

# The New Zealand LIFT FAX

The New Zealand Lift Fax is produced bi-monthly for the NZ lift industry. Just send your email address to LEC to subscribe.

[www.lifteye.co.nz](http://www.lifteye.co.nz)

email - [nzlfax@lifteye.co.nz](mailto:nzlfax@lifteye.co.nz)

10C Grange Street  
CHRISTCHURCH  
NEW ZEALAND 8002

Ph: +64 3 332 2499

Fax: +64 3 332 0016



05/2008

## EDITORIAL.

### SOME COUNCILS NOW CALL FOR DURABILITY ASSESSMENT ON ALL D2 PRODUCER STATEMENTS:

Better late than never must be the word. After 17 years of the Building Act the revamp of council processes under their multi-million dollar accreditation has of late seen a requirement for Durability confirmation on D2 producer statements result. Now I can understand durability headlining concern after domestic leaky buildings, along with newly trained council officers where tuned up to the phrase durability, but surely the processes of consent evaluation, inspection followed by ongoing maintenance, and annual WOF re-inspection of all D2 equipment as specified systems, doesn't need the unnecessary addition of a durability assessment during the D2 Consent process. In fact it might be fair to say that any specified system is durable for life by definition. I understood the Building Act to be about efficiency of process, removing the wasteful duplicity of unnecessary processes, not a covert means for bureaucratic duck-shoving all and sundry onto independents to produce a multitude of irrelevant producer statements. I understand its difficult to promote efficient solutions and common sense based on experience, when you have a society consumed with fault, punishment and penalty, but to suggest durability has to be assessed on all D2 Producer Statements when it has no relevance, is in essence duplicity, and therefore inefficient.

Good standards and minimising risk is achieved by workface experience and training, not by whimsical and excessive bureaucratic processes. Ed.

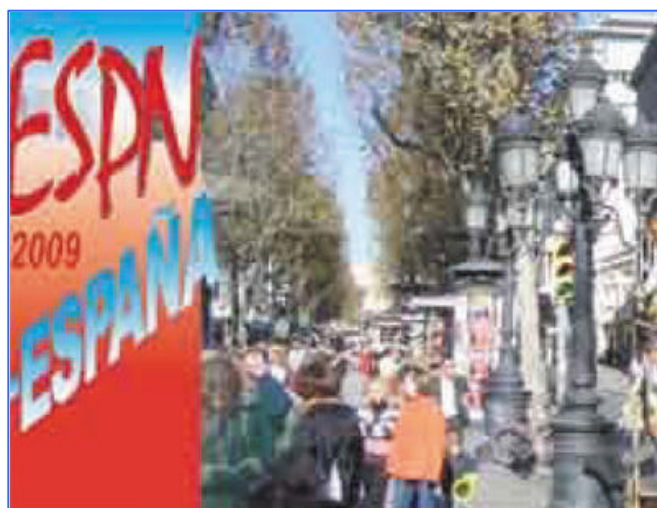
## WHAT'S GOING UP or DOWN THIS MONTH

### INVITATION TO BARCELONA:



The fourth Exhibition of Spain of Elevators and Components organised once again by the IAEE is to be held in Barcelona from Wed. 17<sup>th</sup> to Fri. 19<sup>th</sup> of June 2009, if you are looking to get away from that mid winter blues.

See [www.elevcon.com](http://www.elevcon.com) for all details of papers to be presented and functions.



The exhibition is to be held in Hall 1 of the Fira Barcelona.

*Barcelona's population is 1.6 million.*

*Currency is the Euro €*

*Language is Catalan & Spanish.*

*Temperatures in June 18c to 25c.*



**D2 ACCEPTABLE SOLUTION - IN PRACTICE:**

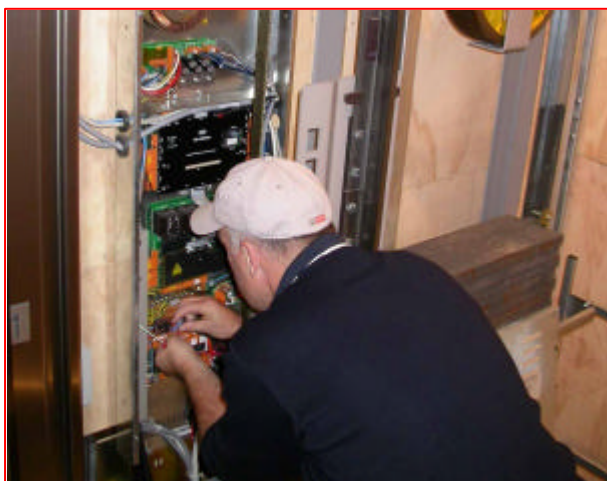
As most are probably aware by now, since 1993 certification of lifts in NZ falls under the Building Act that is administered by Building Code Authorities (BCA's), referencing the D2 performance based NZ Building Code, and mostly non-mandatory selected prescriptive codes, know as acceptable solutions.

