

# Certificate

## Certification number SP TH 015

This is to certify that the aluminothermic welds

- Filler mould: UIC54 / NP46 SoW-5 L50
- Filler metal: 54 / Z90 SoW-5(-E) + 812 / Z90 SoW-5 L50

produced by:

**Elektro-Thermit GmbH & Co. KG**  
**Halle (Saale), Germany**

has been approved for wide gap (L50) butt joints in:

**46E3 R260Mn to 54E1 R260Mn**

in accordance with the specification:


RLN00451-2, d.d. 01 Oct 2021.

Details are mentioned in annex 1 and 2.

Original Approval : December 2004  
Current Certificate : June 2023  
Certificate Expiry : June 2026

On behalf of DEKRA Rail

  
ir. A.J.P. Verweij  
Manager Certification

  
E. Groen  
IWT nr.: 1479



# Welding Qualification Approval Record – Certificate

**Nummer:** SP TH 015  
**Number:** Annex 1

**Kenmerk:**  
Designation: See AEAT/04/4600155/004

**Keuringsinstantie:**  
Test body: DEKRA Rail B.V.

**Opdrachtgever:**  
Employer: Elektro-Thermit GmbH & Co. KG

**Datum van uitgifte:**  
Date of issue: June 2023

**Adres:**  
Address: Chemiestraße 24  
D-06132 Halle (Saale), Germany

	Details van de proeflas Weld test details	Thermietlassen (71) Alumino-thermic (71)	Geldigheidsgebied Range of approval	
<b>Lasproces</b> Welding process				
<b>Spoorstaaf type</b> Rail type	46E3 to 54E1		46E3 to 54E1	
<b>Soort verbinding</b> Joint type		<b>Stomplas</b> Butt weld wide gap (L50)		
<b>Basismateriaal groep(en)</b> Parent metal group(s)	R260Mn to R260Mn		R260Mn to R260Mn	
<b>Lasmal type</b> Filler mould type	UIC54 / NP46 SoW-5 L50		UIC54 / NP46 SoW-5 L50	
<b>Lastoevoegmateriaal</b> Filler metal designation	54 / Z90 SoW-5(-E) + 812 / Z90 SoW-5 L50		54 / Z90 SoW-5(-E) + 812 / Z90 SoW-5 L50	
<b>Type beschermgas / poeder</b> Shielding gas / flux	n.v.t. n.a.		n.v.t. n.a.	
<b>Overige middelen</b> Auxiliaries	Zie rapport: See report		AEAT/04/4600155/004	
<b>Lasmachine/Bedieners identificatie</b> Welding machine/Operators identification				
<b>Laspositie</b> Welding position	n.v.t. n.a.		n.v.t. n.a.	
<b>Voorbehandeling</b> Gouging / backing	n.v.t. n.a.		n.v.t. n.a.	
<b>Aard van de beproeving</b> Type of testing	Acceptatie criteria Acceptation criteria		Acceptabel / Niet vereist Acceptable / Not required	<b>Opmerkingen</b> Remarks
<b>Visueel</b> Visual			Acceptable	Handleiding voor het Thermiet® snellasproces SoW-5, rev.01 (22 mei 2023)
<b>Geometrie</b> Geometrically			Acceptable	
<b>Ultrasoon onderzoek</b> Ultrasonic testing			Acceptable	
<b>Magnetisch onderzoek</b> Magnetic particle inspection			Not required	
<b>Buig/breektest</b> Bend/Break test	Zie rapport: See report: AEAT/04/4600155/004		Acceptable	
<b>Vermoeingsproef</b> Fatigue test			Acceptable	
<b>Hardheidsmetingen</b> Hardness measurements			Acceptable	
<b>Macro-onderzoek</b> Macro-examination			Acceptable	
<b>Mirco-onderzoek</b> Micro-examination			Acceptable	
<b>Chemische analyse</b> Chemical analysis			Not required	

Vakkennis Job knowledge  
 Acceptabel Acceptable  
 Niet beoordeeld Not tested  
 Aparte bladen toegevoegd indien vereist Append separate sheet(s) if required  
 JA / Yes  
 NEE / No

Aanvullende informatie beschikbaar op: Zie rapport:  
Additional information is available on: See report

**Kwalificatie geldig tot:** June 2026  
Validity of approval until:

AEAT/04/4600155/004 d.d. January 2005  
DR/19/170307/008 (Smart Weld Jet) d.d. 03 April 2019

**Datum:**  
Date:  
06-06-2023

**Handtekening:**  
Signature:

E. Groen IWT nr.: 1479

Verlenging  
Prolongation

Nummer:

Number: SP TH 015 annex 2

Verlenging door beoordelaar met 3 jaar  
Authorized prolongation for the following 3 years

Herkwalificatie  
rapportnummer:  
Re-qualification  
report number:

Datum:  
Date:

Handtekening:  
Signature:

Functie of titel:  
Position or title:

Herkwalificatie  
rapportnummer:  
Re-qualification  
report number:

Datum:  
Date:

Handtekening:  
Signature:

Functie of titel:  
Position or title:

DeltaRail/06/60028/076 DeltaRail/07/60028/083	12 December 2006 26 January 2007		DR/20/190224/008 DR/20/190224/011	14 April 2020 15 May 2020	
DeltaRail/10/10234.014/004 DeltaRail/10/10234.014/005	3 November 2010 8 December 2010		DR/23/230142.152 DR/23/230142.153	02-06-2023 06-06-2023	
DeltaRail/12/110165.032/004 DeltaRail/12/110165.032/006	18 Oktober 2012 21 November 2012				
Pturel/14/130497.003/010 Pturel/14/130497.003/012	08 April 2014 02 June 2014				
DR/16/150541.003/008 DR/16/150541.003/011	29 March 2016 31 May 2016				
DR/18/180004.003/007 DR/18/180004.003/011	23 February 2018 29 March 2018				