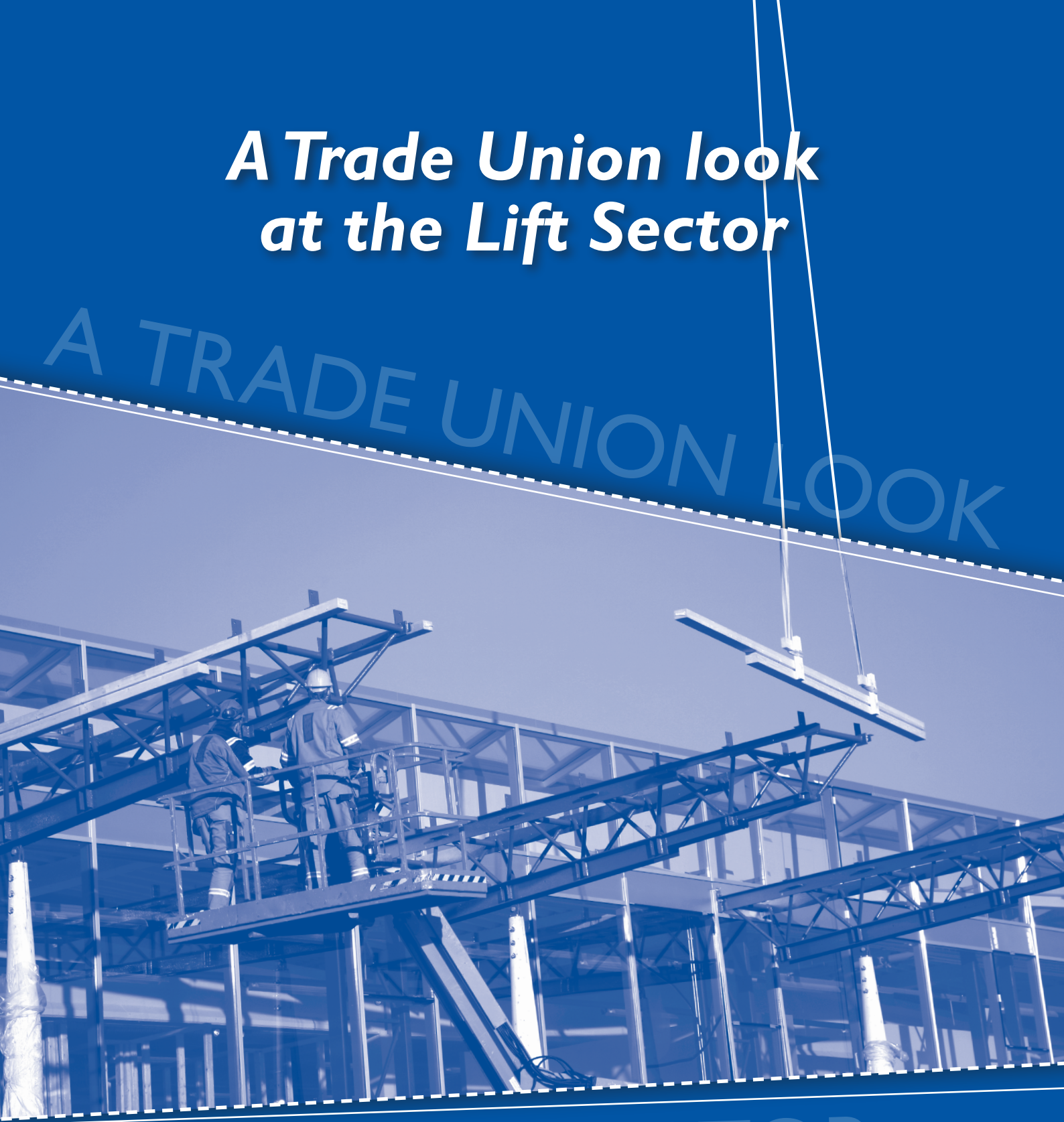
# A Trade Union look at the Lift Sector

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Coordinator: Bart Samyn

etui.
european trade union institute

EMB
EMF
FEM
Europäischer Metallgewerkschaftsbund
European Metalworkers' Federation
Fédération Européenne des Métallurgistes

## European Trade Union Institute (ETUI)

The European Trade Union Institute (ETUI) is an international non profit-making Association established under Belgian law.

It has three main objectives:

- conducting research, producing studies and monitoring European issues of strategic importance for the world of labour while building bridges between the academic and research community and the labour movement;
- promoting education and training activities, programmes and exchanges that strengthen a European Trade Union identity;
- providing technical support in the field of occupational health, safety and protection so as to promote a high level of health and safety protection for workers in Europe.

## European Metalworkers' Federation (EMF)

The EMF is the representative body defending the interests of workers in the European metal industry. The EMF has a mandate for the external representation and coordination of the metalworkers' unions and a mandate to engage in bargaining at European level.

# Foreword

Improving the quality of work has become an important goal of the European Metalworkers' Federation (EMF).

This publication summarizes the knowledge and experience accumulated during the six-year cooperation launched in 2004 by the EMF and the European Trade Union Institute (ETUI) with the intention of carrying out joint cross-border projects to improve the working conditions of European metal industry workers.

EMF and ETUI agreed to develop their cooperation in the lift sector, which is still characterized by the unsatisfactory conditions of the workers involved in the production and installation of new lifts as well as in the maintenance and modernisation of existing ones.

This cooperation culminated in a European Conference addressing the developments and changes within the lift sector, which took place on 25th September 2008 at the Elewijt Center in Belgium.

The work carried out by EMF and ETUI is presented so as to inspire similar initiatives: it includes recommendations for bringing workers' experience into legislation and standardization regulating machinery and lifts.

The EMF people who contributed to this book tell us much of what we need to know to make progress towards better realisation of the economic and social interests of workers in the lifts industry. My thanks go to ETUI for having promoted such fruitful cooperation.

*Bart Samyn*

*Deputy Secretary General,*
European Metalworkers' Federation (EMF)

March 2010

# A TRADE UNION LOOK AT THE LIFT SECTOR

# Preface

When the European Metalworkers' Federation decided to create a new ad-hoc committee for the lift sector (Prague Congress, 2003), the European Trade Union Institute started exploring possible avenues of cooperation between EMF and ETUI. The motivation for this decision was based on some specific elements of the European lift sector, structured by a small number of major companies and hundreds of small and medium-sized companies that usually cover the whole process from producing and establishing to maintaining their products.

ETUI is interested in studying the conditions of workers in the lifts industry where room for improvement still exists not only in equipment design – directives and standards – but also in equipment use – working practices, procedures, accidents, incidents, training and occupational diseases.

We are aware of the industry pressure to harmonize the safety requirements for lifts across the world with the aim of removing trade barriers between countries and continents while providing state-of-the-art safety for all users, maintenance personnel and inspection bodies throughout the world.

ETUI is of the opinion that this vision must fully respect the quality of the lift workers' conditions, and this means putting risk assessment and human factors at the centre of trade union action. All possible involved parties must be taken into account, i.e. workers and users of lifts, inspection and maintenance personnel as well as people not using the lift but who might be in its vicinity.

But trade union action firstly requires a stock-taking exercise of what problems exist and where possible solutions lie. This publication is a first step towards better workers' involvement at national and European level in a sector heavily affected by the global economic crisis. Dismissals, wage freezes, lack of training, unsafe design and uncontrolled sub-contracting to reduce costs are all factors that need to be addressed through a new paradigm shift where the industry and management centre their attention on the quality of employment of the workers.

