

## **Declaration of Conformity**

In Accordance with ANSI/ISEA 125-2014 and ANSI/ASSP Z359.7-2019

Item #: UFH10211P

**Description:** KStrong® Kapture<sup>™</sup> Elite 5-Point Full Body Harness, Dorsal D-ring, Front D-ring, MB Legs (ANSI)

Brand Name: KStrong

Manufacturer: KStrong

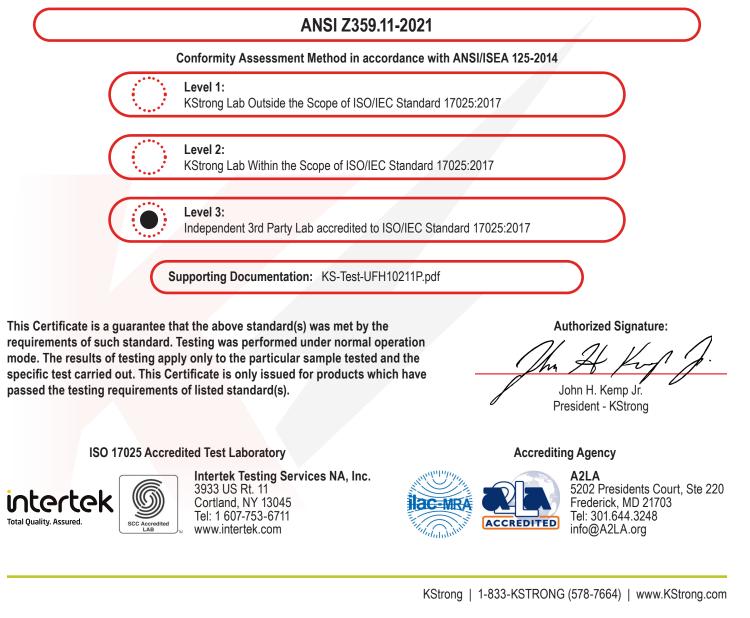
Address: 150 N. Radnor Chester Road, Suite F200, Radnor, PA 19087

### Declaration #: DOC-UFH10211P Declaration Date: 08/29/2024

#### Additional Items Conforming Under this Declaration (If Applicable):

UFH10211P(S-M) UFH10211P(M-L) UFH10211P(L-XL) UFH10211P(XL-2XL) UFH10211P(2XL-3XL)

KStrong declares that the product(s) listed above is in conformity with the requirements of the following performance standard(s):





## **Test Verification of Conformity**

## Verification Number: 105931908CRT-004

harmonized standards and Dire	test report(s), sample(s) of the below product have been found to comply with the ectives listed on this verification at the time the tests were carried out. Other be relevant to the product. This verification is part of the full test report(s) and should
be read in conjunction with it(t	
Applicant Name & Address:	KStrong INC 150 N. Radnor Chester Rd.
	Suite F200
	Radnor, PA 19087
	USA
Product Description:	Full Body Harness
Models/Type References:	UFH10252P, UFH10101P, UFH10131P, UFH10201P, UFH10231P, UFH10211P
Brand Name:	KStrong Inc.
Relevant Standards:	ANSI Z359.11-2021
Verification Issuing Office	Intertek Testing Services NA, Inc.
Name & Address:	3933 US Rt-11 Cortland, NY 13045
	USA
Data of Tasta	04/27/2023 – 04/28/2023
Date of Tests:	04/21/2023 - 04/28/2023
Test Report Number(s):	105931908CRT-003
Signature:	
Name:	Matthew Stevens SCC Accredited ACCREDITED
Position:	Team Leader
Date:	08/29/2024

This Verification is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Verification. Only the Client is authorized to permit copying or distribution of this Verification. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. The observations and test/inspection results referenced in this Verification are relevant only to the sample tested/inspected. This Verification by itself does not imply that the material, product, or service is or has ever been under an Intertek certification program.



# **KSTRONG INC.** TEST REPORT

**SCOPE OF WORK** 

Standard Evaluation to ANSI Z359.11-2021 Safety Requirements for Full Body Harnesses

**REPORT NUMBER** 105931908CRT-003

ORIGINAL REPORT NUMBER 105529384CRT-011

**ISSUE DATE** September 5, 2024

**PAGES** 12

DOCUMENT CONTROL NUMBER

GFT-OP-10a (6-March-2017) © 2017 INTERTEK





Total Quality. Assured.

