulations.

#### CONSTRUCTOR APPROVAL

DATE  
 NAME  
 VISA

19 March 2024  
 Kwababana Hlumisa



**I - Deviation / Derogation**

**II - Bogie configuration**

B Bogie index



# ALSTOM UBUNYE PRODUCTS TRACEABILITY

Products Designation	Product Reference	Serial Number	Batch or Date Manufactured	Supplier
Trailer Bogie TBEXT	DTR0009706803	593		Alstom - Abunye
Trailer Bogie Frame	AR00000176083	T0 855		Alstom - Ubunye
Wheelset (Front)	AR000000177020	T0 1575		Alstom - Ubunye
Axle	AR00000174678	102102	1230038	Jinxi
Wheel (Right)	AR00000174670	133	11-23	Bonatrans
Wheel (Left)	AR000000174670	132	11-23	Bonatrans
Wheelset (Rear)	AR00000185203	T0 1580		Alstom Ubunye
Axle	AR00000174678	102141	1230038	Jinxi
Wheel (Right)	AR00000174670	008	11-23	Bonatrans
Wheel (Left)	AR00000174670	003	11-23	Bonatrans
Pneumatic suspension (Right)	AR00000176127	2311142		TMT
Pneumatic suspension (Left)	AR00000176127	2312020		TMT
Brake unit with PB (Right rear)	AR00000174544	1664	03-24	Wabtec
Brake unit without PB (Right front )	AR00000175185	5014	03-24	Wabtec
Brake unit without PB (Left Front)	AR00000175185	5015	03-24	Wabtec
Brake unit without PB (left rear)	AR00000175185	5016	03-24	Wabtec



DATE  
3/19/2024

DATE VALIDATION	RESPONSIBLE VALIDATION	PRASA	INSTRUCTION SHEET:	LOAD TEST : TBEXT
			FAMILY:	PROJECT:

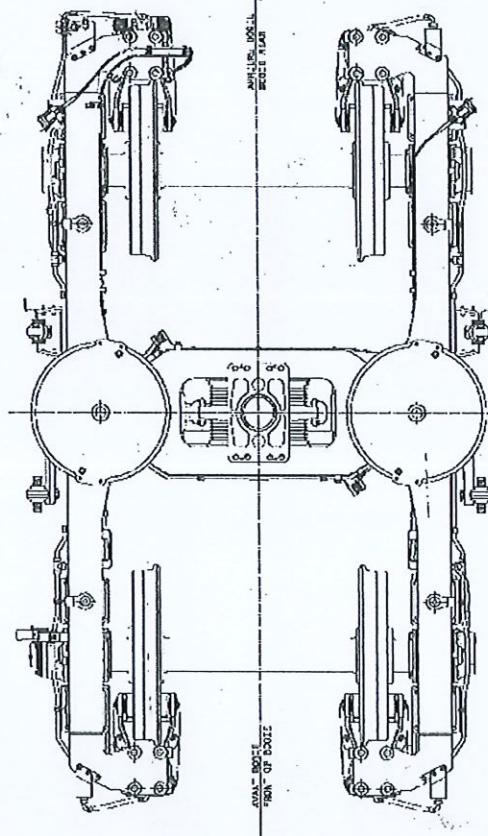
	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN MAX	37.81 ✓
SHIM THICK [mm]		
WEIGHT ON WHEEL [Kg]	Q2	5448

SECONDARY SUSPENSION		DIM. WITH SHIM [mm]	THEORETICAL [mm]
MEASURED [mm]	SHIM THICK [mm]		
589.17	1.00	=	590.17
			MIN 590.00
			MAX 592.50

RIGHT JACK LOAD	
8452	Kg

	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN 33.00 MAX 39.00	38.02 ✓
SHIM THICK [mm]		
WEIGHT ON WHEEL [Kg]	Q4	5457

BOGIE SERIAL N°	593
BOGIE TYPE	TBXT
BOGIE WEIGHT UNDER LOAD [Kg]	21823
COMPLETE BOGIE WEIGHT [Kg]	4587
OPERATOR	DATE
EDWARD	3/15/2024



	THEORETICAL	MEASURED
LOAD DIFFERENCE ON FRONT AXLE [%]	MIN 0.00 MAX 0.00	-0.09
LOAD DIFFERENCE ON REAR AXLE [%]	MIN 0.00 MAX 0.00	0.21
LOAD DIFFERENCE ON FRONT AXLE AND REAR AXLE [%]	MIN 0.00 MAX 0.00	-0.23
LOAD DIFFERENCE ON RAILS [%]	MIN 0.00 MAX 0.00	0.06
LOAD DIFFERENCE ON DIAGONAL WHEELS [%]	MIN 0.00 MAX 0.00	0.15