*Laurent Vogel*

*Director of the Health and Safety Department*
ETUI

March 2010

# Acknowledgements

Six years of work is the background to this effort to take stock of the working conditions of lift workers. I have had – and continue to have – the privilege to help the European Metalworkers' Federation make more visible the unspoken experiences and concerns of women and men working everyday in the lifts industry.

A number of persons have played a crucial role in ensuring that this publication came out. These include all the members of the EMF Lift Select Working Party (SWP) and especially Ari Ketonen and Mike Smallwood, Chair of the SWP, together with international experts like Pierre Bianchini (former Chairman of CEN TC 10) and Luciano Faletto. I am also grateful to the following EMF staff: Mina Vukojicic, EMF Policy Advisor for the Lift Sector, with special thanks to Linda Rackham for improving the readability and consistency of this publication.

Trade unions in the metal industry are increasingly gaining invaluable support from a number of European Commission officials. I am especially grateful to Beata Pich (DG ENTR/I/4), Chair of the Lifts Working Group, and Ian Fraser (DG ENTR/I/4), Chair of the Machinery Working Group, for their continued commitment to ensuring that the workers' voice is heard at European level when it comes to health and safety matters.

Special thanks go to Bart Samyn, EMF Deputy General Secretary, and Laurent Vogel, Director of the ETUI Health and Safety Department: this successful experience could not have been realized without their support and encouragement.

*Stefano Boy*

*Research Officer*
Standardization, safety of machinery,
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# A TRADE UNION LOOK AT THE LIFT SECTOR

# Introduction

The fact that essential elements of the day-to-day activity of metalworkers (procedures, standards, equipment) are regulated at European level by means of directives and standards explains the EMF's and ETUI's interest in working together so as to share the economic and social interests of metalworkers, represented by EMF, and the experience accumulated by ETUI within the legislative and technical framework regulating machinery and lifts in Europe.

To integrate workers' concerns into legislation and standardization in the lift sector requires collecting workers' knowledge at national level and channeling this into the appropriate European bodies. With this in mind, our cooperation started by ensuring a permanent trade union contribution within the Lifts Working Group supervising the application of the Lifts Directive (95/16/EC) and the CEN Technical Committee TC 10 Lifts, escalators and moving walks elaborating European standards interpreting the directive's technical requirements.

In order to achieve this goal, EMF and ETUI created a task force consisting of national trade unions from the lift sector representing the major companies operating in Europe. The task force was intended to represent a "health and safety lift observatory" in charge of collecting lift workers' claims and concerns in order to elaborate this information, make it visible to the European Commission and CEN, and provide Notified Bodies with "fresh" feed-back from the lift workforce on selected health and safety priorities.

The EMF Conference on the elevator industry held in November 2003 paved the way for a paradigm shift to address the workers' concerns and needs in the lift sector. The findings of this event were discussed again in a joint EMF/ETUI Lifts Conference focusing on developments and changes within the lift sector, held on 25th September 2008 at the Elewijt Center in Belgium. This event, which brought together lift workers, experts and trade unionists from around Europe, was a great success. Speakers included Beata Pich from the European Commission and Pierre Bianchini from the European Lifts Association.

Today, EMF can rely on a number of experts – mainly recruited through the European Work Councils – who can provide "technical" support for future joint EMF/ETUI initiatives. These experts come from the biggest lift companies. General engineering and maintenance are among the areas of expertise covered.

The EMF & ETUI Lift Task Force met regularly until February 2009. Its activity over the years has benefited from the nomination of two EMF experts as trade union observers in the legislative (Lifts Working Group) and standardization (CEN TC 10) bodies covering the lift sector. The purpose of the brochure is to make visible the knowledge and experience assembled by the EMF and ETUI during their cooperation, especially from the health and safety angle of those working in the lift sector.

The brochure is divided into three parts. **Part I** provides an overview of the working conditions in the lifts industry as seen by two active trade union experts, who were asked to share their concerns about the conditions in which lift workers operate daily in an interview. These reflections set the scene and help understand why trade union action is needed, offering possible avenues for trade union intervention at national and European level.

But how to move forward from words to action? **Part II** tries to answer this question by providing background information about legislation and standardization relating to the safe design of lifts. The ETUI has been trying to promote and coordinate a trade union focus around this topic both at national and European level. Part II also gives guidance on how to intervene in the production of lift standards, together with a set of concrete proposals and reflections that could inspire a long-term trade union strategy.

With a similar objective to trigger discussions among trade unions, **Part III** displays the EMF position paper 'Lift Sector Single Person Working in Lift Construction'. Besides inspiring an attempt to establish an EMF European database of working practices in each country, it is hoped that the position paper will serve as a useful basis for EMF affiliated organisations in the dialogue in their respective countries, as well as for the possible development of national position papers on the lift construction area.

*Stefano Boy*

*Research Officer*
Standardization, safety of machinery

# A Trade Union look at the Lift Sector



## Contents

# Contributors

## *Mike Smallwood*

Mike Smallwood is a National Official for Unite the UK's largest Union and one of the Sectors within his remit is Lifts and Escalators. He has been involved with the European Metalworkers' Federation (EMF) Lift Sector Committee from the very first meeting and took over the role of Chairman in 2005, is a member of various UK and EU Sector Committees, and attends the Lift Working Group and CEN TC10 meetings.
Mike is also an EMF EWC Expert Advisor and EWC Coordinator for several companies including the Otis EWC.

## *Ari Ketonen*

Ari Ketonen, born in Finland in 1957, graduated in Mechanical Engineering in 1982. He joined KONE in 1982 where he occupied various positions in R&D and Engineering. In 1991 he was appointed Project Manager, and subsequently Senior Project Manager, for the KONE Corporation R&D.
Ari Ketonen serves as Chairman of the CEN TC10/WG6 (2008 – ), and is a member of several CEN and ISO Committees and Work Groups active in the lift sector.

## *Pierre Bianchini*

Pierre Bianchini, born in Italy in 1943, graduated in Electrical Engineering in 1963 in Belgium. He then joined the Belgian branch of Westinghouse Elevators (acquired by KONE in 1975) where he occupied various positions in R&D and Engineering. From 1991 to 2007 he was Vice-President, Codes and Standards, for the KONE Corporation..
Pierre Bianchini has served as Chairman of the CEN TC10 (1992 – 2007), and has been a member of several CEN and ISO Committees and Working Groups active in the Lifts and Escalators Standardization.

