Ref: CED/TFL/10/7621 Dated: 08-10-2025

Dated of Test: 23-10-2025 (Dr. Ali Ahmed)

To

Mr. Azam Nafees (Construction Manager)
Etihad Town Premium Enclave Raiwind Road Lahore

Subject: **- TESTING OF MS GULLY GRATING COVER**

Reference to your letter no. Nil, Dated: 03/10/2025 on the above mentioned subject. Two MS Gully Grating Manhole Covers as received by us has been tested and results are given below.

Test Standard: Non-standard test performed as per requirement of the Client
Sample 1: Application of load at the center of the sample of the MS Gully Grating through thick plate of 5 Inch diameter.
Sample 2: Application of load at the center of the sample of the MS Gully Grating through thick plate of 9 Inch diameter.

Sr. No.	Description	Total Width	Effective Width	Total Length	Effective Length	Applied Load	Remarks
	MS Gully Grating Manhole Cover	(cm)	(cm)	(cm)	(cm)	(Tons)	
1	**Sample 1**	**39.1**	**34.4**	**37.4**	**34.8**	**15.0**	**No breakage & No Crack**
2	**Sample 2**	**69.5**	**66.0**	**63.5**	**60.2**	**15.0**	**No breakage & No Crack**
-	**-**	**-**		**-**		**-**	**-**
Only two samples for test							

Test Performed and Verified by:

Ref: CED/TFL/10/7661 Dated: 20-10-2025

Dated of Test: 23-10-2025 (Dr. Ali Ahmed)

To

Engr. Habib Ullah (Resident Engineer)
NESPAK (Pvt.) Ltd.
Construction of of Flyover at The Junction of GT Road & Islamabad Expressway Islamabad

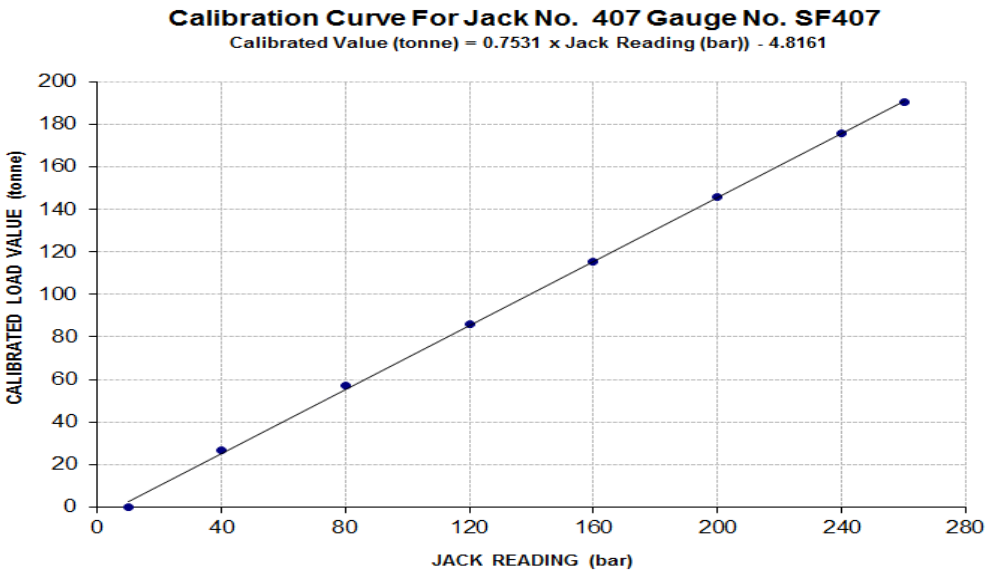
Subject: **- CALIBRATION OF HYDRAULIC JACK (MARK: TFL/010/7661)** (Page -1/2)

Reference to your Letter No. 4982/103/HU/031, dated: 17/10/2025 on the subject cited above. One Hydraulic Jack (Jack No. 407, Gauge No. SF-407) as received by us has been calibrated. The results are tabulated as under:

