



# S. B. STEELS COMPANY



GOVT. REGISTERED (190162108503) & BIS APPROVED /  
 ISO (9001) APPROVED METALLURGICAL TESTING LABORATORY  
 LABORATORY : 366/6 & 366/1, G. T. ROAD, BALLY, HOWRAH - 711 201 (W.B.)  
 H. O. : 36, STRAND ROAD, 4TH FLOOR, ROOM NO. 16, KOLKATA-700001

SBS-F-9

CERTIFICATE No.  
 TC-5979  
 NABL ACCREDITED  
 LABORATORY  
 ISO/IEC 17025:2017

Rev. No.-01 dt. 03.02.2020  
 Ph. Lab. : 2654-1858  
 Fax Lab. : (033) 2654-2145  
 Ph. H.O. : 2243-2017/1903  
 Fax H.O. : (033) 2243-1205

## Test Report

Page 01 of 01

L. No. : **1520**

SAMPLE RECD. ON 04.12.2020  
 ORDER REF. NO TASPL/Chhawani-Chhaphia/NH-227A/2020/108 dt. 14.10.2020.  
 ULR NO. TC597920000004393

TESTED ON. 04-07-12.2020  
 T.C.NO. SBSP04393  
 DATE 07.12.2020.  
 STAMPED Nil.

SAMPLE DESCRIPTION 04 Nos. different dia of TMT Bar.  
 SPECIFICATION IS: 1786/2008, Gr. Fe- 500D, Amndt. No. 4, July'2019.  
 ISSUED TO M/s. Team Leader (Authority Engineer) Technocrats Advisory Services Pvt. Ltd., C/o Rana Bipin Pratap Singh, Jai Shakti Nagar Colony, Civil Line/Police Line Road, Near Central Academic School, Basti, Post- Gandhi Nagar, Distt.- Basti, Pin Code- 272001.

\* This is to certify that the above Sample(s) has/have been tested with the following results \*  
 Subject – Consultancy services of authority's Engineer for supervision of Improvement and Up-gradation of existing carriageway to two lane with paved shoulder from KM.0.00 (Chhawani) to KM.55.000 (Near Chhaphia village) of NH-227A on EPC mode in the state of Uttar Pradesh.

- Ref. No. – 1. EPC Contractor office letter no.- VCIPL-GSPL(JV)/RAMJANKI/33/2020, Date- 19/02/2020  
 2. Our office letter no. TASPL/Chhawani-Chhaphia/NH-227A/2020/048, Date- 27/02/2020  
 3. EPC Contractor office letter no.- VCIPL-GSPL(JV)/RAMLANKI/120/2020, Date- 14/10/2020.

### MECHANICAL TEST

Description & Lot No.	Wt/m (Kg/m)	T.S. (N/mm <sup>2</sup> )	Y.S. (N/mm <sup>2</sup> )	T.S./Y.S Ratio	%Elg. on 5.65√S <sub>0</sub>	Bend Test 180°, 3Ø	Rebend Test 135°, 157.5°, 4Ø
08mm. A/28/20/08	0.378	717	621	1.15	21.08	Satisfactory	4Ø Satisfactory
Reqnt.	0.395±7%	565 Min.	500 Min.	≥1.10	16.00 Min.	Shall pass the test.	Shall pass the test.
10mm. A/25/20/10	0.583	706	610	1.16	21.27	Satisfactory.	4Ø Satisfactory
Reqnt.	0.617±7%	565 Min.	500 Min.	≥1.10	16.00 Min.	Shall pass the test.	Shall pass the test.
12mm. A/30/20/12	0.863	699	599	1.17	19.05	Satisfactory.	6Ø Satisfactory
Reqnt.	0.888±5%	565 Min.	500 Min.	≥1.10	16.00 Min.	Shall pass the test.	Shall pass the test.
16mm. A/16/20/16	1.550	674	557	1.21	19.95	Satisfactory.	6Ø Satisfactory
Reqnt.	1.58±5%	565 Min.	500 Min.	≥1.10	16.00 Min.	Shall pass the test.	Shall pass the test.