**TEST REPORT FOR KSTRONG INC.** Report No.: 105931908CRT-003

Date: September 5, 2024

3933 US Rt. 11 Cortland, NY 13045

Telephone: 1 607-753-6711 www.intertek.com

KStrong Inc. 150 N. Radnor Chester Rd. Suite F200 Radnor, PA 19087 USA

 Report Number.....:
 105931908CRT-003

 Signed Quote Number.
 Qu-01473922

PO Number. ..... NA

 Name of Testing Laboratory
 Intertek Testing Services NA Inc.

 Preparing the Report ......
 Intertek Testing Services NA Inc.

Test Specification:

Standard:	ANSI/ASSP Z359.11-2021
Date(s) of Testing:	4/27/2023 - 4/28/2023

**Product Description:** 

Product Type::	Full Body Harness
Model Number::	UFH10252P
Shared Model Number:::	UFH10101P, UFH10131P, UFH10201P, UFH10231P, UFH10211P
Date(s) Samples Received: :	4/17/23

This report is for the exclusive use of Intertek's Client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this report. Only the Client is authorized to permit copying or distribution of this report and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. The observations and test results in this report are relevant only to the sample tested. This report by itself does not imply that the material, product, or service is or has ever been under an Intertek certification program.

Report No.: 105931908CRT-003 Date: September 5, 2024

#### SECTION 1

#### SUMMARY OF TESTING

TESTS COMPLETED	ANSI/ASSP Z359.11-2021 CLAUSE	STATUS
Design	3	PASS
Dynamic Feet First Drop (Dorsal)	4.3.3	PASS
Dynamic Headfirst Drop (Dorsal)	4.3.4	PASS
Fall Arrest Indicator (Dorsal)	4.3.6	PASS
Static Feet First (Dorsal)	4.3.5	PASS
Static Feet First (Hip)	4.3.5	PASS
Static Feet First for Lanyard Parking Attachment	4.3.7	PASS

#### SECTION 2

This test report concludes the work anticipated in the testing phase of your project. Original Testing performed to 2014 Edition. Data evaluated to 2021 version as no differences in test procedures. If there are any questions regarding this report, please contact the undersigned at 607-753-6711.

COMPLETE D BY:	Alex Smith	REVIEWED BY:	Matthew Stevens
TITLE:	Technician	TITLE:	Team Leader
SIGNATURE:	Ales Smith	SIGNATURE	Mall
DATE	09/05/2024	DATE:	09/05/2024

Please see attached test data for details.

Report No.: 105931908CRT-003 Date: September 5, 2024

#### **SECTION 3**

#### **TESTING EQUIPMENT CALIBRATION INFORMATION**

USED FOR TEST	DESCRIPTION	MANUFACTURER	CONTROL NO.	MODEL NO.	SERIAL NO.	CAL. DATE	CAL. DUE
x	Drop Test Structure	Intertek	NA	CAT. 3	-	N/A	N/A
Х	Test Torso	NA	15064	220 lbs	-	VBU	VBU
Х	Load Cell	Interface	G119	-	-	5/25/22	5/25/23
Х	Tape Measure	Kobalt	H422	-	-	5/13/22	5/13/23