Total Range : Zero - 1000 (bar)
Calibrated Range : Zero - 260 (bar)

Hydraulic Jack Reading (bar)		**10**	**40**	**80**	**120**	**160**	**200**	**240**	**260**
Calibrated Load	**(kg)**	**0**	**26800**	**57200**	**86000**	**115400**	**145800**	**175800**	**190400**
	(tonne)	**0**	**26.80**	**57.20**	**86.00**	**115.40**	**145.80**	**175.80**	**190.40**
Calibrated Pressure (bar)		**0**	**35.79**	**76.39**	**114.85**	**154.11**	**194.71**	**234.78**	**254.27**

The Ram Area of Jack = 734.35 cm^2



Test Performed and Verified by:

Ref: CED/TFL/10/7661 Dated: 20-10-2025

Dated of Test: 23-10-2025 (Dr. Ali Ahmed)

To

Engr. Habib Ullah (Resident Engineer)
NESPAK (Pvt.) Ltd.
Construction of of Flyover at The Junction of GT Road & Islamabad Expressway Islamabad

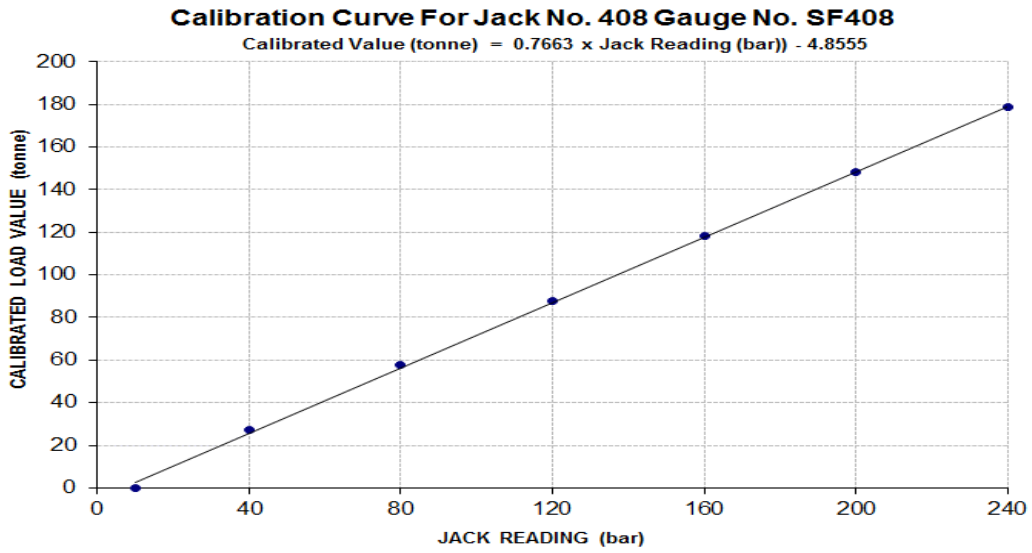
Subject: **- CALIBRATION OF HYDRAULIC JACK (MARK: TFL/010/7661)** (Page -2/2)

Reference to your Letter No. 4982/103/HU/031, dated: 17/10/2025 on the subject cited above. One Hydraulic Jack (Jack No. 408, Gauge No. SF-408) as received by us has been calibrated. The results are tabulated as under:

Total Range : Zero - 1000 (bar)
Calibrated Range : Zero - 260 (bar)

Hydraulic Jack Reading (bar)		**10**	**40**	**80**	**120**	**160**	**200**	**240**	**260**
Calibrated Load	**(kg)**	**0**	**27400**	**57800**	**87800**	**118200**	**148000**	**178600**	**194000**
	(tonne)	**0**	**27.40**	**57.80**	**87.80**	**118.20**	**148.00**	**178.60**	**194.00**
Calibrated Pressure (bar)		**0**	**36.59**	**77.19**	**117.25**	**157.85**	**197.65**	**238.51**	**259.08**