Remarks : The above test results obtained conform to specified value.

dc

**ORIGINAL**

- TEST WITNESS BY :  
 \* ENVIRONMENTAL CONDITION :  
 \* ESTIMATED UNCERTAINTY (IF APPLICABLE) :  
 \* SAMPLE NOT DRAWN BY US  
 \* SPECIFICATION USED FOR TEST IS: 1608(Pt.1)2018, IS:1599/2019, IS:1786/2008.  
 \* TEST CERTIFICATE RELATES TO THE SAMPLE ONLY  
 \* SAMPLE WILL BE CEASED IF NOT TAKEN BACK WITHIN 15 DAYS



For S. B. STEELS COMPANY

SANTOSH PAL  
 Technical Manager  
 (Authorized Signatory)

TESTING FACILITIES APPROVED BY—LOVDS, PDIL, IRS, TRF, BHEL, NPB, EIA, DEFENCE, ABB (ABL LTD.) CESC, BV, VSP, FCI, DNV, PCGIL, CLW, FWD, CPT, DGS. & D. PIEN, BALCO, RDSO, N.T.P.C., WSEB, DSP, GEC, RITES, L & T, TATA EXPORT & OTHER INSPECTION AUTHORITIES.

THE STATEMENT OF THE REPORT SHALL NOT BE REPRODUCED IN FULL/PART WITHOUT THE PRIOR WRITTEN CONSENT OF THE ISSUING AUTHORITY.  
 QUALITY CONTROL & INSPECTION / SERVICE TO THE NATION



**NABL ACCREDITED  
LABORATORY**  
ISO/IEC 17025:2005  
CERTIFICATE No.  
TC-5979

# S. B. STEELS COMPANY

**NABL/ACCREDITED, GOVT. REGISTERED (190162108303) &  
BIS APPROVED / ISO (9001) APPROVED METALLURGICAL TESTING LABORATORY**  
LABORATORY : 366/6 & 366/1, G. T. ROAD, BALLY, HOWRAH - 711 201 (W.B.)  
H. O. : 36, STRAND ROAD, 4TH FLOOR, ROOM NO. 16, KOLKATA-70001



**SBS-F-9**

Ph. Lab. : 2654-1858  
Fax Lab. : (033) 2654-2145  
Ph. H.O. : 2243-2017/1903  
Fax H.O. : (033) 2243-1205  
L. No. :

## Test Report

Page 01 of 01

SAMPLE RECD. ON 31.10.2019  
ORDER REF. NO. SSPL/19-20/CPWD/001027 Dt.: 31.10.2019.  
ULR-TC.597919000002738P  
SAMPLE DESCRIPTION 16 mm SEL TMT Bar  
SPECIFICATION IS : 1786/2008, Gr. Fe-500D, Amndt. 4, July 2019  
ISSUED TO M/s. Shyam Sel & Power Limited, 5, C. R. Avenue, Kolkata - 72

TESTED ON 31.10-05.11.2019  
T.C. NO. SBSCP02738  
DATE 05.11.2019  
STAMPED Nil.

This is to certify that the above Sample(s) has/have been tested with the following results