For passenger lift installation in NZ, where one of these D2 acceptable solutions exists and is suitable to the building owners purpose, the building owner has two options, he can select either D2/AS1 1.0 using NZS 4332, or D2/AS1 2.0 using the European standard EN81, as long as he includes a few pertinent local NZS 4332 clauses. Where Acceptable D2 solutions are proposed, the BCA has to accept these solutions at the Consent approval stage.

Now because these solutions are based on past prescriptive solutions that may or may not have been updated to reflect market change, issues may arise where new designs; especially from overseas that may not comply exactly with the acceptable solution, but still inherently achieve the intent of the mandatory D2 building code performance clauses.

A lift operating systems query that has arisen of late regards one sentence of the acceptable solution NZS 4332:1997 in clause 25.8. This related to the operation of lifts under earthquake conditions. Now this unique to NZ clause 25.8.2(a), includes a requirement for all lifts to immediately slow as soon as an earthquake is sensed, but this is not required in overseas codes where the control systems are manufactured. This situation means, when applicable overseas solutions enter the country, they need to have their control systems modified.

In some instances this is not practical, as these changes require software design changes that multinational corporations are not interested in.

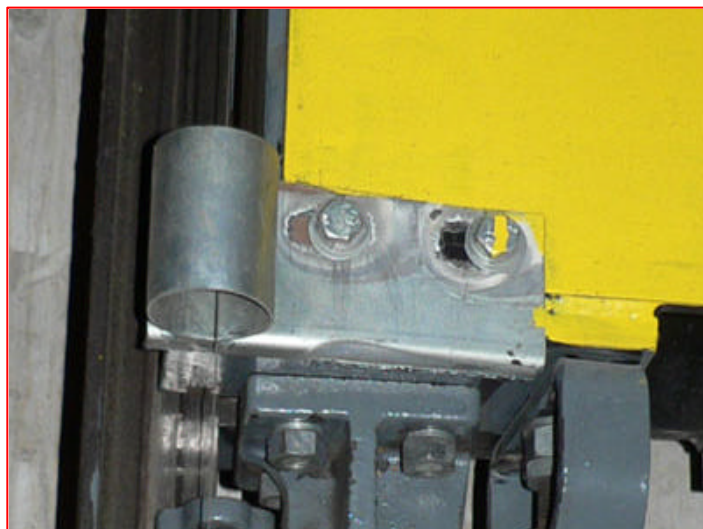


A proposed solution was to use the overheat detection circuit which is incorporated in overseas systems to parallel the earthquake sensor, but this feature returns the lift to the Ground level and shuts the lift down, as compared to the local code requirement to slow the lift to the nearest floor and shut it down.

In essence the European solution achieves the Building code performance requirements, but not exactly to the local prescriptive code, and so how do we sit regarding compliance.

The solution as I see it is to accept paralleling the earthquake input with the overheat detection, as both achieve a similar result. The lift is safely isolated with passengers able to exit the building until a serviceman can check the status of the building, and reinstate the lift when safe to do so.

AS far as compliance under the Building Act goes, this is where the Building Compliance Schedule should come in as a record of the lift installations code status detailing any slight variations at Consent.



**Counterweight Earthquake Sensor**

The solution would be recorded on the **Building Compliance Schedule SS8/1 B2 as D2/AS1 2.0 EN81 Part 1 with a D2/VM1-Earthquake variation.**

**D2/VM1-Earthquake variation:**

*The earthquake control feature will upon operation return the lift immediately to the main floor, open the doors and shut the lift down.*

The concept of a dynamic Building Compliance Schedule Data Base of specific detail relating to each building, drawn from the Consent and made publicly accessible through the internet would ensure consistency of inspection throughout NZ, and suitably accommodate these variations.

**WHAT CONSTITUTES A SUITABLE LIFT EMERGENCY PHONE SYSTEM:**

There is no reason why a clear and simple to operate means of providing emergency communication to passenger lift users isn't fitted to any post 1989 building in NZ. The **acceptable solution D2/AS1 (NZS 4332:1997)** calls for a 24 hr monitored, single button, vandal resistant means of calling for emergency assistance for all passenger lifts. It has not been since 1989 that a lesser solution was acceptable, and only after 1992 when alternative solutions could differ the solution.