#### **SECTION 3**

#### SUPPLEMENTAL TEST DATA

Paragraph	Test Description	Results	Compliance
3	Requirements		
3.1	Design Requirements		
3.1.1	Permanently incorporate a dorsal or sternal attachment	YES	PASS
3.1.2	Materials and constructions shall meet requirements	YES	PASS
3.1.3	FBH w/ dorsal attachment shall permanently include a sub- pelvic strap and /or waist belt	YES	PASS
3.1.4	FBH w sternal attachment shall permanently include a waist belt	YES	PASS
3.1.5	All shoulder straps shall come together and be connected at the dorsal location	YES	PASS
3.1.6	All FBH's shall permanently incorporate a waist belt or a back strap for controlling the separation of the shoulder straps	YES	PASS
3.1.7	Modular components shall design requirements		NA
3.1.7.1	Modular components shall be attached to the harness using connections that meet section 3		NA
3.1.7.2	Attachment element extender can be no longer than 24- inches		NA
3.1.8	FBH integrated into a vest shall allow visual inspection or entire FBH		NA
3.1.9	All FBH shall be equipped with a fall arrest indicator that will deploy during dynamic testing	YES	PASS
3.1.10	FBH/EA/EAL combinations shall meet the requirements of Z359.11 and Z359.13	YES	PASS
3.1.11	FBH shall include keepers for straps	YES	PASS
3.1.12	FBH shall include lanyard parking attachment	YES	PASS
3.1.13	It shall not be possible to remove elements	YES	PASS
3.1.14	All single point attachment elements must be located within 2-inches of the vertical centerline	YES	PASS
3.2	Attachment Element Requirements	YES	PASS
3.2.1	Dorsal- shall be used as the primary fall arrest attachment	YES	PASS
3.2.1.1	May be used in travel restraint or rescue	YES	PASS
3.2.1.2	Dorsal attachment shall direct the load through the shoulder straps and around the thighs	YES	PASS
3.2.1.3	Dorsal Attachment Element requirements	YES	PASS
3.2.1.3.1	Dynamic Feet First- see section 4.3.3	YES	PASS

Paragraph	Test Description	Results		Compliance
3.2.1.3.2	Dynamic Head First – see section 4.3.4		YES	PASS
3.2.1.3.3	Static Feet First- see section 4.3.5		YES	PASS
3.2.1.3.4	Fall Arrest Indicator – see section 4.3.6		YES	PASS
3.2.2	The sternal attachment may be used as an alternative fall arrest attachment		YES	PASS
3.2.2.1	The sternal attachment may be used for travel restraint or rescue		N/A	A NA
3.2.2.2	Sternal attachment design shall direct the load through the shoulder straps and thighs		N/#	A N/A
3.2.2.3	Sternal Attachment Element Requirements		N/A	A N/A
3.2.2.3.1	Dynamic Feet First – see section 4.3.3		N/A	N/A
3.2.2.3.2	Static Feet First – see section 4.3.5		N/A	A N/A
3.2.2.3.3	Fall Arrest Indicator – see section 4.3.6		N/#	A N/A
3.2.3	Frontal attachment to be used for ladder guided type FA's where no chance of fall in a feet first direction (may be used for work positioning)		NA	NA
3.2.3.1	Frontal Attachment Element Requirements			NA
3.2.3.1.1	Dynamic Feet First – see section 4.3.3			NA
3.2.3.1.2	Static Feet First – see section 4.3.5			NA
3.2.4	Shoulder attachments shall be used as a pair, also for rescue and entry/retrieval not for FA.			NA
3.2.4.1	Shoulder Attachment Elements Requirements			NA
3.2.4.1.1	Static Feet First – see section 4.3.5			NA
3.2.5	Waist, rear attachment for travel restraint only			NA
3.2.5.1	Waist, rear attachment shall be subjected to minimal loading, not used for FA			NA
3.2.5.2	Waist Attachment Elements Requirements			NA
3.2.5.2.1	Static Feet First – see section 4.3.5			NA
3.2.6	Hip attachments shall be used as a pair and solely for work positioning, not used for FA		YES	PASS
3.2.6.1	Hip Attachment Element Performance Requirements		YES	PASS
3.2.6.1.1	Static Feet First – see section 4.3.5		YES	PASS
3.2.7	Suspension seat shall be used as a pair and solely for work positioning, not used for FA		NA	NA
3.2.7.1	Suspension Seat Attachment Element Performance Requirements		NA	NA
3.2.7.1.1	Static Feet First – see section 4.3.5		YES	PASS
3.3	Component Requirements		YES	PASS
3.3.1	Load Bearing Straps		YES	PASS
3.3.1.1	Shall not be less than 1-5/8" (41mm)		YES	PASS
3.3.1.2	Minimum breaking strength of 5,000 lbs per section 7.1.1		YES	PASS
3.3.1.3	Straps shall be pure, non-recycled synthetic material. Any restrictions shall be marked on the FBH		YES	PASS
3.3.1.4	Straps shall be hot cut, sealed, covered, or stitched to prevent fraying		YES	PASS
3.3.1.5	After abrasion conditioning per 7.1.2, straps shall have a breaking strength of at least 3,600 lbs when tested to 7.1.1		YES	PASS