### CHEMICAL ANALYSIS BY SPECTRO & MECHANICAL TEST

Elements%	Findings	Requirement
C	0.1978	0.25 Max
Mn	0.6771	X
Si	0.2500	X
S	0.0096	0.040 Max
P	0.0325	0.040 Max
S+P%	0.0421	0.075 Max
Cr	0.0135	X
Ni	* <0.0100	X
Mo	* <0.0080	X
Al	* <0.0100	X
Cu	* <0.0080	X
Ti	* <0.0080	X
V	* <0.0050	X
Nb	* <0.0100	X
N	0.0075	X
B	* 0.0018	X
CE	0.3174	0.50 Max
Wt./m (Kg/m)	1.539	1.58±5%
T.S. (N/mm <sup>2</sup> )	676	565 Min.
Y.S. (N/mm <sup>2</sup> )	574	500 Min.
T.S./Y.S Ratio	1.18	≥1.10
%E. on 5.65√ so	20.35	16.0 Min.
Total Elongation% at max. force	9.12	5% Min.
Bend Test (180°, 3Ø)	Satisfactory	Shall pass the test
Rebend Test (135°, 157.5°, 6Ø)	Satisfactory	
AR Value	2.44	2.40 Min.

Remarks : The above test result obtained conforms to the specified value

**COPY**

PB

\*\*\*\*\*

TEST WITNESS BY :

\* ENVIRONMENTAL CONDITION :

\* ESTIMATED UNCERTAINTY (IF APPLICABLE) :

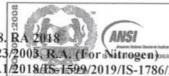
\* SAMPLE NOT DRAWN BY US

\* NON-ACCREDITED BY NABL

\* SPECIFICATION USED FOR TEST

\* TEST CERTIFICATE RELATES TO THE SAMPLE ONLY

\* SAMPLE WILL BE CEASED IF NOT TAKEN BACK WITHIN 15 DAYS



For S. B. STEELS COMPANY

**Tirthankar Som**  
Quality Manager  
(Authorised Signatory)

TESTING FACILITIES APPROVED BY—LOYDS, PDIL, IRS, TRF, BHEL, NPB, EIA, DEFENCE, ABB (ABL LTD.) CESC, BV, SVP, FCI, DNV, PGCIL, CLW, PWD, CPT, DGS. & D. PIEN, BALCO, RDSO, N.T.P.C, WBSEB, DSP, GEC, RITES, L & T, TATA EXPORT & OTHER INSPECTION AUTHORITIES.

THE STATEMENT OF THE REPORT SHALL NOT BE REPRODUCED IN FULL/PART WITHOUT THE PRIOR WRITTEN CONSENT OF THE ISSUING AUTHORITY.  
QUALITY CONTROL & INSPECTION / SERVICE TO THE NATION

E-mail : sbsteelsco@gmail.com/sbspkm09@yahoo.in Website : http://sbsteelsmtlab.com

Collection Centre - 14/3, Makardah Road, Kadamtala - Howrah - 711701. Ph: 7278964664



NABL ACCREDITED  
LABORATORY  
ISO/IEC 17025:2005  
CERTIFICATE No.  
TC-5979

# S. B. STEELS COMPANY

NABL/ACCREDITED, GOVT. REGISTERED (190162108303) &  
BIS APPROVED / ISO (9001) APPROVED METALLURGICAL TESTING LABORATORY  
LABORATORY : 366/6 & 366/1, G. T. ROAD, BALLY, HOWRAH - 711 201 (W.B.)  
H. O. : 36, STRAND ROAD, 4TH FLOOR, ROOM NO. 16, KOLKATA-700001



SBS-F-9

Ph. Lab. : 2654-1858  
Fax Lab. : (033) 2654-2145  
Ph. H.O. : 2243-2017/1903  
Fax H.O. : (033) 2243-1205

## Test Report

Page 01 of 01

SAMPLE RECD. ON 31.10.2019  
ORDER REF. NO.SSPL/19-20/CPWD/001027 Dt.: 31.10.2019..  
ULR-TC 597919000002738P  
SAMPLE DESCRIPTION 20 mm SEL TMT Bar  
SPECIFICATION IS : 1786/2008, Gr. Fe-500D, Amndt. 4, July 2019  
ISSUED TO M/s. Shyam Sel & Power Limited, S. C. R. Avenue, Kolkata - 72

TESTED ON 31.10-05.11.2019  
T.C. NO. SBSCP02738/1  
DATE 05.11.2019  
STAMPED Nil.