OPERATOR STAMP

BFI-21

	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN 33.00 MAX 39.00	38.07
SHIM THICK [mm]		
WEIGHT ON WHEEL [kg]	Q1	5438

SECONDARY SUSPENSION				Ø
MEASURED [mm]	SHIM THICK [mm]	DIM. WITH SHIM [mm]	THEORETICAL [mm]	
589.05	+	1.00	=	MIN 590.00 MAX 592.50

DIFFERENCE IN RIGHT AND LEFT SUSPENSION HEIGHTS [mm]		THEORETICAL [mm]
0.12	MIN	-1.00
	MAX	1.00

	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN 33.00 MAX 39.00	37.44 ✓
SHIM THICK [mm]		
WEIGHT ON WHEEL [kg]	Q3	5480



## CERTIFICATION OF CONFORMITY

Inspection certificate according EN 10204-3.1

Product: Traction Motors 6 ECA 3022 B

Serial Number: N \* 20958

Client / Customer: ALSTOM UBUNYE (PTY) LTD

Project: PRASA

P O Number: 75412968

Status: QC PASS

Derogations / Concession / Waiver N \* : N/A

Customer modification: N/A

Missing parts: N/A

We hereby declare, barring exceptions, reservations or exemptions listed in this statement of conformity, that the listed supplies comply with the contract requirements and that, after completion of testing and verification, they completely satisfy all specified requirements, and applicable standards and regulations.

Date: 2024/01/17

Function: Final Inspection

Performed and signed off by: Name \_\_\_\_\_ Dimakatso Mohoalali

Signature \_\_\_\_\_



Gibela Rail  
02 Shosholozu Avenue  
M07 Traction Motor  
1590

GIBELA RAIL

Compiled by M Kola

Date: 22/2/2022

Property of GIBELA RAIL, cannot be distributed or reproduced without authorization



MANUFACTURER **ALSTOM** Ubunye  
 Marievale Road, Vosterkroon, Nigel, 1490

CUSTOMER **Gibela**

CONTRACT

PROJECT **PRASA**

### MANUFACTURER'S DELIVERY DOCUMENT

PRODUCT TYPE **TRAILER BOGIE TBINT**

**DTR00097806802**

SERIAL NUMBER **TBINT 599**

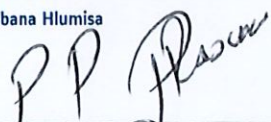
#### CONTENTS

- Compliance certificate.....	Page 1/2	<input checked="" type="checkbox"/>
- List of deviations and missing parts.....	Page 2/2	<input checked="" type="checkbox"/>
- Products traceability.....	1 page	<input checked="" type="checkbox"/>
- Load test report.....	1 page	<input checked="" type="checkbox"/>
- Motor certificate.....	8 pages	<input checked="" type="checkbox"/>

#### COMPLIANCE CERTIFICATE

We hereby declare, barring exceptions, reservations, or exemptions listed in this statement of conformity, that the listed supplies comply with the contract requirements and that, after completions of testing and verification, they completely satisfy all specified requirements and applicable standards and regulations.

#### CONSTRUCTOR APPROVAL

DATE	19 March 2024
NAME	Kwababana Hlumisa
VISA	

**I - Deviation / Derogation**

**II - Bogie configuration**

B Bogie index



**ALSTOM UBUNYE**

## PRODUCTS TRACEABILITY

Products Designation	Product Reference	Serial Number	Batch or Date Manufactured	Supplier
Trailer Bogie TBINT	DTR0009706802	599		Alstom - Abunye
Trailer Bogie Frame	AR000000176083	T857		Alstom - Ubunye
Wheelset (Front)	AR0000000177020	701571		Alstom - Ubunye
Axle	AR000000174678	107261	12176717	Jinxi
Wheel (Right)	AR000000174670	159	10-23	Bonatrans
Wheel (Left)	AR0000000174670	051	10-23	Bonatrans
Wheelset (Rear)	AR000000185203	701572		Alstom Ubunye
Axle	AR000000174678	107340	12176717	Jinxi
Wheel (Right)	AR000000174670	013	10-23	Bonatrans
Wheel (Left)	AR000000174670	036	10-23	Bonatrans
Pneumatic suspension (Right)	AR000000176127	2312013		TMT
Pneumatic suspension (Left)	AR000000176127	2310214		TMT
Brake unit with PB (Right rear)	AR000000174544	1670	03-24	WABTEC
Brake unit without PB (Right front)	AR000000175185	5031	03-24	WABTEC
Brake unit without PB (Left Front)	AR000000175185	5034	03-24	WABTEC
Brake unit without PB (left rear)	AR000000175185	5032	03-24	WABTEC