## *Luciano Faletto*

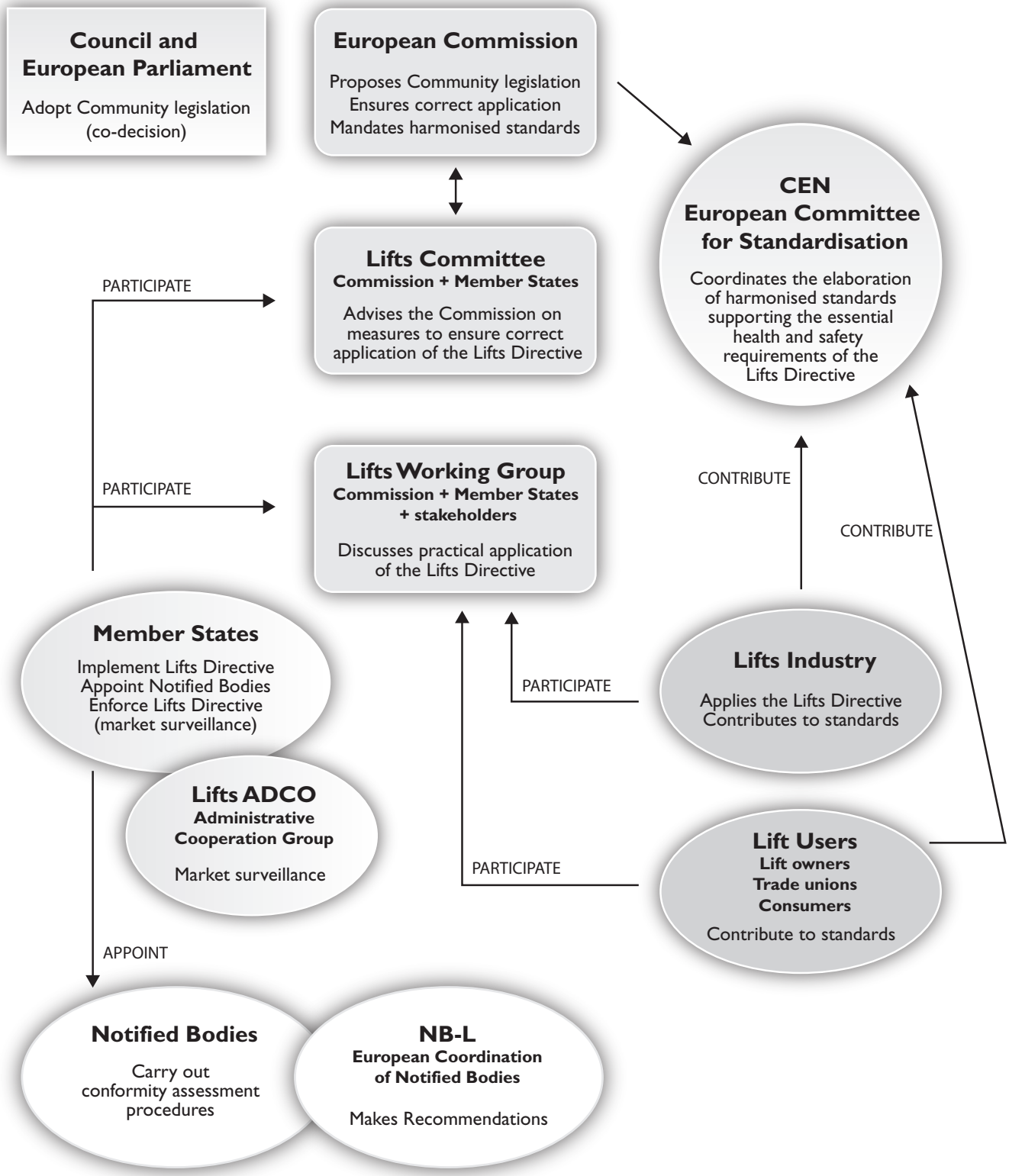
Luciano Faletto, was born in Trieste (Italy) in 1941 and graduated in Mechanical Engineering in 1965. After joining FIAM, the largest Italian lift manufacturer in 1963, he occupied various positions in manufacturing, engineering and R&D. After the takeover of FIAM by KONE in 1987, he was appointed Sales and Marketing Manager, then General Manager in an Italian subsidiary of KONE and finally leader of a special KONE product development in the Far East. In 1998 he retired and started his own consulting company to provide support for European Lifts SMEs. He is a member of several committees active in lifts standardization within CEN and ISO and attends the Lifts Working Group and NB-L Coordination Committee meetings for the LD 95/16/EC.

# A TRADE UNION LOOK AT THE LIFT SECTOR

# List of Abbreviations

| | |
|---|---|
| CEN: | Comité Européen de Normalisation (European Committee for Standardization) |
| EWC: | European Works Councils |
| WG: | Working Group |
| ELA: | European Lift Association |
| HSL: | Health and Safety Laboratory |
| NSB: | National Standard Body |
| Lifts ADCO: | Administrative Cooperation Group |
| NB: | Notified Bodies |
| NB-L: | Notified Bodies- Lifts |
| ESR: | Essential Safety Requirements |
| MRL: | Machine Room Less lifts |
| NANDO: | New Approach Notified and Designated Organisations |
| Rfu: | Recommendations for Use |
| CENELEC: | Comité Européen de Normalisation Electrotechnique (European Committee for Electrotechnical Standardisation) |
| ETSI: | European Telecommunications Standards Institute |
| NSB: | National Standards Bodies |
| SNEL: | Safety Norm for Existing Lifts |
| CAP: | Conformity Assessment Procedure |
| LD: | Lifts Directive |
| MD: | Machinery Directive |

# Organisational Scheme for the Lifts Directive




adapted from the Organisational scheme for the Lifts Directive,
http://ec.europa.eu/enterprise/sectors/mechanical/files/lifts/struct_en.pdf

# A TRADE UNION LOOK AT THE LIFT SECTOR

# The challenges facing European workers in the Lifts sector

## *Stefano Boy interviews Mike Smallwood and Ari Ketonen*

*The first concrete step towards EMF – ETUI co-operation in the Lifts Sector was taken in 2005, when two EMF members were appointed to represent trade unions in the political (European Commission) and Technical (CEN) fora dealing with the regulation of lifts in Europe: Mike Smallwood – Unite National Officer, EMF European Work Council Expert Advisor and Chairman of the EMF Lift Sector Committee – was appointed EMF representative to the Lifts Working Group, while Ari Ketonen – Finnish Metalworkers' Union (Metalli), was appointed EMF representative to the Technical Committee CEN TC 10 Lifts, escalators and moving walks.*

*This interview – carried out by Stefano Boy, Senior Researcher in Machinery Safety and Standardization at the Health and Safety Department of the ETUI – reveals the difficulties faced by trade unions when it comes to improving the conditions of the Lifts Sector workers.*

### *Stefano Boy*

How would you sum up your participation in the Lifts Working Group meetings so far? Do you think that trade unions should continue to attend those meetings?

### *Mike Smallwood*

Our participation as trade union representatives in the Lifts WG is important and feasible provided there is adequate notice and that the issues being discussed are relevant and not just purely technical. As trade union members we have a direct link to the workforce and so are able to push their views forward and make them heard by the other lifts stakeholders. Some of the WG members get their reports through line management, by nature of the fact that most of them are managers or in management. Our representatives can inform us about what is actually going on at shop-floor level. Bringing that to the debate puts things in perspective and I can recall at least two occasions where we have been thanked for doing that. I often wonder how the workers' views were taken up in those sorts of discussions before we became involved. At the same time, I think we should say to the WG members that we would like to become more than observers, if possible, and be more involved in the WG activity.

### *Ari Ketonen*

I agree with Mike that it is very important to keep those seats as trade union members. However, it should be said that only having observer status is all that we can obtain there, as is the case for

the other stakeholders like the Notified Bodies, Consultants or Installers. Observer status has also been granted to the European Lift Association (ELA), representing the lifts industry at large. It would be interesting to see whether trade unions are also interested in attending the Lifts Committee meetings – where Member States only are admitted. Maybe their discussions touch upon issues of trade union interest.

### *Stefano Boy*

As you rightly say, the Lifts WG sometimes addresses technical issues, some of which have a considerable impact on workers' conditions. Two issues have been put on the table of the Lifts WG in recent years: the reduced safety space on top of cars, and the machine room-less lifts that are increasingly put on the European market. What do you think the EMF and the trade unions could contribute on these two issues?