This is to certify that the above Sample(s) has/have been tested with the following results

### CHEMICAL ANALYSIS BY SPECTRO & MECHANICAL TEST

Elements%	Findings	Requirement
C	0.1824	0.25 Max
Mn	0.9236	X
Si	0.2264	X
S	0.0311	0.040 Max
P	0.0265	0.040 Max
S+P%	0.0576	0.075 Max
Cr	0.0106	X
Ni	* <0.0100	X
Mo	* <0.0080	X
Al	* <0.0100	X
Cu	* <0.0080	X
Ti	* <0.0080	X
V	* <0.0050	X
Nb	* <0.0100	X
N	0.0063	X
B	* 0.0014	X
CE	0.3416	0.50 Max
Wt/m (Kg/m)	2.460	2.47±3%
T.S. (N/mm <sup>2</sup> )	629	565 Min.
Y.S. (N/mm <sup>2</sup> )	536	500 Min.
T.S/Y.S Ratio	1.17	≥1.10
%E. on 5.65√ so	23.08	16.0 Min.
Total Elongation% at max. force	8.83	5% Min.
Bend Test (180°, 3Ø)	Satisfactory	
Rebend Test (135°, 157.5°, 6Ø)	Satisfactory	Shall pass the test
AR Value	3.57	3.40 Min.

Remarks : The above test result obtained conforms to the specified value

**COPY**

PB

\*\*\*\*\*

TEST WITNESS BY :

\* ENVIRONMENTAL CONDITION :

\* ESTIMATED UNCERTAINTY (IF APPLICABLE) :

\* SAMPLE NOT DRAWN BY US

\* NON-ACCREDITED BY NABL

\* SPECIFICATION USED FOR TEST

\* TEST CERTIFICATE RELATES TO THE SAMPLE ONLY

\* SAMPLE WILL BE CEASED IF NOT TAKEN BACK WITHIN 15 DAYS



For S. B. STEELS COMPANY

Tirthankar Saha  
Quality Manager  
(Authorised Signatory)

TESTING FACILITIES APPROVED BY—LOYDS, PDIL, IRS, TRF, BHEL, NPB, EIA, DEFENCE, ABB (ABL LTD.), CESC, BV, VSP, FCI, DNV, PGCIL, CLW, PWD, CPT, DGS. & D, PIEN, BALCO, RDSO, N.T.P.C, WBSEB, DSP, GEC, RITES, L & T, TATA EXPORT & OTHER INSPECTION AUTHORITIES.

THE STATEMENT OF THE REPORT SHALL NOT BE REPRODUCED IN FULL/PART WITHOUT THE PRIOR WRITTEN CONSENT OF THE ISSUING AUTHORITY.  
QUALITY CONTROL & INSPECTION / SERVICE TO THE NATION

E-mail : sbsteelsco@gmail.com/sbspkm09@yahoo.in Website : http://sbsteelsmtlab.com

Collection Centre - 14/3, Makardah Road, Kadamtala - Howrah - 711701. Ph: 7278964664





NABL ACCREDITED  
LABORATORY  
ISO/IEC 17025:2005  
CERTIFICATE No.  
TC-5979

# S. B. STEELS COMPANY

NABL/ACCREDITED, GOVT. REGISTERED (190162108303) &  
BIS APPROVED / ISO (9001) APPROVED METALLURGICAL TESTING LABORATORY  
LABORATORY : 366/6 & 366/1, G. T. ROAD, BALLY, HOWRAH - 711 201 (W.B.)  
H. O. : 36, STRAND ROAD, 4TH FLOOR, ROOM NO. 16, KOLKATA-700001



SBS-F-9

Ph. Lab. : 2654-1858  
Fax Lab. : (033) 2654-2145  
Ph. H.O. : 2243-2017/1903  
Fax H.O. : (033) 2243-1205

## Test Report

Page 01 of 01

SAMPLE RECD. ON 31.10.2019  
ORDER REF. NO.SSPL/19-20/CPWD/001027 Dt.: 31.10.2019..  
ULR-TC 597919000002738P  
SAMPLE DESCRIPTION 25 mm SEL TMT Bar  
SPECIFICATION IS : 1786/2008, Gr. Fe-500D, Amndt. 4, July 2019  
ISSUED TO M/s. Shyam Sel & Power Limited, S, C. R. Avenue, Kolkata - 72

TESTED ON 31.10-05.11.2019  
T.C. NO. SBSCP02738/2  
DATE 05.11.2019  
STAMPED Nil.

