

Lift & Escalator Industry Association

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17th December 2003

To: All Members

cc: The Quality and Technical Committee (Code No. 621)

The Maintenance Committee

Dear Member,

KEIGHLEY RELAY CONTROL SYSTEMS WITH MINITURE 4-POLE RELAYS

Please find attached Safety Bulletin from Schindler Limited in connection with a potential problem associated with the relay logic control systems manufactured at the Keighley factory between 1978 and 1993.

We trust that you find this bulletin self explanatory and will be guided accordingly.

Yours faithfully

Robert N Lee

Director, Technical Services





Registered office as above.



Keighley relay control systems with miniature 4-pole relays

A potential problem has been discovered with the relay logic control systems manufactured at our Keighley factory between 1978 & 1993. These systems were based upon the miniature industrial 4-pole relay, fitted either to din-rail mounted sockets or incorporated into printed circuit board assemblies and were manufactured under the names of O & K Lifts, Keighley Lifts, Glasgow Lifts, The United Lift Company Ltd. and Schindler Ltd.

The type of relays that were used did not have shields between the contacts and it has been discovered that deterioration to one contact pole could contaminate the adjacent pole and result in "tracking" between these two contacts. In some circumstances a potentially dangerous condition could develop, e.g. where separate circuits for door & direction control have been routed through contacts of the same relay, there is the possibility of these "short circuiting" together and bridging sections of the safety line.

In order to prevent the potential problem above, Schindler recommends regular inspection of all relays for contact deterioration, in particular those relays which can be identified as having contacts switching any type of contactor / coil, while having an adjacent contact in a separated circuit. The relays can be identified from the Schematic wiring diagram index as type: MI 4.

Where deterioration is identified (by contact discolouring & wear) Schindler recommends that the original relays be replaced with an alternative design that incorporates moulded arc shields between contacts, thus preventing "tracking" between poles. Replacement relays of this type can be obtained from the FINDER 55.34 range.

Schindler request that any maintenance company having lifts with Keighley manufactured relay logic control systems in their portfolio, introduce regular relay inspections as part of their maintenance schedule.

Should you require any further information on the above, please contact our hotline on 01932 758 230.