Paragraph	Test Description		Results				Compliance
3.3.1.6	In areas of concentrated wear straps shall	be protected		YES			PASS
3.3.1.7	Spacing between eyelets centers shall be inches	between 1-1/8- 2		YES			PASS
3.3.2	Thread and Stitching		,	YES			PASS
3.3.2.1	Shall have the same material as load bear	ing straps		YES			PASS
3.3.2.2	All stitching shall be lock stitched and bac		,	YES			PASS
3.3.2.3	All stitching used to connect load bearing						
	contrasting in color at a distance of 12-inc			YES			PASS
3.3.3	Connecting Components		,	YES			PASS
3.3.3.1	Hardware shall conform to Z359.12 (exce	pt soft loops)	,	YES			PASS
3.3.3.2	Soft loops attachments may be used in pla connecting components			YES			PASS
3.3.3.3	Soft loop attachments shall be constructe	d of materials that					NIA
	meet section 3.3.1					NA	NA
3.3.3.4	Soft loops shall include protection from w	vear				NA	NA
4	Qualification Testing						
		<b>"DORSAL ATT</b>	ACHMENT"				
	<ul> <li><u>Test Set-up (Dorsal):</u></li> <li>1. Don the harness on the test torso</li> <li>2. Position dorsal attachment per the Mfg Instructions.</li> <li>3. If equipped with chest strap (section 4.3.2), locate strap +/-2 inches on torso from datum E figure 5 and 1b of standard</li> <li>4. Determine drop height, attach quick release to the torso neck, lower torso to remove slack, measure height (lowest point of torso to floor)</li> <li>5. Raise torso to predetermined height, release, measure MAF, measure and record final height</li> </ul>	Requi         Sample ID:         Location of Dorsal At         Drop Height         Max Arrest Force         Hi- initial height         Hf- final height         He – Harness Effect (         Harness effect shall n         which is stated in the         whichever is less. State         Release from the torso         Support the torso for a fall	Hi-Hf) ot exceed 18-inches or Mfg. Instructions, ited: o a period of 5-minutes post o post fall of an angle not rtical t indicator deployed		inches ft lbs inches inches inches 7.8°	5 5 5 5	PASS

Paragraph	Test Description	Results			Compliance
4.3.3	Dynamic <u>Feet First</u> Drop Test: <u>Test Set-up (Dorsal):</u> 1. Don the harness on the test torso	Feet First DORSAL Attachm Requirements per Section 3.2. Sample ID: 2 Location of Dorsal Attachment Element			
	2. Position dorsal attachment per the	Drop Height	5	ft	
	Mfg Instructions.	Max Arrest Force	5987	lbs	
	3. If equipped with chest strap (section	Hi- initial height	126"	inches	
	4.3.2), locate strap $+/-2$ inches on torso	Hf- final height	139"	inches	
	from datum E figure 5 and 1b of	He – Harness Effect (Hi-Hf)	13"	inches	
	<ul><li>standard</li><li>4. Determine drop height, attach quick release to the torso neck, lower torso to</li></ul>	Harness effect shall not exceed 18-inches or which is stated in the Mfg. Instructions, whichever is less. Stated	18	inches	PASS
	remove slack, measure height (lowest	Release from the torso	No		
	point of torso to floor) 5. Raise torso to predetermined height,	Support the torso for a period of 5-minutes post fall	Yes		
	release, measure MAF, measure and record final height	Shall support the torso post fall of an angle not greater than 30° to vertical	Yes	8.5°	
		At least one fall arrest indicator deployed visibly and permanently	Yes		
4.3.3	Dynamic <u>Feet First</u> Drop Test: <u>Test Set-up (Dorsal):</u>	Feet First DORSAL Attachme Requirements per Section 3.2.1 Sample ID: 3			
	1. Don the harness on the test torso	Location of Dorsal Attachment Element	8	inches	
	2. Position dorsal attachment per the	Drop Height	5'	ft	
	Mfg Instructions.	Max Arrest Force	5530	lbs	
	3. If equipped with chest strap (section $4.2.2$ ) have a strain $1/2$ in the sector	Hi- initial height	126"	inches	
	4.3.2), locate strap +/-2 inches on torso from datum E figure 5 and 1b of	Hf- final height	138 ¼"	inches	
	standard	He – Harness Effect (Hi-Hf)	12 1⁄4"	inches	
	4. Determine drop height, attach quick release to the torso neck, lower torso to	Harness effect shall not exceed 18-inches or which is stated in the Mfg. Instructions, whichever is less. Stated:	18	inches	
	remove slack, measure height (lowest point of torso to floor)	Release from the torso	No		DAGG
	5. Raise torso to predetermined height,	Support the torso for a period of 5-minutes post fall	Yes		PASS
	release, measure MAF, measure and record final height	Shall support the torso post fall of an angle not greater than 30° to vertical	Yes	8.0°	
		At least one fall arrest indicator deployed visibly and permanently	Yes		

