



1 **EC TYPE-EXAMINATION CERTIFICATE**

2 Equipment intended for use in Potentially Explosive Atmospheres Directive 94/9/EC

3 Certificate Number: Sira 00ATEX2199X

4 Equipment: Self-Monitoring Clamp

5 Applicant: Newson Gale Limited

6 Address: Unit 6
Churchill Park
Colwick
Nottingham NG4 2HF
United Kingdom

7 This equipment and any acceptable variation thereto is specified in the schedule to this certificate and the documents therein referred to.

8 Sira Certification Service, notified body number 0518 in accordance with Article 9 of Directive 94/9/EC of 23 March 1994, certifies that this equipment has been found to comply with the Essential Health and Safety Requirements relating to the design and construction of equipment intended for use in potentially explosive atmospheres given in Annex II to the Directive.

The examination and test results are recorded in confidential report number R52A6841A.

9 Compliance with the Essential Health and Safety Requirements, with the exception of those listed in the schedule to this certificate, has been assured by compliance with the following documents:

EN 50014:1997 +A1+A2
EN 50020:1994
EN 50281-1-1:1998
EN 50284:1999

10 If the sign 'X' is placed after the certificate number, it indicates that the equipment is subject to special conditions for safe use specified in the schedule to this certificate.

11 This EC type-examination certificate relates only to the design and construction of the specified equipment. If applicable, further requirements of this Directive apply to the manufacture and supply of this equipment.

12 The marking of the equipment shall include the following:



II 1GD
EEx ia IIC T4

Project Number 52A6841
Date 19 February 2001
C. Index 12

M D Shearman
Certification Manager

This certificate and its schedules may only be reproduced in its entirety and without change

Sira Certification Service

Rake Lane, Eccleston, Chester, CH4 9JN, England
Tel: +44 (0) 1244 670900 Fax: +44 (0) 1244 681330
Email: exhazard@siratc.co.uk



SCHEDULE

EC TYPE-EXAMINATION CERTIFICATE

Sira 00ATEX2199X

13 DESCRIPTION OF EQUIPMENT

The Self-Monitoring Clamp comprises a set of steel, spring loaded jaws onto which is mounted an electronic circuit and steel cover. The circuit is powered by a 9 V Lithium Manganese cell manufactured by Ultralife, which should only be replaced in the non-hazardous area.

The clamp is designed for use with all types of metallic plant such as drums, road and rail tankers, IBC's, mixing vessels and other similar applications. Connection of the clamp prevents a dangerous build up of static charge during transfer, handling or mixing operations by enabling it to 'bleed' safely to earth. Its use assumes that no charge is present prior to the clamp being attached. The clamp provides an indication that the resistance between clamp and the plant, to which it is attached, is less than 10 ohms. Under these circumstances an LED will be illuminated.

As an alternative to the above, the battery and electronics may be housed in a wall mounted enclosure, the clamp is connected to the enclosure via an unspecified length of bonding cable.

It is recommended that BS 5958 "Code of practice for the control of undesirable static electricity" should be consulted prior to using this equipment.

14 DESCRIPTIVE DOCUMENTS

14.1	Drawing	Sheet	Rev	Date	Title
	SMC 002R1	-	A	01 Oct 00	Self Monitoring Clamp
	SMC01R1	-	A	15 Oct 00	Self Monitoring Clamp Board
	AA0125CB	-	1	02 Feb 01	PCB Layout Copper Bottom
	AA0125CT	-	1	02 Feb 01	PCB Layout Copper Top
	AA0125SS	-	1	02 Feb 01	PCB Layout Silk Screen
	SMC-01.PL	-	1	02 Feb 01	Self Monitoring Clamp – Certified Parts List
	SMC003R4	-	A	02 Feb 01	Enclosure Label
	SMC R 001	-	-	02 Feb 01	Self Monitoring Clamp – General Arrangement – Minimum Specification

14.2 Report No. R52A6841A

15 SPECIAL CONDITIONS FOR SAFE USE (denoted by X after the certificate number)

15.1 The battery shall be changed only in the non-hazardous area.

15.2 Only the following type of battery shall be used in this equipment.

Manufacturer	Type
Ultralife	U9VL-J Lithium Manganese Battery

16 ESSENTIAL HEALTH AND SAFETY REQUIREMENTS OF ANNEX II (EHSRs)

The relevant EHSRs that are not addressed by the standards listed in this certificate have been identified and individually assessed in Report No. R52A6841A.

17 CONDITIONS OF CERTIFICATION

17.1 The use of this certificate is subject to the Regulations Applicable to Holders of SCS Certificates.

Date 19 February 2001

This certificate and its schedules may only be reproduced in its entirety and without change

Sira Certification Service

Rake Lane, Eccleston, Chester, CH4 9JN, England
Tel: +44 (0) 1244 670900 Fax: +44 (0) 1244 681330
Email: exhazard@siratc.co.uk