

TEST REPORT

SABS

Enquiries: J Conradie
Tel: +27 12 428 6816
Fax: +27 12 428 6051
e-mail: conradjm@sabs.co.za
W/O No. 2527/11B072(A)
Date: 2011-05-31

Bullet Proofing Technology
Attention: Deon du Plessis
PO Box 1115
Rant-en-Dal
1751
Tel: 011 955 6104/5
Fax: 011 955 6106

Ballistic Testing of Body Armour SANS 1658:2007 Level III Special (SA Mix)

1. TEST SAMPLES

- 1.1. Bullet Proofing Technology supplied two complete bullet resistant body armours for testing.
- 1.2. The panels consisted of ceramic plates in conjunction with Level II soft armour consisting of 25 layers 190g/m² Aramid.
- 1.3. The armours passed.

2. TEST ARRANGEMENT

- 2.1. The tests were done at the Bullet Proofing Technology test range on 31 May 2011.
- 2.2. The armour was tested to SANS 1658:2007 Level III Special (SA Mix).
- 2.3. Standard sporting rifles were used as weapons.
- 2.4. Striking velocities were measured 2m from the barrel on a 15m range, using an Oehler 35P ballistic chronograph.
- 2.5. All test firings were conducted at an average temperature of 12°C and relative humidity of 51%.
- 2.6. Back face material calibration was done to SANS 1658:2007.
3. All tests were executed by L van der Westhuizen of BPT and witnessed by J Conradie of the SABS.

**(This report may not be published in part or
as a whole without permission from SABS)**

/4. RESULTS

4. Test on body armour supplied by Bullet Proofing Technology.

4.1. Tested to SANS 1658:2007 Level III Special (SA Mix).

4.2. RESULTS

The following were the test results obtained on a 15m range

Type	Ceramic plate ICW Level II soft armour
Protection Level	III Special (SA Mix)
Size	250mm x 300mm

Panel no.	1037278
Weight	2,708kg

Shot	Calibre	Bullet		Velocity (m/s)		Penetration	Backface signature (Max 44mm)	Result
		Type	Weight	Required	Achieved			
1 x 0°	7.62 x 51	FMJ	143gr	862 +9	867	No	32	Pass
2 x 0°	7.62 x 39	FMJ	123gr	710 +9	716	No	18	Pass
3 x 0°	7.62 x 39	FMJ	123gr	710 +9	723	No	17	Pass
4 x 0°	5.56 x 45	FMJ	55gr	955 +9	955	No	5	Pass
5 x 0°	5.56 x 45	FMJ	55gr	955 +9	960	No	23	Pass

Panel no.	1037279
Weight	2,726kg

Shot	Calibre	Bullet		Velocity (m/s)		Penetration	Backface signature (Max 44mm)	Result
		Type	Weight	Required	Achieved			
1 x 0°	7.62 x 39	API	120gr	725 +9	717	No	22	Pass
2 x 0°	7.62 x 39	FMJ	123gr	710 +9	723	No	11	Pass
3 x 0°	7.62 x 39	FMJ	123gr	710 +9	721	No	33	Pass
4 x 0°	5.56 x 45	FMJ	55gr	955 +9	963	No	22	Pass
5 x 0°	5.56 x 45	FMJ	55gr	955 +9	960	No	6	Pass

4.3. OVERALL RESULT

The armour passed with no penetrations and all BFS measurements within prescribed limits.



S Matloga
Test Officer



J Conradie
Senior Test Officer

5. Test on body armour supplied by Bullet Proofing Technology.

5.1. Tested to SANS 1658:2007 Level III Special (SA Mix).

5.2. RESULTS

The following were the test results obtained on a 15m range

Type	Ceramic plate ICW Level II soft armour
Protection Level	III Special (SA Mix)
Size	250mm x 300mm

Panel no.	1037886
Weight	2,668kg

Shot	Calibre	Bullet		Velocity (m/s)		Penetration	Backface signature (Max 44mm)	Result
		Type	Weight	Required	Achieved			
1 x 0°	7.62 x 51	FMJ	143gr	862 +9	865	No	32	Pass
2 x 0°	7.62 x 39	FMJ	123gr	710 +9	717	No	7	Pass
3 x 0°	7.62 x 39	FMJ	123gr	710 +9	719	No	17	Pass
4 x 0°	5.56 x 45	FMJ	55gr	955 +9	954	No	11	Pass
5 x 0°	5.56 x 45	FMJ	55gr	955 +9	955	No	13	Pass

Panel no.	1037887
Weight	2,720kg

Shot	Calibre	Bullet		Velocity (m/s)		Penetration	Backface signature (Max 44mm)	Result
		Type	Weight	Required	Achieved			
1 x 0°	7.62 x 39	API	120gr	725 +9	720	No	18	Pass
2 x 0°	7.62 x 39	FMJ	123gr	710 +9	717	No	28	Pass
3 x 0°	7.62 x 39	FMJ	123gr	710 +9	706	No	11	Pass
4 x 0°	5.56 x 45	FMJ	55gr	955 +9	952	No	21	Pass
5 x 0°	5.56 x 45	FMJ	55gr	955 +9	948	No	8	Pass

5.3. OVERALL RESULT

The armour passed with no penetrations and all BFS measurements within prescribed limits.



S Matloga
Test Officer



J Conradie
Senior Test Officer