### *Ari Ketonen*

The safety space issue is still a hot potato, and the question is how can trade unions put forward their concerns? When CENTC 10 started working on **prEN 81-21** - *Safety rules for the construction and installation of lifts - Lifts for the transport of persons and goods - New passenger and goods lifts in existing buildings*[1], I became worried about some aspects of this draft standard because I thought that the safety level assured by the standard was insufficient. It actually looked as if it had been agreed politically, as a kind of compromise. Anyway, once reduced safety spaces are accepted in existing buildings, we run the risk of the industry making pressure so as to reduce safety spaces in new buildings too.

### *Mike Smallwood*

"Refuge space" is primordial for workers and I too am worried about the industry pressure to amend the Lifts Directive in relation to that. In our opinion the proposed changes are in direct conflict with the aim of providing a safe system of work for lift engineers. I wrote to the European Commission insisting that the requirement to provide a permanent safety (refuge) space is as critical today to ensure workers' safety as it has ever been. A recent report from the Health and Safety Laboratory defined that a safety space (block) measuring 1.25m x 0.8m x 0.7m is the minimum that should be provided to ensure that a worker has a chance of avoiding a possible crushing fatality in the event of the lift "overrunning". The proposal – as we understand it – to allow artificial spaces (trap doors within the lift car) would not provide a suitable alternative as certain maintenance routines can only be carried out whilst outside and on top of the car. On behalf of all trade unions, I have asked the Commission to refuse to allow any amendment to the current Lifts Directive that would lead to serious or fatal injuries to lift engineers by reducing the size of (*or replacing with an artificial space*) the current, long-established, safety refuge area.

### *Stefano Boy*

Notified Bodies play an important role in the lifts sector. Do you think that trade unions should keep the dialogue open with them?

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1 The main issue dealt with in prEN 81-21 :2009 is the reduction of top and pit clearances that may be required due to site conditions.

*Ari Ketonen*

Yes, I do. The activity of Notified Bodies in carrying out conformity assessment procedures can have an impact on working conditions and therefore trade unions should find it of interest to co-operate with them. I think it important to maintain contact with the special group called "Safe working conditions", which mainly works on preparing proposed measures to ensure safe working conditions for maintenance and inspection personnel as well as for rescue operations. This group meets every six months; or possibly three months. Trade unions do not have a direct link with it today, so it would be a good idea to establish some kind of liaison between the Notified Body and the union so that worker safety issues can be dealt with together.

*Mike Smallwood*

I agree. Having that link would clearly be advantageous to everyone involved. There should not be any sides when we are talking about issues as crucial as safety since everyone should be trying to achieve the best safety conditions for the workforce in the sector.

*Stefano Boy*

What are your views on the verification of skills, qualifications and competencies of the lifts sector workers?

*Mike Smallwood*

The problem of ensuring the quality of skills, qualifications and competencies should be addressed at a pan-European level to ensure that only skilled and qualified engineers carry out maintenance and repair work. Unfortunately, these rules and competencies are not covered by the Lifts Directive as such, but only at national level by national regulations. We can propose some kind of European approach of course.

Since my involvement with you and our colleagues, I have a good grasp of how the standardisation system works and what could happen The main aim and objective behind this was, quite clearly, that Europe is a single market place, that the movement of labour has become quite prevalent and what we need to do is ensure that there is a minimum threshold of standards. I understand that we cannot impose a single standard, but, through each of these bodies, we need to reinforce the message that there is a line below which it is unacceptable to go. In some areas - and to be frank it is even like this in the UK - there is no legal requirement that someone who works on lifts must be qualified. All the big contractors and companies make sure that their workers are skilled and have proper qualifications; however. But this can then cause us problems as regards making sure the authorities clamp down, so what we need to do is reinforce the message.

I do not think the general public understands that. When we look at the statistics of how many people use lifts daily, I find it astounding that lift safety is something people never think about. Our job is therefore to reinforce the message, saying 'Look, this is an important step. We must make sure that the maintenance workers installing lifts are fully qualified and skilled.' I think we will get there eventually because legislation is changing in all other areas; for example, an electrician in the UK now has to be fully qualified. They always have been qualified of course, but there is now a legal requirement to sign off their work. They have to be competent. Yet, there is no statutory

provision to sign off work for lift engineers. I therefore feel we should keep pushing the fact that it is in everyone's interest to make sure that the person who installs and maintains a vital piece of equipment has been fully trained, skilled and has the relevant qualifications.

### *Ari Ketonen*

I agree that the qualification should be defined one way or the other. If we look at the situation in Finland, there is a legal responsibility to ensure that anyone maintaining and installing lifts has to be skilled if they are working alone. If they are working in pairs, one of the two has to be skilled enough to guide his partner, but there is a legal requirement that this worker should have the basic level of electrician. In addition they must be specialised in a lift environment. It is totally different when comparing with the UK and many European countries where anybody who understands the principles of lifts can start to maintain them. This is totally unsafe. Working with lifts in shafts is a fairly dangerous environment, even though the lifts are manufactured in accordance with the latest standards.

### *Mike Smallwood*

I think that all the large companies support this line because they do have skilled workers, with qualifications. However, after the massive signs that went up three years ago against anti-competitive behaviour, they are concerned about being seen to voice this together. It is difficult for them because the interpretation will be that they are trying to carve up the market for themselves and keep everyone else out, whereas in reality they are saying 'No, we have to ensure that the standards are indeed at a certain level'.

What also happens is that large companies train all their workers, but some of those then go off and work for other companies who do not do any training whatsoever. This is why we have to push the line that if you are a registered company working in this area, you should have a legal responsibility to ensure that your people are skilled. This is because if an incident or accident occurs, even in countries such as the UK, those companies would be prosecuted if their workers were not skilled. There is somewhat of a contradiction in the fact that a company could be fined, and even prosecuted in a lot of Member States after an event, but there is no requirement in the first place to legally ensure that their workers are skilled.

### *Stefano Boy*

This leads me to reflect on whether we can make alliances with occupational health and safety authorities in each country just to reinforce the message that qualification and training is a priority. Do you think that these authorities can play a role in that?

### *Mike Smallwood*

If they have sufficient people to get involved, yes. Unfortunately, my experience so far is that there are fewer of them now, and they are always chasing things after the event. What may be useful is to create some sort of trade union position paper on the subject. We could put together a draft document to be sent to all the authorities and see what response we get. It would be an interesting exercise firstly to see how many respond and how many want to get involved. If there is no response – well, that could almost be a subject in itself. We could then take this up with

the Lifts WG in Brussels saying 'You are sitting here at the European level. We are all trying to do our best, but when we have tried to engage the Member States in dialogue, we do not even get a response.'

### *Ari Ketonen*

Another good thing would be to do some sort of benchmarking to ascertain what the requirements are in the various EU countries. There are differences for sure. To my understanding the latest improvements in connection with the work of lift fitters and maintenance people have been in France, where *lift fitter* has been recognised as a profession. On the other hand, there are many countries where *lift engineer* is not recognised for any profession. The first step should be for it to be recognised as a profession, then you can start to set up the requirement levels, for example minimum and continuing training, establish what the safety issues are and take care of the legal points.

### *Mike Smallwood*

The industry itself sets the standard, but it is not the industry that is at fault here; it is the actual authorities in the Member States. Again, even in the UK, all of the companies belonging to the employers' federation abide by the union 'agreement' - for want of a better word, because the union agreement sets different levels for different workers. As Ari said earlier, if you are a lone worker you have to be fully competent, fully skilled, etc. Now, that is an agreement that we would like to see become law, so we have almost a two-stage approach. We can find out what the minimum requirement is, and you will probably find some countries where there is none at all, and then see whether there is one standard that people are trying to work towards.

