

### STRUCTURAL ENGINEERING DIVISION

# Test Floor Laboratory Department of Civil Engineering University of Engineering and Technology Lahore, 54890 Pakistan. Ph: 92-42-99029202

Ref: <u>CED/TFL/05/33218</u> Dated: <u>13-05-19</u>

To M/S Hiscon Engineers Muridkey-Sheikhupura Road, District Sheikhupura

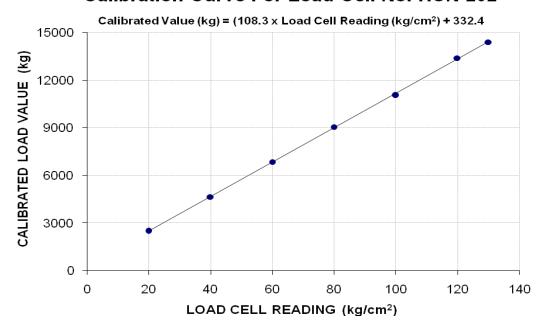
Subject: - CALIBRATION OF LOAD CELL (MARK: TFL/05/33218) (Page – 1/2)

Reference to your Letter No. Nil, Dated: 13/05/2019 on the subject cited above. One Load Cell (No. HCN-202) as received by us has been calibrated. The results are tabulated as under:

Total Range : Zero - 160 (kg/cm²) Calibrated Range : Zero - 130 (kg/cm²)

| Load Cell Reading<br>(kg/cm²) | 20   | 40   | 60   | 80   | 100   | 120   | 130   |
|-------------------------------|------|------|------|------|-------|-------|-------|
| Calibrated Load (kg)          | 2500 | 4650 | 6850 | 9050 | 11050 | 13400 | 14400 |

### Calibration Curve For Load Cell No. HCN-202



I/C Testing Laboratoires UET Lahore, Pakistan.

- 1- You can See your reports On Internet in the following web site http://www.uet.edu.pk/faculties/facultiesinfo/civil/index.html?RID=testing\_reports
- 2. The above results pertain to sample /samples supplied to this laboratory.
- 3- Sealed sample / Unsealed sample / Marked sample/Signed Samples

# STRUCTURAL ENGINEERING DIVISION



# Test Floor Laboratory Department of Civil Engineering University of Engineering and Technology Lahore, 54890 Pakistan. Ph: 92-42-99029202

Ref: <u>CED/TFL/05/33218</u> Dated: <u>13-05-19</u>

To M/S Hiscon Engineers Muridkey-Sheikhupura Road, District Sheikhupura

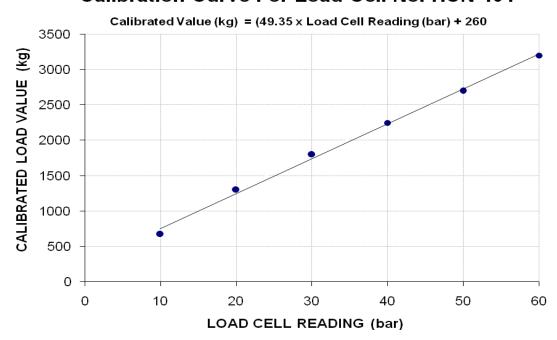
Subject: - CALIBRATION OF LOAD CELL (MARK: TFL/05/33218) (Page – 2/2)

Reference to your Letter No. Nil, Dated: 13/05/2019 on the subject cited above. One Load Cell (No. HCN-404) as received by us has been calibrated. The results are tabulated as under:

Total Range : Zero - 80 (bar) Calibrated Range : Zero - 60 (bar)

| Load Cell Reading<br>(Psi) | 10  | 20   | 30   | 40   | 50   | 60   |  |
|----------------------------|-----|------|------|------|------|------|--|
| Calibrated Load (kg)       | 675 | 1300 | 1800 | 2250 | 2700 | 3200 |  |

## Calibration Curve For Load Cell No. HCN-404



I/C Testing Laboratoires UET Lahore, Pakistan.

