

Test Performed by: S. Asad Ali Gillani

Saeed Ahmad, ARE

PCP Pkg-V MMP/AiD Consultants Khanewal

(Comprehensive Sewerage System in Khanewal City Under Punjab Cities Program)

Client Reference No.: PCP/KWL-151/2024

Dated: 05-08-2024

SOM Lab Ref: CED/SOM/4589 (Page 1/1)

Dated: 07-08-2024

Test Type: Tensile Test, Bend Test & Thickness Test

Specification: ASTM A-36

Sample Type: MS Angle Iron Steps

Gauge Length: 2 inches

Tensile Test & Bend Test Results

Sr. No.	Size of strip (mm)	X Section Area (mm ²)	Yield Load (kN)	Ultimate Load (kN)	Yield Stress (MPa)	Ultimate Tensile Stress (MPa)	Elongation (inch)	% Elongation
1 (L)	19.0 x 4.30	81.70	32.00	41.70	391.68	510.40	0.50	25.00
2 (L)	18.6 x 4.30	79.98	30.00	38.50	375.09	481.37	0.50	25.00
3 (S)	20.9 x 4.40	91.96	44.00	59.50	478.47	647.02	0.50	25.00
4 (S)	20.9 x 4.40	91.96	46.00	62.77	500.22	682.58	0.50	25.00
3	MS Angle (Mark: Long) strip sample, Bend through 180 degrees satisfactorily without any crack							
4	MS Angle (Mark: Short) strip sample, Bend through 180 degrees satisfactorily without any crack							

Thickness Test Results

Sr. No.	Sample Type	Thickness (mm)
1	MS Angle Iron Steps (Mark: Long)	4.3
2	MS Angle Iron Steps (Mark: Short)	4.4

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

Muhammad Azmat, RE

Test Performed By:

Dr. /Engr.

Nauman Khurram

NESPAK-Turkpak JV Lhr.(Reconstruction of Lady Willingdon Hospital,Lahore)

Client Reference: 4729/13/MA/04/76

SOM Lab

Ref:

4585 (Page-1/1)

Dated: 31-07-2024

Dated:

07-08-2024

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar (AF 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 ²	in ²	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	1.525	6	0.755	0.44	0.448	14.12	18.62	70770	69510	93350	91680	1.20	8.0	15.0	
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BEND TEST:

# 6	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Two Samples Received and Tested

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

Rashid Kamran, RE

Test Performed By: Dr. /Engr. Nauman Khurram

NESPAK Lhr.(Impro Of Infrastructure in Mihlanwal Housing Scheme Lahore,Pkg-3)

Client Reference: 2599/13/RK/05/MWL/P-3/209

SOM Lab

Ref: 4586 (Page-1/1)

Dated: 22-07-2024

Dated: 07-08-2024

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar (FF 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 ²	in ²	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.628	8	0.991	0.79	0.772	26.37	35.47	73620	75340	99030	101340	1.40	8.0	17.5	
2	2.619	8	0.990	0.79	0.770	26.22	35.27	73200	75100	98470	101020	1.30	8.0	16.3	
3	1.479	6	0.744	0.44	0.435	13.48	19.42	67550	68330	97340	98460	1.30	8.0	16.3	
4	1.484	6	0.745	0.44	0.436	13.76	19.67	68980	69610	98610	99520	1.30	8.0	16.3	
5	1.021	5	0.618	0.31	0.300	9.35	13.25	66500	68720	94280	97420	1.30	8.0	16.3	
6	1.017	5	0.617	0.31	0.299	9.33	13.27	66360	68800	94420	97900	1.20	8.0	15.0	
7	0.659	4	0.497	0.20	0.194	6.47	8.87	71380	73590	97800	100820	1.20	8.0	15.0	
8	0.660	4	0.497	0.20	0.194	6.52	8.92	71940	74170	98360	101400	1.20	8.0	15.0	
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BEND TEST:

# 8	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Twelve Samples Received and Tested
# 6	Sample bend through 180 degrees Satisfactorily without any crack	
# 5	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

Asif Ali, Snr Engineer

Test Performed By:

Dr. /Engr.