### *Ari Ketonen*

For me it is also very important that the workers are recognised as having a certain skill level. This is important for the personnel, for all workers, to improve their understanding and pride in their work, or job. So it is important in two ways: it improves safety by better training and checking of skill levels and also improves the image of the people concerned.

### *Stefano Boy*

Your reflections can serve to introduce issues like competition and market pressure in the lifts sector. What are your views on the role played by subcontractors?

### *Ari Ketonen*

I think it is included in the package, so it is like what we have in Finland. Sometimes there are exceptions, but normally a company needs to have some nominee, or license holder, in the company management, who actually holds the license to install and maintain lifts. Then it is that person's responsibility to exercise control and ensure that the whole workforce is skilled, whether subcontracted or not, and ensure that there is due compliance with the national or market control people applying these rules.

## *Mike Smallwood*

We quite clearly come under the management of 'health and safety at work regulations', even if the work is subbed out to another party. Whoever was the original instigator of the work still has a legal responsibility for the workers. That is the way we approach it all the time. It is impossible to chase down all of the small subcontractors, but it should be easier to get the main issuer of the contract to keep them in check. If the main contract issuers think they can be prosecuted, they will be more vigilant as to who is getting their work. What happens now, - which I think Ari was touching on - is that work can be given to one company but could then be split down again. For example, KONE (or OTIS or THYSSEN) could say, 'We give a contract to company *x*; company *x* then gives it out to company *y*, company *z*,' and it gets filtered down. Now, does KONE (or OTIS or THYSSEN) bear responsibility just for company *x*, or all of them? We say it is all of them, because in the end, the person who goes on that site or that location is technically working on behalf of the company that gave the work out. This is the only way that you can really keep them in check, because you will find that very few small companies get the large contracts; they usually get fed down from large organisations.

## *Ari Ketonen*

I would add that one reason for splitting work to smaller companies is that if you get a small enough company, only a director and his son for example, it does not need to fulfil all the health and safety requirements. This is the challenge that we face. Basically this should not be allowed to happen. Even if work is split like that, all the safety rules should be respected anyway.

## *Mike Smallwood*

What you also get at the moment, with such a horrendous downturn, is that people are being made redundant but still keep on working within the industry. They will start up on their own and say 'Okay, give us a certain amount of work', and that becomes very difficult to monitor. Again, it is just a matter of keeping on trying. If we can get the qualifications, standards and environment right, everything else will fit into place because people will not be prepared to work for low wages if they have got the correct qualifications and skills. It will mean that those that are working for the lower wage are not qualified. It is quite common for two people to work together, one being a skilled engineer and one being a labourer, mate or what is called an 'improver', which means they are on their way to being trained. These are quite often the ones that get enticed to go and work somewhere else, people with some skills but who are not fully skilled.

I have always been of the view that a little knowledge is dangerous - actually far more dangerous than no knowledge at all. You get people who have worked with a skilled partner, and think the job is easy. It always seems easy when you work alongside someone with a skill, because it is not simply a matter of the job you are doing but the responsibility and the thought process you have to go through. It is those areas that my members complain about all the time, saying 'Look, management does not understand. They think that if you take someone aside and give them six weeks training, that is sufficient,' whereas we have always said it takes a minimum of two years, and after that it takes a further year to start to become proficient - a minimum of three years, and some of these people are doing in the job after six months.

*Ari Ketonen*

Yes, it is very challenging to ensure that training is undertaken properly. In Finland, you have to have basic electrician's skills, and in addition to that you have a two-year training programme, where theory is taught in the first year and the other year is more working on site. This means that you basically have close to five years of training to be a skilled lift engineer in this environment.

*Stefano Boy*

Do you think that a European Works Council dimension can be a tool to make national trade unions aware of the potential benefit of contributing to lifts standards at national level?

*Mike Smallwood*

Yes, I think it is a good starting position, because there are a lot of Member States where trade unions are not well organised but do have a route into a European Works Council. For example, Otis is the biggest one, because it now covers 23 Member States I believe. It is a good vehicle for circulating information. The problem is that in some of the Member States there might only be 20 employees, but it is an inroad. I think it would be interesting to get together a document to circulate, starting with the four main EWCs, send the information out and circulate that to the affiliated unions within the EMF, saying 'Look, this is an opportunity for you guys to organise in your own country, because that is what we are trying to do as well.' If we can say to them that there is an issue here, there is a chance that we will start to get organised.

*Ari Ketonen*

The participation of trade unions in the national "mirror" committees associated with the "European" CEN TC 10 is important, because their work could reinforce the position of an EMF expert in the CEN TC 10. I think we should use the national trade unions to start a dialogue with their respective National Standard Body (NSB) - AFNOR in France, BSI in UK, UNI in Italy, etc. - and nominate one member to these national committees. This "mirror" committee, as you know, not only follows the CEN work but is also responsible for giving comments on draft standards. If we were to get some of the shop stewards that are involved in the field of safety, and the health and safety representatives from the lift companies, nominated to those committees by each country, this would mean that we would have people looking after safety issues on the national committees from the workers' side and would contribute considerably to better cooperation and discussions. When it comes to the voting decision - whether to keep the comment or just vote that a specific proposal is a good one - we might then have more impact. The production process of standards is long, but at least there is always the possibility of participating in the decision–making process, at the right place and with the right stakeholders, so people can get an understanding of what is at stake. It takes some time, but it is a good thing to use the EMF and then the national trade union processes. So, to get the members sitting on these mirror committees is primordial in my opinion.

*Mike Smallwood*

Yes, I agree. I was taking Stefano's question as being more about countries that are not organised; meaning that is where we could use the EWC because it is the only vehicle. If we are talking about countries that are already organised, yes, there are two routes: there is the EMF or the affiliates in each of the countries. However, in countries such as Norway, for example, the lift engineers are electricians, and come under an electrical trade union, which is in a different sector to the EMF. This is only a minor point but that is reality, so I do not know. Perhaps, we could do this in tandem, that is to say through the EMF but also through the ETUC.

*Ari Ketonen*

I think the ETUC might be better, then we have the EMF on the one hand and can also combine the other sectors, and there are no borderlines between the countries in this case.

*Mike Smallwood*

I agree, doing this through the ETUC would give us greater coverage, but the EMF should do the circular. Then, if we plan to ask the ETUC to send it out also, the EMF retains the initiative, and then people will get it from two sources. Also the ETUC letter should include a cover letter saying that it was part of the EMF Lift Group, and referring to our conference at Elewijt, etc, because that is where we gave the commitment that we would keep the representatives involved.

*Ari Ketonen*

One of the important safety aspects that I have come across in the last two months is that most workers' safety issues come under health and safety laws, and these are valid. The latest laws should be followed today even when a lift was built in the 1920s. The worker safety issue should be in line with that; but this is not the case in Europe and it is not controlled by anybody. Health and safety authorities typically inspect one unit and make a proposal for corrections, but there are similar units on the same corridors and these they do not look at. Nobody is making those improvements, so the health and safety organisations around Europe should be used more than just the Lift Group, because they are the technical partner in that sense.

*Mike Smallwood*

I support that. A lot of the plans for lift modernisation are being put on hold in all Member States because of the global credit crisis and new builds are being shelved. Therefore what we have to do is to get people involved in this, to say there is a commitment here. This is the only industry where an engineer can go out in the morning and work on something that can be 120 years old or simply two years old. This is a huge range, and the whole ambit of the revised directives was to bring all the lifts up to a particular standard. I do not think the safety norm for existing lifts is being complied with everywhere because the financers have said 'No, we cannot continue with this". There are a lot of areas here for which we could get some campaign going to say there should not be a cost put on health and safety. You cannot just stop things because someone decides it is uneconomic. It is a bit like training – training is often the first thing to go when finances are tight.