The Ram Area of Jack = 734.35 cm^2



Test Performed and Verified by:

To,

Mr. Abdul Basset (Material Engineer)
Banu Mukhtar Contracting (Pvt.) Ltd.
Burj-1 by Ajwa Builders

Reference # CED/TFL **7673** (Dr. Ali Ahmad) Dated: 21-10-2025
Reference of the request letter # DOC-BMC/AJWA/164 Dated: 21-10-2025

Tension Test Report

Date of Test 23-10-2025
Gauge Length 8 inches
Description Deformed Steel Bar Tensile and Bend Test as per ASTM-A615

Sr. No.	Actual Weight Per Unit Length (lb/ft)	Nominal Size (#)	Actual Diameter (inch)	Area (in^2)		Yield Load	Breaking Load	Yield Stress (psi)		Ultimate Stress (psi)		Elongation	% Elongation	Remarks
				Nominal	Actual	(kg)	(kg)	Nominal	Actual	Nominal	Actual	(inch)		
1	**0.381**	**3**	**0.377**	**0.110**	**0.1119**	**3600**	**4900**	**72131**	**70895**	**98178**	**96496**	**1.4**	**17.5**	-
2	**0.377**	**3**	**0.376**	**0.110**	**0.1108**	**3600**	**4900**	**72131**	**71605**	**98178**	**97462**	**1.5**	**18.8**	-
3	**0.378**	**3**	**0.376**	**0.110**	**0.1109**	**3600**	**4900**	**72131**	**71513**	**98178**	**97338**	**1.3**	**16.3**	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Note: Only 3 Samples for Tensile and 1 Samples for Bend test

Bend Test
3 Bar Bend Test Through 180 Degree is Satisfactory

Test Performed and Verified by:

To,

M R Builders
Construction of Allied Bank Ltd, Paragon City, Lahore Cantt. (Br. Code 1021)
(Mughal Steel)

Reference # CED/TFL **7674** (Dr. Ali Ahmad) Dated: 21-10-2025
Reference of the request letter # Nil Dated: 21-10-2025

Tension Test Report

Date of Test 23-10-2025
Gauge Length 8 inches
Description Deformed Steel Bar Tensile and Bend Test as per ASTM-A615

Sr. No.	Actual Weight Per Unit Length (lb/ft)	Nominal Size (#)	Actual Diameter (inch)	Area (in^2)		Yield Load	Breaking Load	Yield Stress (psi)		Ultimate Stress (psi)		Elongation	% Elongation	Remarks
				Nominal	Actual	(kg)	(kg)	Nominal	Actual	Nominal	Actual	(inch)		
1	0.369	3	0.371	0.110	0.1083	3800	4600	76138	77343	92167	93626	1.3	16.3	-
2	0.367	3	0.370	0.110	0.1077	3600	4600	72131	73667	92167	94131	1.4	17.5	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Note: Only 2 Samples for Tensile and 1 Samples for Bend test

Bend Test
3 Bar Bend Test Through 180 Degree is Satisfactory

Test Performed and Verified by:

To,

Mr. Liu Zhe (Senior Commercial Manager)
China Machinery Engineering Corporation
Extension of Water Resources Project for Faisalabad City, Phase-II
(FF Steel)

Reference # CED/TFL **7679** (Dr. Ali Ahmad) Dated: 22-10-2025
Reference of the request letter # CMEC/LAB/25/0053 Dated: 22-10-2025

Tension Test Report

Date of Test 23-10-2025
Gauge Length 8 inches
Description Deformed Steel Bar Tensile and Bend Test as per ASTM-A615