Nauman Khurram

University Of Okara.(Construction Of Central , Mosque at University Of Okara)

Client Reference: UO/Engg.Dept/2024/2298

SOM Lab

Ref:

4587(Page-1/1)

Dated: 06-07-2024

Dated:

07-08-2024

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar (Mughal 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 ²	in ²	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.640	8	0.994	0.79	0.776	25.48	33.69	71150	72430	94050	95750	1.40	8.0	17.5	
2	1.489	6	0.747	0.44	0.438	15.82	20.08	79300	79660	100660	101120	1.20	8.0	15.0	
3	0.670	4	0.501	0.20	0.197	5.45	8.36	60140	61060	92180	93580	1.10	8.0	13.8	
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BEND TEST:

# 8	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Six Samples Received and Tested
# 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

Engr.M. Saleem Zafar
 Snr RE NESPAK PICIIP (WWTP Sialkot , ICB-Works/PICIIP-12)

Test Performed By: Dr. /Engr. Nauman Khurram

Client Reference: NESPAK/MSZ/UET/WWTP/043

SOM Lab

Ref: 4588 (Page-1/1)

Dated: 06-08-2024

Dated: 07-08-2024

Test: Tension Test & Bend Test

Test Specification: ASTM-A-615

ASTM-A-615

Gauge Length: 8 inch

Sample Type: Deformed Bar

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	1.054	5	0.628	0.31	0.310	9.30	13.15	66140	66140	93550	93550	1.30	8.0	16.3	
2	1.055	5	0.628	0.31	0.310	9.40	13.32	66870	66870	94790	94790	1.30	8.0	16.3	
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BEND TEST:

# 5	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Three Samples Received and Tested

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

Muhammad Sajjad

Test Performed By: Dr. /Engr. Nauman Khurram

Project Incharge, Construction Of Tayba Developers Plaza No 15-A3 Kasuri Road Gulberg Lahore.

Client Reference: Nil

SOM Lab

Ref: 4590 (Page-1/1)

Dated: 07-08-2024

Dated: 07-08-2024

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	2.598	8	0.986	0.79	0.763	24.74	33.20	69070	71510	92690	95970	1.50	8.0	18.8	
2	2.602	8	0.987	0.79	0.765	23.70	32.82	66170	68330	91640	94630	1.40	8.0	17.5	
3	1.645	6	0.784	0.44	0.483	14.80	21.48	74190	67590	107660	98070	1.60	8.0	20.0	
4	1.640	6	0.783	0.44	0.482	14.78	21.56	74090	67630	108070	98650	1.60	8.0	20.0	
5	0.594	4	0.472	0.20	0.175	5.07	7.14	55870	63850	78690	89930	1.50	8.0	18.8	
6	0.591	4	0.471	0.20	0.174	5.05	7.10	55650	63960	78350	90060	1.50	8.0	18.8	
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BEND TEST:

# 8	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Nine Samples Received and Tested
# 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

Muhammad Siddique
Head QA/AC AL-A`ZAMIYYA BLOCK PHASE I Lahore.

Test Performed By: Dr. /Engr. Nauman Khurram

Client Reference: Alz./ST/008

Dated: 07-08-2024

Test: Tension Test & Bend Test

Gauge Length: 8 inch

Test Specification:

Sample Type:

SOM Lab

Ref: 4591 (Page-1/1)

Dated: 07-08-2024

ASTM-A-615

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	2.588	8	0.984	0.79	0.761	24.38	32.13	68070	70670	89700	93120	1.60	8.0	20.0	
2	2.589	8	0.984	0.79	0.761	24.62	32.47	68730	71350	90640	94090	1.50	8.0	18.8	
3	1.486	6	0.746	0.44	0.437	13.66	18.40	68470	68940	92230	92860	1.40	8.0	17.5	
4	1.481	6	0.744	0.44	0.435	13.40	18.25	67190	67960	91460	92510	1.50	8.0	18.8	
5	0.586	4	0.468	0.20	0.172	5.47	7.24	60370	70190	79810	92800	1.40	8.0	17.5	
6	0.586	4	0.468	0.20	0.172	5.50	7.21	60700	70580	79470	92410	1.20	8.0	15.0	
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BEND TEST:

# 8	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Nine Samples Received and Tested
# 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

Engineer Muhammad Irfan
Dy Dir Infra. DHA Gujranwala.(Sector-D)

Test Performed By: Dr. /Engr. Nauman Khurram

Client Reference: 111/15/DD/RS/Lab/Sec-D/92

SOM Lab

Ref: 4592 (Page-1/1)

Dated: 05-08-2024

Dated: 07-08-2024

Test: Tension Test & Bend Test

Test Specification:

ASTM-A-615

Gauge Length: 8 inch

Sample Type:

Deformed Bar (SJ 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 ²	in ²	Tons	Tons	psi	psi	psi	psi	in	in	%	
1	2.681	8	1.002	0.79	0.788	25.50	32.52	71200	71380	90780	91010	1.20	8.0	15.0	
2	2.668	8	0.999	0.79	0.784	29.53	36.14	82440	83080	100880	101660	1.40	8.0	17.5	
3	0.672	4	0.501	0.20	0.197	5.83	8.58	64300	65280	94650	96090	1.30	8.0	16.3	
4	0.671	4	0.501	0.20	0.197	5.81	8.61	64080	65050	94990	96430	1.30	8.0	16.3	
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BEND TEST:

# 8	Sample bend through 180 degrees Satisfactorily without any crack	Note:- Only Six Samples Received and Tested
# 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