This is to certify that the above Sample(s) has/have been tested with the following results

### CHEMICAL ANALYSIS BY SPECTRO & MECHANICAL TEST

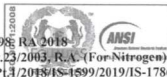
Elements%	Findings	Requirement
C	0.2286	0.25 Max
Mn	0.7170	X
Si	0.1553	X
S	0.0196	0.040 Max
P	0.0168	0.040 Max
S+P%	0.0364	0.075 Max
Cr	0.0180	X
Ni	* <0.0100	X
Mo	* <0.0080	X
Al	* <0.0100	X
Cu	* <0.0080	X
Ti	* <0.0080	X
V	* <0.0050	X
Nb	* <0.0100	X
N	0.0051	X
B	* 0.0013	X
CE	0.3571	0.50 Max
Wt/m (Kg/m)	3.833	3.85±3%
T.S. (N/mm <sup>2</sup> )	669	565 Min.
Y.S. (N/mm <sup>2</sup> )	560	500 Min.
T.S./Y.S Ratio	1.19	≥1.10
%E. on 5.65√ so	22.62	16.0 Min.
Total Elongation% at max. force	8.44	5% Min.
Bend Test (180°, 40)	Satisfactory	Shall pass the test
Rebend Test (135°, 157.5°, 60)	Satisfactory	
AR Value	5.11	4.25 Min.

Remarks : The above test result obtained conforms to the specified value

**COPY**

PB

- TEST WITNESS BY :  
\* ENVIRONMENTAL CONDITION :  
\* ESTIMATED UNCERTAINTY (IF APPLICABLE) :  
\* SAMPLE NOT DRAWN BY US  
\* NON-ACCREDITED BY NABL  
\* SPECIFICATION USED FOR TEST  
\* TEST CERTIFICATE RELATES TO THE SAMPLE ONLY  
\* SAMPLE WILL BE CEASED IF NOT TAKEN BACK WITHIN 15 DAYS



For S. B. STEELS COMPANY

Tirthankar Som  
Quality Manager  
(Authorised Signatory)

TESTING FACILITIES APPROVED BY—LOYDS, PDIL, IRS, TRF, EBEL, NPB, EIA, DEFENCE, ABB (ABL LTD.) CESC, BV, VSP, FCI, DNV, PGCIL, CLW, PWD, CPT, DGS, & D, PIEN, BALCO, RDSO, N.T.P.C, WBSEB, DSP, GEC, RITES, L & T, TATA EXPORT & OTHER INSPECTION AUTHORITIES.

THE STATEMENT OF THE REPORT SHALL NOT BE REPRODUCED IN FULL/PART WITHOUT THE PRIOR WRITTEN CONSENT OF THE ISSUING AUTHORITY.  
QUALITY CONTROL & INSPECTION / SERVICE TO THE NATION



NABL ACCREDITED  
LABORATORY  
ISO/IEC 17025:2005  
CERTIFICATE No.  
TC-5979

# S. B. STEELS COMPANY

NABL/ACCREDITED, GOVT. REGISTERED (190162108303) &  
BIS APPROVED / ISO (9001) APPROVED METALLURGICAL TESTING LABORATORY  
LABORATORY : 366/6 & 366/1, G. T. ROAD, BALLY, HOWRAH - 711 201 (W.B.)  
H. O. : 36, STRAND ROAD, 4TH FLOOR, ROOM NO. 16, KOLKATA-700001