Paragraph	Test Description	Results		Compliance
4.3.4	<ul> <li>Dynamic <u>Head First</u> Drop Test:</li> <li><u>Test Set-up (Dorsal)</u>:</li> <li>1. Don the harness on the test torso</li> <li>2. Position dorsal attachment bearing point 8 +/- 1 inch below the top of the shoulder (or maximum lowest position)</li> <li>3. If equipped with chest strap (section 4.3.2), locate strap +/-2 inches on torso from datum E figure 5 and 1b of standard</li> <li>4. Attach quick release to the torso crotch, lower torso to remove slack</li> <li>5. Raise torso to predetermined height, release, measure MAF</li> </ul>	Head First DORSAL Attachment Requirements per Section 3.2.1.3.         Sample ID:       1         Location of Dorsal Attachment Element       1         Drop Height       Max Arrest Force         Release from the torso       Support the torso for a period of 5-minutes post fall         Shall support the torso post fall of an angle not greater than 30° to vertical         At least one fall arrest indicator deployed visibly and permanently	inches ft lbs No 7.4°	PASS
4.3.4	Dynamic Head First Drop Test:Test Set-up (Dorsal):1. Don the harness on the test torso2. Position dorsal attachment bearingpoint 8 +/- 1 inch below the top of theshoulder (or maximum lowest position)3. If equipped with chest strap (section4.3.2), locate strap +/-2 inches on torsofrom datum E figure 5 and 1b ofstandard4. Attach quick release to the torsocrotch, lower torso to remove slack5. Raise torso to predetermined height,release, measure MAF	Head First DORSAL Attachment Requirements per Section 3.2.1.3.         Sample ID:       2         Location of Dorsal Attachment Element       2         Drop Height       Max Arrest Force         Release from the torso       Support the torso for a period of 5-minutes post fall         Shall support the torso post fall of an angle not greater than 30° to vertical       At least one fall arrest indicator deployed visibly and permanently	inches ft lbs No 7.7°	PASS
4.3.4	Dynamic Head First Drop Test:         Test Set-up (Dorsal):         1. Don the harness on the test torso         2. Position dorsal attachment bearing point 8 +/- 1 inch below the top of the shoulder (or maximum lowest position)         3. If equipped with chest strap (section 4.3.2), locate strap +/-2 inches on torso from datum E figure 5 and 1b of standard         4. Attach quick release to the torso crotch, lower torso to remove slack         5. Raise torso to predetermined height, release, measure MAF	Head First DORSAL Attachment Requirements per Section 3.2.1.3.         Sample ID:       3         Location of Dorsal Attachment Element         Drop Height         Max Arrest Force         Release from the torso         Support the torso for a period of 5-minutes post fall         Shall support the torso post fall of an angle not greater than 30° to vertical         At least one fall arrest indicator deployed visibly and permanently	inches Ft Lbs No 8.0°	PASS