*Ari Ketonen*

Two weeks ago, lift company representatives from Finland were sitting in the Finnish Parliament with a couple of members of parliament discussing safety issues and we found out that there appears to be an illegal situation regarding worker safety issues in most countries, even Finland. We made an official request to the Finnish Government just before the holiday season, and are waiting for an answer as to what government actions are needed to start with to follow Finnish law. The working environment should be fulfilling the latest requirements, and that is not the case.

*Mike Smallwood*

I heard, for example, that there was a strike in Madrid because they started to make people redundant and the unions there considered that this was unacceptable because there was still unfinished work. There was a protest, part of which was bringing to the public's attention that there are these things called lifts. I think this is what happens all the time. No one thinks about lifts and safety until someone puts a sign on saying 'Lift out of order'.

*Ari Ketonen*

That is true. You believe that it is public transportation and it is safe to be used.

*Mike Smallwood*

Yes, everyone expects when they get on a train or a bus that it has been fully checked, maintained and everything. When you get in a lift you can also expect it, but once the lift gets to a certain age it needs modernising to bring up the standard. Who is responsible for that? Well, it is the building owner, and if the building owner says he cannot afford it, he will try to cut corners. The lift companies themselves may say 'Well, I condemned this lift; this lift is not fit for the purpose,' but legally the building owner can ignore that notice and keep the thing running. There are a lot of areas here that we can campaign on, Stefano.

# A TRADE UNION LOOK AT THE LIFT SECTOR

# EMF/ETUI cooperation for safety in lifts: background, achievements & recommendations for further union action



Part II

## *Background*

As stated in the introduction to this brochure, the fact that essential elements of the day-by-day activity of metalworkers (procedures, standards, equipment) are regulated at European level in directives and standards explains the interest of EMF and ETUI to work together so as to combine the economic and social interests of metalworkers represented by EMF, on the one hand, with the experience accumulated by ETUI within the legislative and technical framework regulating machinery and lifts in Europe.

To integrate workers' concerns into legislation and standardization in the lift sector requires collecting workers' knowledge at national level and channelling it into the appropriate European bodies. With this perspective, our cooperation started by ensuring a trade union permanent contribution within the Lifts Working Group, supervising the application of the Lifts Directive (95/16/EC), and the CEN Technical Committee 10 *Lifts, escalators and moving walks (TC10),* elaborating European standards and interpreting the directive's technical requirements.

To achieve this goal, EMF and ETUI created a task force consisting of national trade unions from the lift sector representing the major companies operating in Europe. The task force was intended to represent a "health and safety lift observatory" in charge of collecting lift workers' claims and concerns, elaborating this information, making it visible to the European Commission and CEN, and providing the Notified Bodies with "fresh" feedback from the lift workforce on selected health and safety priorities.

The EMF Conference on the elevator industry held in November 2003 paved the way for a new approach to workers' concerns and needs in the lift sector. Today, EMF can rely on a number of experts – mainly recruited through the European Work Councils – who can provide "technical" support to future joint EMF/ETUI initiatives. These experts come from the biggest lift companies. General engineering and maintenance are among the areas of expertise covered.

The EMF/ETUI Lift Task Force met regularly until February 2009. Its activity over the years has benefited from the nomination of two EMF experts as trade union observers in the legislative (Lift Work-Group Committee) and standardization (CEN TC 10) Bodies covering the lift sector.

## *Some key features of the lift sector*

When getting on a train or a bus everybody expects that it has been fully checked and maintained to ensure its safe use. People using lifts have the same expectations, even if the lift shows its age, but it is only when lifts are 'out of order' that most people acknowledge their existence and the importance of their safe operation. Lifts provide an essential means of comfortable and safe access to modern buildings, and the provision of lifts in new buildings and the installation of lifts in many existing buildings have an increasingly important role to play in an ageing society giving the growing priority to the social integration of people with special needs.

Very few people fully understand the complex legal and technical environment surrounding lifts in Europe. Many actors play a role, at national and/or European level, but two groups of people risk their lives when things go wrong: the public and the people carrying out inspection and maintenance work on lifts.

The safety of people *using* lifts and those *working* on lifts, however, depends on a complex web of requirements and procedures.

A *European directive contains* legal requirements for the design, installation and placing on the market of new lifts and safety components for lifts, and sets out the conformity assessment procedures to be followed by lift installers. The harmonised European legislation governing the design, manufacture and installation of lifts has been fully in force since 1st July 1999. It has the double aim of permitting the free circulation of lifts within the internal EU market and ensuring a high level of safety for lift users and maintenance staff. It is the working environment of maintenance staff that has been in the forefront of the EMF discussions following several major accidents and incidents that have resulted in serious injuries and fatalities.

The technical requirements of the Directive are concretized by standards developed by CEN TC 10: EN 81-1 & 2 covering electrical and hydraulic lifts, while other parts of the EN 81 series cover other types of lift and particular requirements for lifts.

Although application of the standards is voluntary, once the references of these standards are published in the Official Journal of the European Union their application confers a presumption of conformity with the essential health and safety requirements they cover. Given this legal value, there is an interest for workers to ensure that the standards adequately concretise the legislative requirements, especially when it comes to safe design and worker protection.

Member States have two major responsibilities in lift regulation:

1. They must evaluate, approve and monitor the Notified Bodies appointed to carry out the conformity assessment of lifts.
2. They have the duty to check a) the real compliance of installed lifts and safety components placed on the market and b) the standards quality.

The other side of the coin is represented by existing lifts, whose safety is the exclusive responsibility of the Member States. A specific standard was issued by CEN in 2003 to provide a guideline for the improvement of the safety of existing lifts (EN 81-80).

Interestingly, the Lifts Directive technical requirements mainly deal with the safety of *passengers*, while the risks for inspection and maintenance *workers* are essentially covered by the requirements of the machinery directive (therefore several machinery standards are also relevant to lifts).

But the safety and health of the workers in the lift sector is also dependent on their qualifications, competency and skills. These elements are covered by national regulations which differ significantly across Europe. The trade union priority is to ensure that only skilled and qualified engineers carry out maintenance and repair work.

## Market overview

World production and installation of new equipment exceeded 500,000 units in 2008, including 45,000 escalators and moving walks, whereas existing lift installations numbered 9,000,000 throughout the world in 2008, i.e. 1.25 lifts per 1,000 inhabitants.

There are more than 4.5 million lifts in use today (2008) in EU and EFTA, and more than 90,000 escalators and moving walks. The industry has two main areas of activity:

a) The production and installation of new equipment in new or existing buildings.

b) The maintenance and modernization of the equipment already installed.

Modernising old lifts and bringing them up to adequate standards is primordial, but who is responsible for that? Generally it is the building owner who is responsible for keeping the lift 'fit for purpose', but this carries some costs, and often building owners face economic constraints that might result in a tendency to "cut corners".

In this connection, the role of the lift companies appears to be limited: the safety upgrade of old equipment to adequate standards necessitates a legal frame, but even this is frequently disputed by building owners' lobbies. The EMF is of the opinion that the communication between the lift companies and lift owners could be more open. Very often there is no real provision of information about safety issues from lift owners to building owners. It is usually the commercial issues that are discussed and workers' safety issues are hardly ever talked about. Legally, workers' safety requirements are compulsory issues and the same rules have to be followed for new and old lifts. Technical issues may follow the requirements valid at the date of origin of the lift.

