



Laboratory

TCRSS provides laboratory testing services through two branches (CR-Lab and EG-Lab), both accredited according to ISO/IEC 17025 standards and capable of performing a wide range of tests as follows :

● TCRSS Branch 1 (CR-Lab)

No.	Analysis / Test item	Scope	Reference Method
1	Chemical Composition test (Optical emission spectrometer)	ISO/IEC 17025 : 2017 Accreditation No.1682	<ul style="list-style-type: none"> In house method : QW-TP-039 based on ASTM E 415-2021
2	Tensile test		<ul style="list-style-type: none"> JIS Z 2241 : 2020, * ASTM A370 : 2021 TIS 2172 Part 1 : 2013, * TIS 2223 : 2015 TIS 2012 : 2015, * TIS 2140 : 2017
3	Rockwell hardness test (HRBW, HR30TW)		<ul style="list-style-type: none"> JIS Z 2245 : 2021, * ASTM E18-2020 ISO 6508-1 : 2016, * TIS 2171 Part 1-2012 TIS 2012 : 2015
4	Vickers hardness test (HV5)		<ul style="list-style-type: none"> JIS Z 2244-1 : 2020, * ISO 6507-1 : 2018 TIS 2169 Part 1 : 2012
5	Bending test		<ul style="list-style-type: none"> JIS Z 2248 : 2014, * TIS 2173 : 2012
6	R-Value test	TCRSS standard control	<ul style="list-style-type: none"> In house method
7	Erichsen test		
8	Roughness meter		
9	Oil volume		
10	Hoop Strength		
11	Microstructure test		
12	Orange peel test		

● TCRSS Branch 2 (EG-Lab)

No.	Analysis / Test item	Scope	Reference Method
1	Coating mass (Zn)	ISO/IEC 17025 : 2017 Accreditation No.0370	<ul style="list-style-type: none"> JIG G 3313:2021, * ASTM A90/A90M-21 TIS 2223 : 2022
2	Tensile test		<ul style="list-style-type: none"> JIS Z 2241 : 2022, * ASTM A370 : 2023 ISO 6892-1 : 2019, * TIS 2223 : 2022 TIS 2172 Part 1 : 2022
3	Rockwell hardness test (HRBW, HR15TW, HR30TW)		<ul style="list-style-type: none"> JIS Z 2245 : 2021, * ASTM E18-2022 ISO 6508-1 : 2023, * TIS 2171 Part 1-2021 TIS 2223 : 2022
4	Bending test		<ul style="list-style-type: none"> JIS Z 2248 : 2022, * ASTM E290-2022 ISO 7438 : 2020, * TIS 2173 : 2021
5	R-Value test	TCRSS standard control	<ul style="list-style-type: none"> In house method
6	Erichsen test		
7	Oil volume		
8	Hoop Strength		
9	Microstructure test		
10	SEM & EDX		
11	Salt Spray test (Neutral)		
12	Elementals in solvent (AAS)		
13	Elementals in Metals (XRF)		