- 1- You can See your reports On Internet in the following web site http://www.uet.edu.pk/faculties/facultiesinfo/civil/index.html?RID=testing\_reports
- 2. The above results pertain to sample /samples supplied to this laboratory.
- 3- Sealed sample / Unsealed sample / Marked sample/Signed Samples

# AHOVE

# STRUCTURAL ENGINEERING DIVISION

# Test Floor Laboratory Department of Civil Engineering University of Engineering and Technology Lahore, 54890 Pakistan. Ph: 92-42-99029202

To,
Resident Engineer
Allied Engineering Consultants (Pvt) Ltd
Construction Supervision Services of Multi-Storied Dr. A.Q Khan Hospital
(SJ Steel)

Reference # CED/TFL **33230** (Dr. M Rizwan Riaz) Dated: 14-05-2019 Reference of the request letter # AEC/LHR-1/2019/578 Dated: 13-05-2019

**Tension Test Report** (Page -1/1)

Date of Test 14-05-2019 Gauge length 8 inches

Description Deformed Steel Bar Tensile Test as per ASTM-A615

| Sr. No.                                   | Weight   | Diameter/<br>Size |               | Area<br>(in²) |        | Yield load | Breaking<br>Load | Yield Stress<br>(psi) |        | Ultimate Stress<br>(psi) |        | Elongation | % Elongation | Remarks |
|---|----------|-------------------|---------------|---------------|--------|------------|------------------|-----------------------|--------|--------------------------|--------|------------|--------------|---------|
|   | (lbs/ft) | Nominal<br>(#)    | Actual (inch) | Nominal       | Actual | (kg)       | (kg)             | Nominal               | Actual | Nominal                  | Actual | (inch)     | % E          | Re      |
| 1   | 0.401    | 3                 | 0.388         | 0.11          | 0.118  | 3000       | 5300             | 60200                 | 56060  | 106200                   | 99100  | 1.30       | 16.3         |         |
| 2   | 0.374    | 3                 | 0.374         | 0.11          | 0.110  | 3200       | 5000             | 64200                 | 64210  | 100200                   | 100400 | 0.90       | 11.3         |         |
| 3   | 0.404    | 3                 | 0.389         | 0.11          | 0.119  | 3300       | 5300             | 66200                 | 61230  | 106200                   | 98400  | 1.10       | 13.8         |         |
| -   | -        | -                 | -             | -             | -      | -          | -                | -                     | -      | -                        | -      | -          | -            |         |
| -   | -        | -                 | -             | -             | -      | -          | -                | -                     | -      | -                        | -      | -          | -            |         |
| -   | -        | -                 | -             | -             | -      | -          | -                | -                     | -      | -                        | -      | -          | -            |         |
| Note: only three samples for tensile test |          |                   |               |               |        |            |                  |                       |        |                          | 1      |            |              |         |
| Bend Test                                 |          |                   |               |               |        |            |                  |                       |        |                          |        |            |              |         |
|   |          |                   |               |               |        |            |                  |                       |        |                          |        |            |              |         |

I/C Testing Laboratoires UET Lahore, Pakistan.

- 1- You can See your reports On Internet in the following web site http://www.uet.edu.pk/faculties/facultiesinfo/civil/index.html?RID=testing\_reports
- 2. The above results pertain to sample /samples supplied to this laboratory.
- 3- Sealed sample / Unsealed sample / Marked sample/Signed Samples

# STRUCTURAL ENGINEERING DIVISION



Test Floor Laboratory
Department of Civil Engineering
University of Engineering and Technology Lahore, 54890
Pakistan. Ph: 92-42-99029202

Witenss by Engr. Rameez Khalid (Engineer A.Q Khan Trust)

I/C Testing Laboratoires UET Lahore, Pakistan.

- 1- You can See your reports On Internet in the following web site http://www.uet.edu.pk/faculties/facultiesinfo/civil/index.html?RID=testing\_reports
- 2. The above results pertain to sample /samples supplied to this laboratory.
- 3- Sealed sample / Unsealed sample / Marked sample/Signed Samples