DATE 03/13/2024

PRASA ALEJ HOUKOVSKÝ

## RESPONSABLE VALIDATION

LOAD TEST: TBINT

**INSTRUCTION SHEET:**

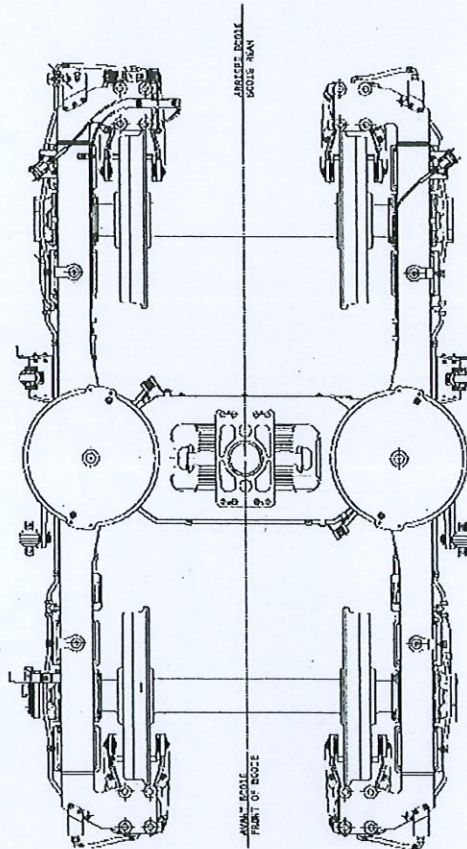
PROJECT: PRASA

FAMILY:

	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN 34.50 MAX 40.50	39.48 ✓
SHIM THICK [mm]		
WEIGHT ON WHEEL [Kg]	Q2	4515

SECONDARY SUSPENSION			THEORETICAL [mm]
MEASURED [mm]	SHIM THICK [mm]	DIM. WITH SHIM[mm]	
589.39	+	0.00	MIN 587.50 MAX 590.00

RIGHT JACK LOAD	6695	Kg
-----------------	------	----



BOGIE SERIAL N°	599
BOGIE TYPE	TBINT
BOGIE WEIGHT UNDER LOAD [Kg]	18305
COMPLETE BOGIE WEIGHT [Kg]	4571
OPERATOR	DATE
BAFANA	3/18/2024

DC-3FI-6

	THEORETICAL	MEASURED
LOAD DIFFERENCE ON FRONT AXLE [%]	MIN -2.00	1.04
	MAX 2.00	
LOAD DIFFERENCE ON REAR AXLE [%]	MIN -2.00	0.75
	MAX 2.00	
LOAD DIFFERENCE ON FRONT AXLE AND REAR AXLE [%]	MIN -2.00	-0.31
	MAX 2.00	
LOAD DIFFERENCE ON RAILS [%]	MIN -2.00	0.90
	MAX 2.00	
LOAD DIFFERENCE ON DIAGONAL WHEELS [%]	MIN -2.00	-0.14
	MAX 2.00	

	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN 34.50 MAX 40.50	39.30 ↙
SHIM THICK [mm]		
WEIGHT ON WHEEL [kg]	Q1	4610

SECONDARY SUSPENSION			
MEASURED [mm]	SHIM THICK [mm]	DIM. WITH SHIM [mm]	THEORETICAL [mm]
589.39	+	0.00	MIN 587.50 MAX 590.00

DIFFERENCE IN RIGHT AND LEFT SUSPENSION HEIGHTS [mm]	
∅	
0.00	MIN -1.00 MAX 1.00

	THEORETICAL	MEASURED
WHEEL DIAMETER [mm]	MIN MAX	
GAP PRIMARY SUSPENSION [mm]	MIN 34.50 MAX 40.50	39.40
SHIM THICK [mm]		
WEIGHT ON WHEEL [Kg]	Q3	4625