In Europe, four companies each represent over 10% of the market, 10-15 medium-sized companies each represent over 1% of the market, and there are over 3,000 small companies. The smaller companies are generally not in the escalator business.

There are about 150,000 persons directly employed in Europe by the lifts industry and approximately 60% of this workforce is involved in field activities: installation, maintenance and modernization.

## Accidents at work

The lift sector has always been a risky activity for workers and serious accidents have marked its evolution ever since the first appearance of this equipment in the late nineteenth century.

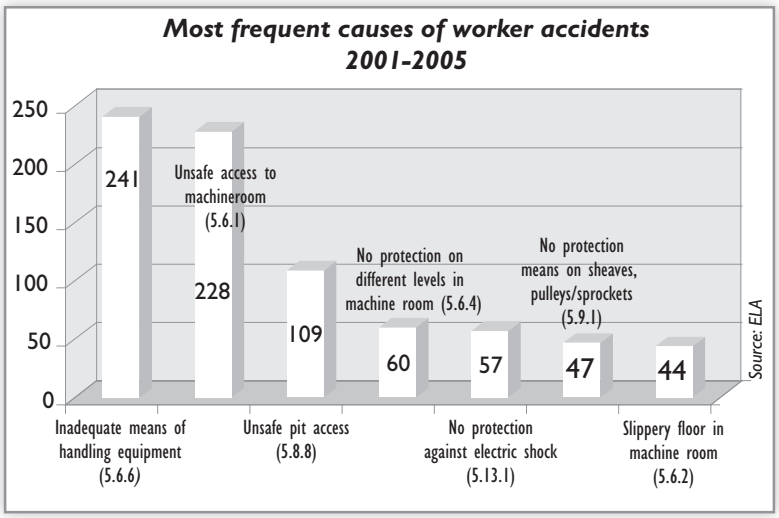
The reported figures of accidents are few and they are not systematic. Some databases concerning accident statistics have been made available by the European Lift Association (ELA). Although the figures are still incomplete, they permit us nonetheless to draw some analysis of the causes and circumstances of accidents in this sector. What do these statistics show?

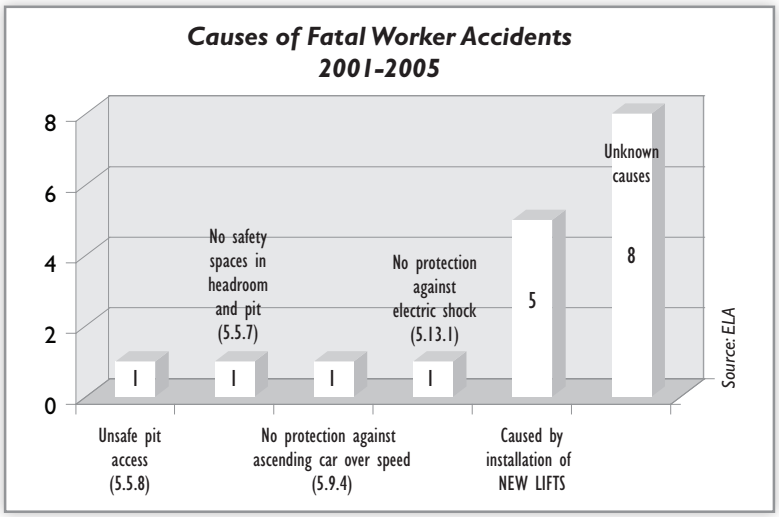
Accidents during maintenance operation, which is the essence of the activity of lift mechanics, are the most numerous. These accidents, fortunately, are rarely fatal, but can generate serious injuries and frequent hospitalization.

Trade unions are interested in how maintenance planning/frequency is regulated in the Member States. Some of them have integrated the number of maintenance visits into national legislation, but the maintenance companies/manufacturers generally make plans based on the use, technical

solutions and environment best suited to their needs. The maximum number of visits is 12 per year and the minimum is one visit.

The majority of accidents are caused by insufficient access to lift premises and falling from a height, then there are accidents related to the manipulation of mechanical parts or crashes.




*Courtesy of ELA*

Working with lifts in shafts is quite a dangerous environment, even though all recent lifts are made based on the latest standards. There is no EU legislative frame to regulate the maintenance and inspection procedures. This is done by the Member States, but there is no common view, nor guideline, on how to define the qualification of lift workers and frequently there is no requirement to legally ensure that the workers are skilled.

Large companies train their workers, for combined reasons of efficiency and personnel safety, but also to limit the risk of prosecution in case of accident if their workers are not skilled. At the same time, there is an increased trend towards subcontracting the installation work to smaller organizations with a limited amount of technical training.

The EMF is interested in the establishment of an EU database on lift incidents and accidents. Bigger companies have some form of data collection, but the question is raised about the collection of information regarding accidents among subcontractors. In general, the contracting company should collect all incidents and accidents involving subcontractors. In France there is a common lift accident database required by the French Government. It can be comfortably said that this follow-up has a positive impact on improving the safety of the lift workforce.

## *The legislative framework covering new lifts*

New lifts are covered by the *European Parliament and Council Directive 95/16/EC of 29 June 1995 on the approximation of the laws of the Member States relating to lifts,* whose provisions became mandatory as of 1st July 1999. This directive belongs to the legislation based on the principles of the New Approach, which provide for CE marking.

### Main features of the new approach

The European Union has been enlarged to 27 Member States, which means that the EU's overall population, and thus consumers, has progressively grown to almost 500 million. Trade in goods and services within the EU have grown, and will continue to grow accordingly. The same will apply for competition and, finally, the overall economy of the EU will grow as well.

Free movement of goods is a cornerstone of the Single Market. The creation of the Single Market by 31 December 1992 could not have been achieved without a new regulatory technique that set down the general essential requirements, reduced the control of public authorities prior to a product being placed on the market and integrated quality assurance and other modern conformity assessment techniques.

This new regulatory technique and strategy, aiming at

- ensuring the free movement of goods throughout the EU,
- while guaranteeing a high level of protection of public interest objectives
- and not generating barriers to innovative concepts and new technologies,

was laid down by the Council Resolution of 1985 on the New Approach to Technical Harmonization and Standardization, later completed by the Council Resolution of 21.12.1989 and Council Decision 93/465/EEC defining a Global Approach to Certification and Testing, stating the principles and detailed Procedures for Conformity Assessment that are to be used in New Approach directives.

These Council Documents established the following essential principles:

- Legislative harmonization is limited to the essential requirements that products placed on the Community market must meet. These requirements deal in particular with the protection of the health and safety of users (usually consumers and workers) and sometimes cover other fundamental requirements (for example protection of property or the environment). Essential requirements must be applied as a function of the hazard inherent to a given product. Therefore, manufacturers need to carry out risk analysis to determine the essential requirement applicable to the product. This analysis should be documented and included in the technical documentation.
- The technical specifications of products meeting the essential requirements set out in the directives are laid down in harmonized standards. Application of harmonized or other standards remains voluntary, and the manufacturer may always apply other technical specifications to meet the requirements.

However:

- Products manufactured in compliance with harmonized standards benefit from a presumption of conformity with the corresponding essential requirements.
- Before placing a product on the Community market, the manufacturer must subject the

product to a Conformity Assessment Procedure provided for in the applicable directive with the view to affixing the CE marking.

- Third party conformity assessment is carried out by Notified Bodies, which have been designated by the Member States among bodies that fulfil the requirements laid down in the directive and are established on their territory.
- Member States are obliged to take all appropriate measures to prohibit or restrict the placing on the market of products bearing the CE marking, or to withdraw them from the market, if these products might compromise the safety and health of individuals or other public interests covered by the applicable directives

Market surveillance is an obligation of each Member State, which must make sure that all the parties involved in the placement in the market of lift products abide by the rules set up by the Directive and that all products must be in compliance with the Essential Safety Requirements according to one of the available Conformity Assessment Procedures.


