

TECHNICAL INSTRUCTION	TI 154 Issue 1 30/11/2010 Page 1 of 2
	NETWORK RAIL - SIGNAL ENGINEERING S&C Confirmation Gauge – Loose Pin Carriers
Relevant Standard: NR/L3/TRK/1202	

Purpose

This Technical Instruction is required to inform staff of a problem with a small number of the S&C Confirmation Gauges and what actions to take.

Scope

This TI applies to the S&C Confirmation Gauge only

Background

The S&C Confirmation Gauge has been designed in response to measurements that are required to be taken in accordance with NR/L3/TRK/1202 Flat Bottom Full Depth Switches – Management of Fixed Stretcher Bar Assemblies.

The gauge is designed to measure the switch opening/free wheel clearance and free wheel passage dimensions within a switch unit.

Abbreviations & Definitions

Free wheel clearance – the narrowest point between the stock rail running edge and back of the associated switch blade found around the heel area of the open switch.

Free wheel passage – the distance between the rear of the open switch blade at the narrowest point between the stock rail, and rear face of the open switch blade and the running edge of the closed switch blade at a point 14mm below the head of the rail.

Pin carriers - the part of the gauge to which the mushroom shaped and conical shaped measuring pins are attached to.

Incorrect Readings and Loose Measuring Pin Carriers

A small number of S&C Confirmation Gauges have been found to be reading incorrectly when used.

Further investigation with the manufacturer has identified that the screws which hold the measuring pin carrier to the internal slide mechanism have come loose (see figure 1) on a small number of gauges supplied to Network Rail. This problem has resulted in measurements taken varying by 2 – 3mm.

A solution to this problem has been agreed with the manufacturer which includes the strengthening of this part of the slide mechanism and modification to the way in which the pin carriers are attached to the slide mechanism.

A program of recalling the gauges is being formalised to modify **all** of the gauges that have been supplied to Network Rail.

Originator's Details:- Phil Winship Network Rail phil.winship@networkrail.co.uk
PUBLISHED UNDER NR/L2/SIG/11120

TECHNICAL INSTRUCTION

TI 154

Issue 1

30/11/2010

Page 2 of 2

All new orders that have been placed for the gauge will be manufactured and supplied to the modified standard.

It must be stressed that the S&C Confirmation gauge is a precision measuring instrument and should be treated with care. As with any precision measuring instrument the calibration cannot be guaranteed if the equipment is not handled and used appropriately. It is the users responsibility to ensure the equipment is used responsibly and correctly.

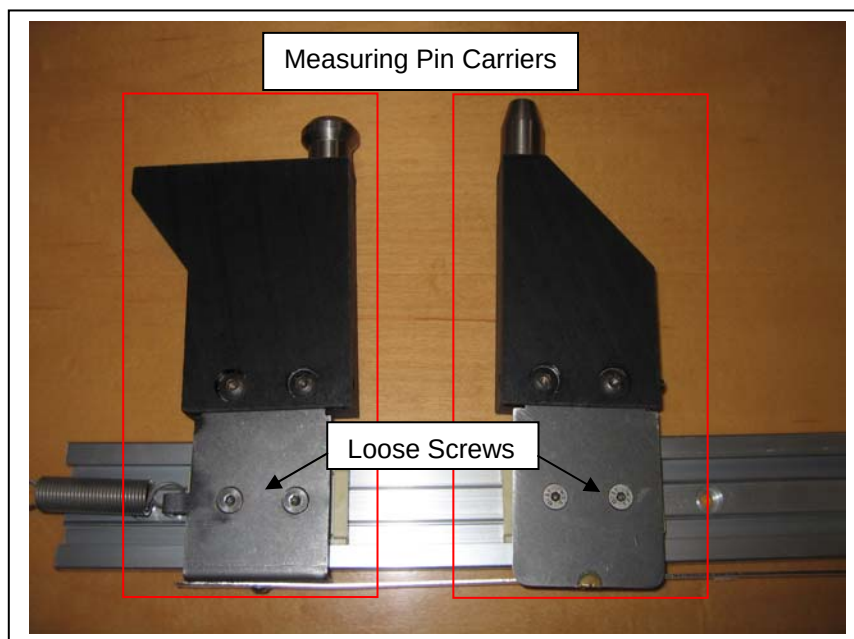


Figure 1. Loose screws found on the measuring pin carriers

Action Required

As a precaution all gauges should be checked to confirm the measuring pin carriers are firmly attached to the gauge and the gauge is reading correctly when a measurement is taken.

Any gauges that are found to be reading incorrectly or have loose measuring pin carriers should be quarantined and notified to the route RAM (S&T) and Phil Winship Senior Technology Engineer (S&C).

Staff to be Briefed

Role	Responsible for Briefing
Head of Asset Management [S&T]	Principal Engineer S&C (S&T)
Route Asset Mangers (S&T)	Head of Asset Management [S&T]
Signal & Telecoms Maintenance Engineer	Route Asset Mangers (S&T)
Section Manager (Signals)	Signal & Telecoms Maintenance Engineer
Signal Technicians	Section Manager (S&T)
Signalling Technical Support Staff	

End