

Project  
Coordinator,  
TCC Construction, Multan

Test Performed By: Dr. /Engr. M Rehan Ashraf

Client Reference: nil  
SOM Lab Ref: CED/SOM/905(Page-1/1)

Dated: 23-05-2019  
Dated: 28-05-2019

Test: Tension Test & Bend Test  
Sample Type: Deformed Bar

Test Specification: ASTM-A 615  
Gauge Length: 200 mm

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)				
	kg/m	mm	mm	mm <sup>2</sup>	mm <sup>2</sup>	kN	kN	MPa	MPa	MPa	MPa	mm	mm	%	
1	3.805	25	24.85	491	485	271.00	340.20	552	559	693	702	32.5	200	16.3	
2	3.802	25	24.83	491	484	278.00	346.20	566	575	705	715	30.0	200	15.0	
3	2.389	20	19.68	314	304	159.00	209.50	506	523	667	689	35.0	200	17.5	
4	2.397	20	19.72	314	305	160.00	210.50	509	524	670	690	37.5	200	18.8	
5	1.561	16	15.91	201	199	95.50	138.50	475	481	689	697	40.0	200	20.0	
6	1.564	16	15.93	201	199	94.70	138.20	471	476	687	694	32.5	200	16.3	
7	0.906	12	12.12	113	115	66.50	78.50	588	577	694	681	30.0	200	15.0	
8	0.910	12	12.15	113	116	65.50	78.00	579	566	690	673	25.0	200	12.5	
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**BEND TEST:**

25mm	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:- Only Twelve Samples Received and Tested</b>
20mm	Sample bend through 180 degrees Satisfactorily without any crack	
16mm	Sample bend through 180 degrees Satisfactorily without any crack	
12mm	Sample bend through 180 degrees Satisfactorily without any crack	

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)

Assistant Director Engg-III,  
Water and Sanitation Agency (GDA) Gijranwala

Test Performed By: Dr. /Engr. M Rizwan Azam

Client Reference: WASA/ADE-III-35

SOM Lab

Ref: 902(Page-1/1)

Dated: 25-05-2019

Dated: 28-05-2019

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Deformed

Gauge Length: 8 inch

Sample Type:

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 <sup>2</sup>	in <sup>2</sup>	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	1.515	6	0.753	0.44	0.445	15.31	20.64	76750	75880	103470	102310	1.00	8.0	12.5	
2	0.646	4	0.492	0.20	0.190	6.22	7.77	68570	72180	85660	90170	0.90	8.0	11.3	
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**BEND TEST:**

# 6	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:-  Only Four Samples Received and Tested</b>
# 4	Sample bend through 180 degrees Satisfactorily without any crack	

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)

Syed Mohsin Ali  
 Manager QA/QC, Department, Bahria Town, (Pvt) Ltd Lahore

Test Performed By: Dr. /Engr. M Irfan UI Hassan

Client Reference: QA/QC-Steel-1435

SOM Lab

Ref: 903(Page-1/1)

Dated: 28-05-2019

Dated: 28-05-2019

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar(AGS Steel)

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 <sup>2</sup>	in <sup>2</sup>	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.621	8	0.990	0.79	0.770	22.91	30.99	63950	65610	86510	88760	1.50	8.0	18.8	
2	2.589	8	0.984	0.79	0.761	26.20	34.96	73140	75930	97610	101330	1.20	8.0	15.0	
3	1.507	6	0.751	0.44	0.443	15.39	19.57	77160	76630	98100	97440	1.40	8.0	17.5	
4	1.504	6	0.750	0.44	0.442	15.44	19.85	77410	77060	99480	99030	1.30	8.0	16.3	
5	0.659	4	0.497	0.20	0.194	6.88	8.46	75880	78220	93300	96190	1.20	8.0	15.0	
6	0.657	4	0.496	0.20	0.193	6.93	8.41	76440	79210	92740	96100	1.10	8.0	13.8	
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**BEND TEST:**

# 8	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:-  Only Nine Samples Received and Tested</b>
# 6	Sample bend through 180 degrees Satisfactorily without any crack	
# 4	Sample bend through 180 degrees Satisfactorily without any crack	

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)

Assistant Project Director  
PMU- SBP, Sports Board Punjab

Test Performed By: Dr. /Engr. M Rizwan Azam

Client Reference: APD/PMU/SBP/SWL/19/16

SOM Lab

Ref: 904(Page-1/1)

Dated: 25-05-2019

Dated: 28-05-2018

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Deformed

Gauge Length: 8 inch

Sample Type:

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 <sup>2</sup>	in <sup>2</sup>	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.664	8	0.998	0.79	0.783	31.50	38.79	87940	88720	108280	109250	1.20	8.0	15.0	
2	2.670	8	1.000	0.79	0.785	31.45	38.74	87790	88350	108140	108830	1.30	8.0	16.3	
3	1.465	6	0.741	0.44	0.431	14.83	18.76	74350	75900	94020	95980	1.40	8.0	17.5	
4	1.476	6	0.743	0.44	0.434	15.70	20.10	78690	79780	100760	102150	1.20	8.0	15.0	
5	0.658	4	0.496	0.20	0.193	6.95	8.72	76660	79450	96110	99600	1.00	8.0	12.5	
6	0.673	4	0.502	0.20	0.198	7.31	8.87	80600	81410	97800	98780	1.00	8.0	12.5	
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**BEND TEST:**

# 8	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:-  Only Nine Samples Received and Tested</b>
# 6	Sample bend through 180 degrees Satisfactorily without any crack	
# 4	Sample bend through 180 degrees Satisfactorily without any crack	

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)

Maj Adnan khalid®

Test Performed By:

Dr. /Engr.

M Rizwan Azam

Dy Dir MTL, Proposed Commercial Plaza, DRGCC Ph-III, DHA Ph-VI, (M/S Construct)

Client Reference: 408/241/E/Lab/587/2576

SOM Lab

Ref:

906(Page-1/2)

Dated: 23-05-2019

Dated:

28-05-2019

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar (MolZ Steel)

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 <sup>2</sup>	in <sup>2</sup>	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	1.503	6	0.750	0.44	0.442	14.50	19.16	72660	72330	96060	95630	1.20	8.0	15.0	
2	1.500	6	0.749	0.44	0.441	14.93	19.54	74860	74690	97950	97730	1.20	8.0	15.0	
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**BEND TEST:**

# 6	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:-  Only Three Samples Received and Tested</b>

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)

Maj Adnan khalid®

Test Performed By:

Dr. /Engr.

M Rizwan Azam

Dy Dir MTL, Proposed Commercial Plaza, DRGCC Ph-III, DHA Ph-VI, (M/S Construct)

Client Reference: 408/241/E/Lab/587/2576

SOM Lab

Ref:

906(Page-2/2)

Dated: 23-05-2019

Dated:

28-05-2019

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Deformed Bar (Kamran Steel)

Gauge Length:

8 inch

Sample Type:

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 <sup>2</sup>	in <sup>2</sup>	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	1.504	6	0.750	0.44	0.442	12.79	19.39	64130	63840	97180	96740	1.50	8.0	18.8	
2	1.496	6	0.748	0.44	0.440	13.05	19.39	65400	65400	97180	97180	1.40	8.0	17.5	
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**BEND TEST:**

# 6	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:-  Only Three Samples Received and Tested</b>

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)

Amjad Saeed  
Resident Engineer, NESPAK (Pvt) Ltd Ltd Lahore

Test Performed By: Dr. /Engr. M Rehan Ashraf

Client Reference: 3994/103/AS/02/101

SOM Lab

Ref: 909(Page-1/1)

Dated: 27-05-2019

Dated: 28-05-2019

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar ( Ittefaq Steel)

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 <sup>2</sup>	in <sup>2</sup>	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.603	8	0.987	0.79	0.765	29.15	34.66	81390	84050	96760	99920	1.20	8.0	15.0	
2	2.661	8	0.998	0.79	0.782	29.97	36.70	83670	84520	102450	103500	1.10	8.0	13.8	
3	1.539	6	0.759	0.44	0.452	18.25	21.81	91460	89030	109340	106440	1.00	8.0	12.5	
4	1.532	6	0.757	0.44	0.450	16.79	21.05	84160	82290	105510	103170	1.00	8.0	12.5	
5	0.662	4	0.498	0.20	0.195	7.44	10.30	82060	84160	113530	116440	0.90	8.0	11.3	
6	0.734	4	0.524	0.20	0.216	7.36	11.23	81160	75150	123870	114700	1.00	8.0	12.5	
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**BEND TEST:**

# 8	Sample bend through 180 degrees Satisfactorily without any crack	<b>Note:-  Only Twelve Samples Received and Tested</b>
# 8	Sample bend through 180 degrees Satisfactorily without any crack	
# 6	Sample bend through 180 degrees Satisfactorily without any crack	
# 6	Sample bend through 180 degrees Satisfactorily without any crack	
# 4(S. 5,6)	Sample bend through 180 degrees Satisfactorily without any crack	

Note: Please always confirm the results of above report on web [www.uet-civil.edu.pk](http://www.uet-civil.edu.pk)