**A Timeline of lift phone code changes over the years has been:-**

1. **Power Lift Rules 1958. Rule 26.**  
Automatic lifts require an emergency signalling device operated from inside the car and audible means outside the lift well. The device shall be marked 'emergency signal'.
2. **Power Lift Rules 1980. Rule 28.3.3 (reflected AS1735)**  
Required an audible alarm labelled 'Lift Alarm' located outside the building where no 24hr monitor exists. Required a 24hr direct telephone communication with handset approx. 910 above floor level for disabled use. The location of the lift and street number was to be displayed by the telephone. A minimum 2hr rechargeable emergency battery backup was to be provided for the alarm system.
3. **Power Lift Rules 1989. Rule 28.3.3**  
Required to be a 24hr monitored direct dialling system, with push button or voice activated and be vandal proof with 2hr battery backup. Additional capacity is required where emergency lighting is attached as well. The location of lift and lift number is to be displayed by the phone.
4. **NZS 4332P:1994 Rule 28.3.3**  
No change.
5. **NZS 4332:1997 Rule 28.2.3**  
No change.

**Alternative Solutions:**

One of the positive things regarding the Building Act was the recognition of the Alternative Solution to enable a process for designers of solutions to better reflect new ideas, and evolve with change within both an industry technology and building owners need, to better match the solution to the circumstance during the consent process. A good example of the lesser emergency call solution for low use, low travel platform lifts, that provides a simpler, more cost effective solutions for disability access into buildings over 2 or 3 levels, has been to use 24hr security monitoring of alarms. These lift alarms are connected to 24hr security monitoring companies that can identify the building and lift initiating the alarm. This allows attendance or contact by the security company to be made directly with owners during normal hours if preferred, and lift service provider personnel after hours, negating the needs for costly additional telephone lines and more complex phone equipment.

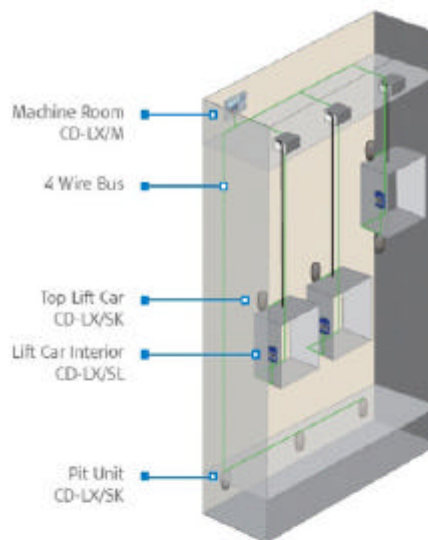


**Overview:**

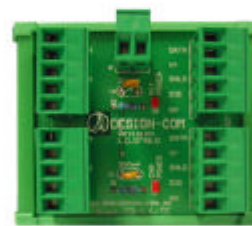
**Product:** LX Intercom (LX-2 and LX-8)  
**Purpose:** To provide communication between Lift Cars, Machine Rooms, Security Rooms and a single phone line.  
**Capacity:** Can network over 500 phones.  
**Approvals:** CE (EN 12015:2005, EN 12016:2005), AS/NZ 60950:2000, AS/ACIF S002:2001, AS/ACIF S004:2001

**Common Scenarios:**

- Customer wishes to reduce phone line count on site
- Keeping costs down for sites larger than a single lift
- Compliance with various lift codes (EN-81:28)
- Refurbishment of older sites with various phones
- Onsite security room wishes to receive lift calls



**Basic LX System with 3 Lifts**



**CD-LX/TE - Wiring Junction**

Use one of these devices per lift for easy wiring. Full recommended wiring methods and suggested cables are supplied.



**CD-LX2/M - Master Controller**

Up to 2 lifts per CD-LX2/M. Single button press to call a Station from this device.



#### UTC REPORTS EARNINGS PER SHARE UP:

United Technologies Corp. (UTC) reported its fourth quarter and full year earnings per share were up 14% and 15%, respectively, compared to the same periods last year. The company also reported net income of US\$1.1 billion and consolidated revenues of US\$14.5 billion for the quarter. The news was not all positive, as new equipment orders at its Otis Elevator business fell 14% for the quarter compared to the same period in 2007.