SBS-F-9

Ph. Lab. : 2654-1858  
Fax Lab. : (033) 2654-2145  
Ph. H.O. : 2243-2017/1903  
Fax H.O. : (033) 2243-1205  
L. No. :

## Test Report

Page 01 of 01

SAMPLE RECD. ON 31.10.2019  
ORDER REF. NO.SSPL/19-20/CPWD/001027 Dt.: 31.10.2019.  
ULR-TC 597919000002738P  
SAMPLE DESCRIPTION 28 mm SEL TMT Bar  
SPECIFICATION IS : 1786/2008, Gr. Fe-500D, Amndt. 4, July 2019  
ISSUED TO M/s. Shyam Sel & Power Limited, 5, C. R. Avenue, Kolkata - 72

TESTED ON 31.10-05.11.2019  
T.C. NO. SBSCP2738/3  
DATE 05.11.2019  
STAMPED Nil.

This is to certify that the above Sample(s) has/have been tested with the following results

### CHEMICAL ANALYSIS BY SPECTRO & MECHANICAL TEST

Elements%	Findings	Requirement
C	0.2444	0.25 Max
Mn	0.8997	X
Si	0.3825	X
S	0.0144	0.040 Max
P	0.0303	0.040 Max
S+P%	0.0447	0.075 Max
Cr	0.0433	X
Ni	0.0143	X
Mo	* <0.0080	X
Al	* <0.0100	X
Cu	0.0456	X
Ti	* <0.0080	X
V	* <0.0050	X
Nb	* <0.0100	X
N	0.0070	X
B	* 0.0007	X
CE	0.4043	0.50 Max
Wt/m (Kg/m)	4.838	4.83±3%
T.S. (N/mm <sup>2</sup> )	752	565 Min.
Y.S. (N/mm <sup>2</sup> )	619	500 Min.
T.S/Y.S Ratio	1.21	≥1.10
%E. on 5.65√ so	16.66	16.0 Min.
Total Elongation% at max. force	5.57	5% Min.
Bend Test (180°, 4Ø)	Satisfactory	
Rebend Test (135°, 157.5°, 6Ø)	Satisfactory	Shall pass the test
AR Value	5.06	4.76 Min.

Remarks : The above test result obtained conforms to the specified value

**COPY**

PB

\*\*\*\*\*

TEST WITNESS BY :

\* ENVIRONMENTAL CONDITION :

\* ESTIMATED UNCERTAINTY (IF APPLICABLE) :

\* SAMPLE NOT DRAWN BY US

\* NON-ACCREDITED BY NABL

\* SPECIFICATION USED FOR TEST

\* TEST CERTIFICATE RELATES TO THE SAMPLE ONLY

\* SAMPLE WILL BE CEASED IF NOT TAKEN BACK WITHIN 15 DAYS



For S. B. STEELS COMPANY

Tirthanar Som  
Quality Manager

(Authorised Signatory)

TESTING FACILITIES APPROVED BY—LOYDS, PDIL, IRS, TRF, BHEL, NPB, EIA, DEFENCE, ABB (ABL LTD.) CESC, BV, VSP, FCI, DNV, PGCIL, CLW, PWD, CPT, DGS. & D, PIEN, BALCO, RDSO, N.T.P.C, WBSEB, DSP, GEC, RITES, L & T, TATA EXPORT & OTHER INSPECTION AUTHORITIES.

THE STATEMENT OF THE REPORT SHALL NOT BE REPRODUCED IN FULL/PART WITHOUT THE PRIOR WRITTEN CONSENT OF THE ISSUING AUTHORITY.  
QUALITY CONTROL & INSPECTION / SERVICE TO THE NATION

E-mail : sbsteelsco@gmail.com/sbspkm09@yahoo.in Website : http://sbsteelsmtlab.com

Collection Centre - 14/3, Makardah Road, Kadamtala - Howrah - 711701. Ph: 7278964664