Paragraph	Test Description	Results	Compliance
4.3.5	Static <u>Feet First</u> Test: <u>Test Set-up (Dorsal):</u> 1. Don the harness on the test torso 2. Secure crotch of test torso to test equipment 3. connect to attachment element 4. mark locations of buckles and adjusters 5. apply 3,600 lb load and maintain for 1-minute 6. Release load and evaluate sample	Feet First DORSAL Attachment Requirements per Section 3.2.1.3.3         Sample ID:       1,2,3         Release from the torso       no         Slippage – Crotch Strap Adjuster, Right       0       inches         Slippage – Crotch Strap Adjuster, Left       0       inches         Slippage – Chest Strap Adjuster, Center       0       inches         Slippage – Chest Strap Adjuster, Right       0       inches         Slippage – Chest Strap Adjuster, Left       0       inches         Slippage – Chest Strap Adjuster, Left       0       inches         Slippage – Other       na       inches         Strap tear further than adjacent eyelet adjuster       na         Straps shall show no signs of tearing       Yes         "Slippage through any adjuster shall not exceed 1-inch"	PASS
4.3.6	Fall Arrest Indicator Test:         Test Set-up (Dorsal):         1. Don the harness on the test torso         2. Position dorsal attachment per the Mfg Instructions.         3. Attach quick release to the neck of the test torso         4. Attach a Z359.13 compliant 6-foot EAL to the test anchorage         5. lower torso until test shackles are straight but no load         6. raise torso 24-inches	DORSAL Attachment         Requirements per Section 3.2.1.3.4         Sample ID:       1,2,3         At least one fall arrest indicator shall deploy       Yes         visibly and permanently       Yes	PASS

Paragraph	Test Description	Results	Compliance	
	"HIP ATTACHMENT"			
4.3.5	<ul> <li>Static <u>Feet First</u> Test:</li> <li><u>Test Set-up (Hip):</u></li> <li>1. Don the harness on the test torso</li> <li>2. Secure crotch of test torso to test equipment</li> <li>3. connect to attachment element</li> <li>4. mark locations of buckles and adjusters</li> <li>5. apply 3,600 lb load and maintain for 1-minute</li> <li>6. Release load and evaluate sample</li> </ul>	Feet First HIP Attachment Requirements per Section 3.2.6.1.1         Sample ID:       1,2,3         Release from the torso       no         Slippage – Crotch Strap Adjuster, Right       0       inches         Slippage – Crotch Strap Adjuster, Left       0       inches         Slippage – Chest Strap Adjuster, Center       0       inches         Slippage – Chest Strap Adjuster, Right       0       inches         Slippage – Chest Strap Adjuster, Left       0       inches         Slippage – Other       na       inches         Slippage htrough any adjuster shall not exceed 1-inch"       "Slippage through any adjuster shall not exceed 1-inch"	PASS	
4.3.7	<ul> <li>*STATIC FEET FIRST TEST FO</li> <li>1) Secure the crotch of the test torso to the static test equipment ensuring the direction of the pull on the attachment simulates a feet first fall</li> <li>2) Connect the attachment element to the static test equipment using a test lanyard.</li> <li>3) Apply and steadily increase the load until a disengagement load of not more than 120 pounds (0.5 Kn)</li> </ul>	R LANYARD PARKING ATTACHMENT ELEMENT"         Sample ID:       1-3         Sample 1 (break load)       24       lbs         Sample 2 (break load)       23       lbs         Sample 3 (break load)       26       lbs	PASS	

Report No.: 105931908CRT-003 Date: September 5, 2024

#### **SECTION 5**

#### **REVISION HISTORY**

REPORT NUMBER	DATE OF REVISION	DESCRIPTION OF CHANGE:	PROJECT OWNER	REVIEWED BY
105431545CRT-001	04/28/2023	Original Report	Alex Smith	Matthew Stevens
105431545CRT-001	08/04/2023	Report Correction (Model Number & Shared Model Number)	Alex Smith	Matthew Stevens
105529384CRT-011	08/10/2023	Report Extension	Alex Smith	Matthew Stevens
105931908CRT-003	08/29/2024	Report Extension	Alex Smith	Matthew Stevens
105931908CRT-003	09/05/2024	Removed Sternal Data	Alex Smith	Matthew Stevens

SECTION 6

PHOTOGRAPHS

UFH10101P

UFH10252P





Report No.: 105931908CRT-003 Date: September 5, 2024



UFH10231P

UFH10211P