#### KONE RELEASES FINANCIAL REPORTS:

For the three-month period ending December 31, 2008, KONE Corp. announced it had experienced "continued market share gains and growing profitability." During the quarter, the company reported net sales of EUR1.4 billion (US\$1.8 billion), an increase of 10.6% when compared to the same three months in the previous year; operating income of EUR189.2 million (US\$245.7 million), an 17.7% increase; and EUR845.2 million (US\$1.1 billion) in order received, a decrease of 6.3%.

#### SCHINDLER REPORTS ITS LARGEST PROFIT IN HISTORY:

Schindler recently announced it had achieved a net profit of CHF634 million (US\$540.6 million) for the financial year 2008. It noted this was the largest profit in its history. Consolidated operating revenue rose by 1.4% (6.5% in local currencies) to CHF14 billion (US\$12 billion). The elevators and escalators business increased its operating profit by 11.6% to CHF895 million (US\$763.1 million), while orders received rose by 2.6% to CHF 9.3 billion (US\$7.9 billion). The earnings before income taxes margin reached 10.2% for the first time.

#### TL JONES INDIA MOVES TO NEW PREMISES IN MUMBAI:

TL Jones has shifted its Indian headquarters in Mumbai to new premises in Hyde Park. TL Jones India moved to this facility with expanded engineering and service support in November 2008. The new TL Jones India HQ address and contact details are: 202 Hyde Park, Saki Vihar Road, Andheri East, Mumbai 400 072 India; phone: (91) 22-4215-0700/01/02/03; fax: (91) 22-4200-0789; e-mail: [info@tljones.com](mailto:info@tljones.com); and website: [www.tljones.com](http://www.tljones.com).

#### SPACE ELEVATOR CONSORTIUM FOUNDED:

A coalition of leaders in the space elevator movement recently announced the formation of the International Space Elevator Consortium (ISEC) in Rancho Santa Margarita, California. The group established a new, independent assembly designed to promote standards and foster research relating to the construction of an elevator to space. ISEC will function at the international level and be founded by the Spaceward Foundation, the Space Elevator Reference, the Space Elevator Blog, EuroSpaceward and the Japan Space Elevator Association.

Ted Semon of the Space Elevator Blog will serve as ISEC president. The consortium's goal is to promote the development, construction and operation of the space elevator as a revolutionary and efficient way to space for all humanity.

#### 2009 SPACE ELEVATOR CONFERENCE ANNOUNCEMENT:

The 2009 Space Elevator Conference is set to take place on August 12-16 at the Microsoft Conference Center in Redmond, Washington. According to co-organizer Dr. Bryan Laubscher, the four full days of the event aim to further a possible alliance with the museums and science centers, receive more advertising through early sponsorship, and add major sessions on applications enabled by the space elevator and carbon nanotube technology development.

Organizers also hope to obtain a sponsor so that much more money can be raised than has been in the past in order to lower the conference fee. For more information, contact Laubscher at e-mail: [belaubscher@comcast.net](mailto:belaubscher@comcast.net) or David Horn at e-mail: [david.horn@microsoft.com](mailto:david.horn@microsoft.com).

#### FATAL ESCALATOR FALL IN SOUTH AFRICA:

The Times recently reported that a six-year-old boy died as a result of injuries he sustained when he fell more than 6 meters from an escalator. The incident occurred December 16 in a shopping center near Durban, South Africa. According to the report, the boy "was playing at the top of the escalator when he apparently tried to climb down from its moving railing..."

#### WOMAN INJURED ON ESCALATOR IN JAPAN:

According to *The Yomiuri Shimbun*, a woman was seriously injured when her stole was caught in an escalator she was riding in Mito, Japan. A commuter found her unconscious on the escalator steps about 9:30 p.m. on March 6. The stole had tightened around her neck, and she was in a coma. Other clothes had also gotten entangled in the steps. Police reported a security camera in the rail station in which the incident took place showed the 57-year-old woman falling on the escalator, apparently when the stole became caught in the escalator. She is being treated at the hospital. The incident is being investigated.

#### AUSTRIAN BOY DIES FROM ESCALATOR FALL INJURIES:

*The Austrian Times* recently reported that a boy who fell from an escalator in a Vienna metro station had died from the injuries he sustained in the incident. According to the report, the 10-year-old boy was sitting on the escalator handrail when he lost his balance and fell about 15 meters to the floor below. The incident occurred on January 1. The death was the second in less than two months at the station. On November 28, a 21-year-old man died from injuries he sustained when he fell from the same escalator. The government agency responsible for public transportation in the city is looking into methods to improve safety on metro escalators.