Muhammad Saeed **Test Performed By:** **Dr. /Engr.** Asad Ali Gilani

PE I Con Developers Lahore.(BAH IBB Jaranwala Road Faisalabad)

SOM Lab

Client Reference: Nil **Ref:** 3458(Page-1/1)

Dated: 03-01-2024 **Dated:** 04-01-2024

Test: Tension Test & Bend Test **Test Specification:** ASTM-A-615

Gauge Length: 8 inch **Sample Type:** Deformed Bar

S.No.	Weight	Dia.		Area		Yield Load	Ultimate Load	Yield Stress		Ult. Stress		Elongation	Gauge Length	%age Elongation	Remarks
		Nominal	Calculated	Nominal	Calculated			(according to nominal area)	(according to measured area)	(according to nominal area)	(according to measured area)				
	lb/ft	#	in	in^2	in^2	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.603	8	0.987	0.79	0.765	29.48	37.69	82300	84990	105210	108650	1.30	8.0	16.3	
2	2.603	8	0.987	0.79	0.765	29.12	37.43	81310	83960	104500	107910	1.30	8.0	16.3	
3	1.465	6	0.741	0.44	0.431	14.19	18.98	71130	72610	95140	97130	1.20	8.0	15.0	
4	1.469	6	0.742	0.44	0.432	14.37	19.08	72050	73380	95650	97420	1.10	8.0	13.8	
5	0.647	4	0.492	0.20	0.190	7.16	8.48	78910	83070	93530	98450	1.00	8.0	12.5	
6	0.656	4	0.496	0.20	0.193	6.57	8.00	72510	75140	88240	91440	1.00	8.0	12.5	
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BEND TEST:

# 8	Sample bend through 180 degrees Satisfactorily without any crack
# 6	Sample bend through 180 degrees Satisfactorily without any crack
# 4	Sample bend through 180 degrees Satisfactorily without any crack

Note:-

Only Nine Samples Received and Tested

Note: Please always confirm the results of above report on web www.uet-civil.edu.pk

Engr. Nauman Qamar **Test Performed By:** **Dr. /Engr.** Asad Ali Gillani

RE AZEA Narowal.(Widening/Imp Of Road From Sialkot Cantt To Jassar Garrison Distt Narowal)

Client Reference: AZ/RE/SNR/68 **SOM Lab Ref:** 3460 (Page-1/2)

Dated: 21-12-2023 **Dated:** 04-01-2023

Test: Tension Test & Bend Test **Test Specification:** ASTM-A-615

Gauge Length: 8 inch **Sample Type:** Deformed Bar (Farooq Supreme)

S.No.	Weight	Dia.		Area		Yield Load	Ultimate Load	Yield Stress		Ult. Stress		Elongation	Gauge Length	%age Elongation	Remarks
		Nominal	Calculated	Nominal	Calculated			(according to nominal area)	(according to measured area)	(according to nominal area)	(according to measured area)				
	lb/ft	#	in	in^2	in^2	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	1.081	5	0.636	0.31	0.318	8.69	13.32	61790	60240	94790	92400	1.40	8.0	17.5	
2	1.075	5	0.634	0.31	0.316	8.61	13.12	61280	60120	93340	91560	1.40	8.0	17.5	
3	0.672	4	0.501	0.20	0.197	5.17	7.56	56990	57860	83410	84680	1.30	8.0	16.3	
4	0.667	4	0.500	0.20	0.196	5.10	7.46	56210	57350	82290	83960	1.20	8.0	15.0	
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BEND TEST:

# 5	Sample bend through 180 degrees Satisfactorily without any crack
# 4	Sample bend through 180 degrees Satisfactorily without any crack

Note:-

Only Six Samples Received and Tested

Note: Please always confirm the results of above report on web www.uet-civil.edu.pk

Engr. Nauman Qamar **Test Performed By:** **Dr. /Engr.** Asad Ali Gillani

RE AZEA Narowal.(Widening/Imp Of Road From Sialkot Cantt To Jassar Garrison Distt Narowal)

Client Reference: AZ/RE/SNR/69 **SOM Lab Ref:** 3460 (Page-2/2)

Dated: 21-12-2023 **Dated:** 04-01-2023

Test: Tension Test & Bend Test **Test Specification:** ASTM-A-615

Gauge Length: 8 inch **Sample Type:** Deformed Bar (Islamabad Supreme)

S.No.	Weight	Dia.		Area		Yield Load	Ultimate Load	Yield Stress		Ult. Stress		Elongation	Gauge Length	%age Elongation	Remarks
		Nominal	Calculated	Nominal	Calculated			(according to nominal area)	(according to measured area)	(according to nominal area)	(according to measured area)				
	lb/ft	#	in	in^2	in^2	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	1.042	5	0.624	0.31	0.306	8.48	13.10	60340	61130	93190	94410	1.30	8.0	16.3	
2	1.057	5	0.629	0.31	0.311	8.69	13.32	61790	61590	94790	94480	1.20	8.0	15.0	
3	0.659	4	0.497	0.20	0.194	4.99	7.49	55080	56790	82620	85180	1.00	8.0	12.5	
4	0.669	4	0.501	0.20	0.197	4.99	7.54	55080	55920	83180	84450	1.30	8.0	16.3	
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BEND TEST:

# 5	Sample bend through 180 degrees Satisfactorily without any crack
# 4	Sample bend through 180 degrees Satisfactorily without any crack

Note:-

Only Six Samples Received and Tested

Note: Please always confirm the results of above report on web www.uet-civil.edu.pk

Test Performed by: .S. Asad Ali Gillani

Engr Shafaqat Ali
Structure Engineer
Ameen Jan Dairy Form Khyber Pakhtunkhwa Pakistan

Client Reference No.: Nil Dated: 04-01-2024

SOM Lab Ref: CED/SOM/3459 (Page 1/1) Dated: 04-01-2024

Test Type: Tensile Test & Hardness Test

Sample Type: MS Steel Plates **Gauge Length**: 2 Inches

Tensile Test Results

Sr.#.	Sample Type	Strip Size (mm)	Area (mm^2)	Yield Load (kN)	Ultimate Load (kN)	Yield Stress (MPa)	Ultimate Tensile Stress (MPa)	% Elongation
1	Steel Plate (Sq)	35.4 x 5.0	177.0	69.0	89.7	389.83	506.78	40.0
2	Steel Plate (Rec)	33.0 x 5.1	168.3	69.7	86.0	414.14	510.99	30.0

Hardness Test Details:

Machine used: Avery Rockwell Hardness Testing Machine

(Minor Load: 10 Kgf Major Load: 90.0 kgf Scale: B)

Hardness Test Results

Sample No.	Sample Type	Hardness
1	Steel Plate (Sq)	HR – 81.3 – B
2	Steel Plate (Rec)	HR – 78.3 – B

Note: Please always confirm the results on web www.uet-civil.edu.pk