Sr. No.	Actual Weight Per Unit Length (lb/ft)	Nominal Size (mm)	Actual Diameter (inch)	Area (in^2)		Yield Load	Breaking Load	Yield Stress (psi)		Ultimate Stress (psi)		Elongation	% Elongation	Remarks
				Nominal	Actual	(kg)	(kg)	Nominal	Actual	Nominal	Actual	(inch)		
1	**0.398**	**10**	**0.386**	**0.120**	**0.117**	**4000**	**5400**	**73467**	**75370**	**99180**	**101749**	**1.2**	**15.0**	-
2	**0.403**	**10**	**0.388**	**0.120**	**0.1184**	**4000**	**5400**	**73467**	**74439**	**99180**	**100493**	**1.3**	**16.3**	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Note: Only 2 Samples for Tensile and 1 Samples for Bend test

Bend Test
10mm Bar Bend Test Through 180 Degree is Satisfactory

Test Performed and Verified by:

To,

Engr. M. Bilawal Mehmood (Resident Engineer ECSP)
Engineering Consultancy Services Punjab (Pvt.) Ltd.
Development of Model Cattle Market, Jhang

Reference # CED/TFL **7680** (Dr. Ali Ahmed) Dated: 22-10-2025
Reference of the request letter # ECSP/CMJ/RE/87 Dated: 10-04-2025

Tension Test Report (Page – 1/1)

Date of Test 23-10-2025
Description Bracing Wire Tensile Test

Sr. No.	Nominal Diameter	Weight	Length	Measured weight	Breaking Load	Remarks / Coil No.
	(mm)	(mm)	(cm)	(kg/m)	(kg)	
1	**12**	**536**	**99.5**	**0.54**	**6700**	**-**
-	-	-	-	-	-	-
-	-	-	-	-	-	-
-	-	-	-	-	-	-
-	-	-	-	-	-	-
Only one sample for Test						
-	-	-	-	-	-	-

Test Performed and Verified by:

To,

Mr. Farooq Memon (General Manager Engineering)
SUFI City
Construction of Afsheen & Negin Commercial Plaza (4+4 Nos) at Sufi City Hosing Society, Mandi Bahauddin

Reference # CED/TFL **7681** (Dr. Ali Ahmad) Dated: 23-10-2025
Reference of the request letter # SUFI/20251022/AFSHEEN-BLD/02 Dated: 22-10-2025

Tension Test Report

Date of Test 23-10-2025
Gauge Length 8 inches
Description Deformed Steel Bar Tensile and Bend Test as per ASTM-A615

Sr. No.	Actual Weight Per Unit Length (lb/ft)	Nominal Size (#)	Actual Diameter (inch)	Area (in^2)		Yield Load	Breaking Load	Yield Stress (psi)		Ultimate Stress (psi)		Elongation	% Elongation	Remarks
				Nominal	Actual	(kg)	(kg)	Nominal	Actual	Nominal	Actual	(inch)		
1	**0.375**	**3**	**0.374**	**0.110**	**0.1101**	**3500**	**4900**	**70127**	**70043**	**98178**	**98061**	**1.7**	**21.3**	-
2	**0.375**	**3**	**0.374**	**0.110**	**0.1101**	**3400**	**4900**	**68124**	**68089**	**98178**	**98128**	**1.7**	**21.3**	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Note: Only 2 Samples for Tensile and 1 Samples for Bend test

Bend Test
3 Bar Bend Test Through 180 Degree is Satisfactory

Test Performed and Verified by:

Ref: CED/TFL/10/7621 Dated: 08-10-2025

Dated of Test: 23-10-2025 (Dr. Ali Ahmed)

To

Mr. Azam Nafees (Construction Manager)
Etihad Town Premium Enclave Raiwind Road Lahore

Subject: **- TESTING OF MS GULLY GRATING COVER**

Reference to your letter no. Nil, Dated: 03/10/2025 on the above mentioned subject. Two MS Gully Grating Manhole Covers as received by us has been tested and results are given below.

Sample No. 1 (PTCL (Mark-1)

Width of Sample = 39.1 cm

Length of Sample = 37.4 cm

Proof Load = 18000 Kg

Breaking Load = 19000 Kg

Sample No. 2 (BLT (Mark-13)

Dia of Sample = 81.20 cm

Thickness of Sample = 16.70 cm

Breaking Load = 20400 Kg