## Directive 95/16/EC, the EU regulation for new lifts

### *The legal basis of the Lifts Directive*

The legal basis of the Lifts Directive is provided by Article 95 of the EC Treaty that enables the Council to adopt measures to harmonize the legislation of the Member States in order to ensure the establishment and functioning of the internal market. Such measures must be based on a high level of protection of the health and safety of people and of the environment.

The Lifts Directive thus has a dual objective: to permit the free movement of lifts and safety components for lifts within the internal market whilst ensuring that such products provide a high level of protection of the health and safety of people.

### *Scope*

The Lifts Directive 95/16/EC is in line with the objective of the completion of the Internal Market begun in 1985 and ensures freedom of movement for all types of lifts within the European Community by laying down binding essential health and safety requirements and making reference to the optional application of harmonized standards as a means of complying with them.

The scope of this Directive concerns only new lifts and their safety component parts when these products are made available for the first time in the Community market. It gives lift installers and manufacturers of safety components for lifts a wide choice of conformity assessment procedures that makes it a good example of the application of the "Global approach to conformity assessment".

There are some provisions of the Directive that might be of particular interest for the workers, such as Article 6 setting up a **Lifts Directive Standing Committee** which has to support the Commission in the implementation of the Directive. This committee mainly provides guidance to Member States and other stakeholders to promote the uniform reading and interpretation of the obligations of the Directive, or promotes cooperation between the Member States or between the Notified Bodies. These guidelines, which are obviously subject to the sovereign interpretation of the national jurisdictions and, if necessary, of the Court of Justice of the European Communities in Luxembourg, are not legally binding but are useful since they promote uniform understanding and application of the Directive without the need for lengthy and costly legal procedures.

The above committee, referred to as the Lifts Committee, is chaired by a representative of the Commission and is made up of representatives designated by the Member States through their Permanent Representations. Within this Committee, Member States and the Commission have also the possibility to challenge the level of safety given by any of the applicable harmonized standards if this level is considered to be inappropriate.

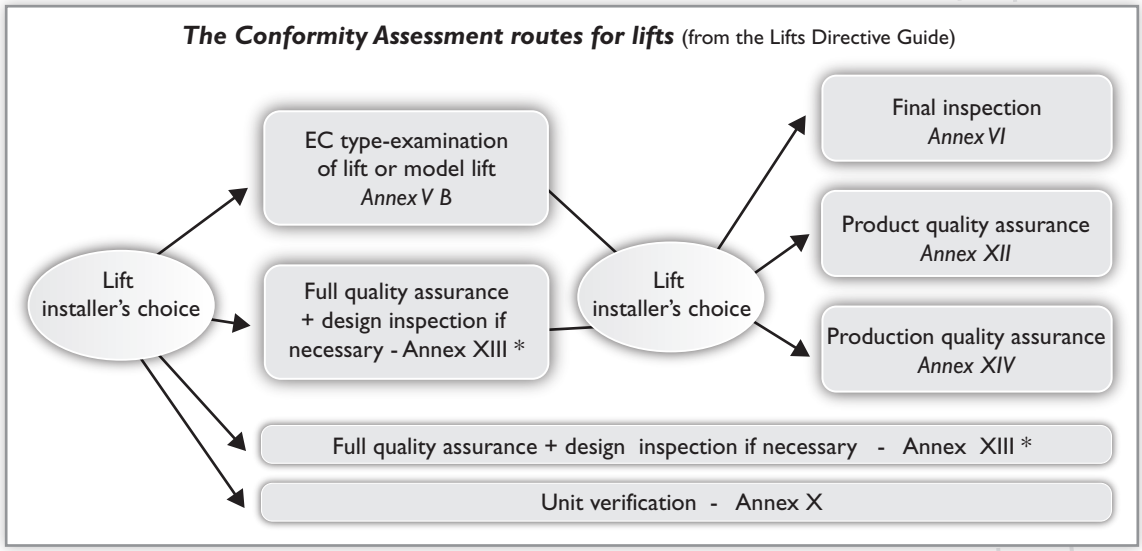
A **Lifts Working Group** has been set up under the Lifts Committee to allow observers from industry, standardisation and the Notified Bodies to take part in the discussion of problems relating to the practical application of the Lifts Directive. *This is where trade union representatives contribute to a better understanding of the problems being faced by the field workers of the lifts industry. Here they have also the possibility to highlight any potential hazards for the workers that might have been somehow overlooked, or even ignored, albeit in good faith.*

This Committee is the forum where reports and feedback from lift trade unions can be channelled and brought to the attention of lift stakeholders by an EMF member. National authorities attending the Lifts Committee might possibly support EMF actions at national level, whereas trade unions might help authorities to better deal with market surveillance and conformity issues. Examples of sensitive issues could be: competence and education of subcontractors, schedule of periodic inspections and monitoring of maintenance activities. In all these aspects, authorities and employers should be convinced of the win-win approach to reach mutual benefits.

The Lifts Directive, via the application of the Safeguard clause given in Art. 7, also provides the Member States with the possibility to appeal against products that were considered to present a substantial risk in the course of the Market Surveillance investigations. These binding measures, which can lead to the removal from the market of such inadequate products, are to be applied only if the entity responsible for their placing in the market does not voluntarily agree to modify them in order to comply with the applicable safety requirements.

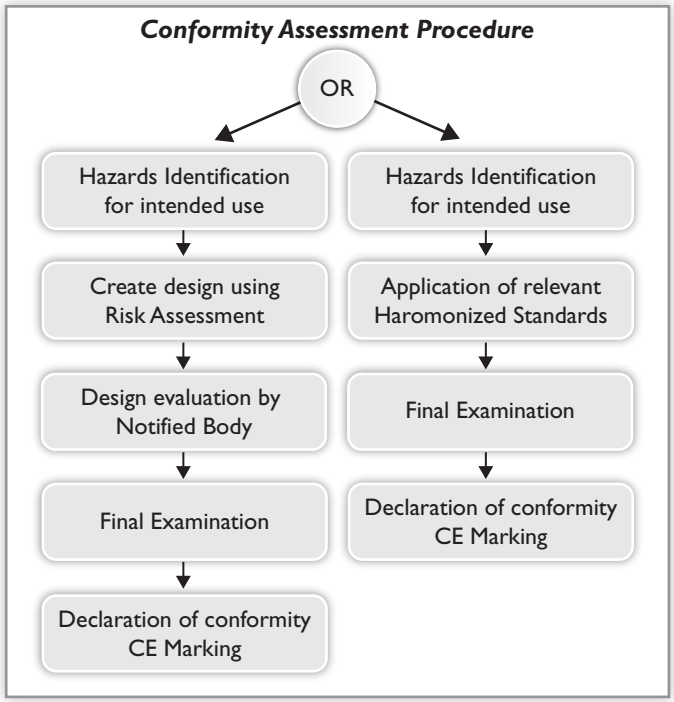
## *Conformity Assessment Procedures*

All the Conformity Assessment Procedures allowed by the Lifts Directive are listed in Art. 8. They are available to the free choice of the lift installers, as shown, specifically for complete lifts, in the diagram below.




The parameters of the Conformity Assessment Procedure for lifts are:

- The **Safety Objectives**, defined by specific Essential Safety Requirements (**ESRs**)
- The **Harmonized Standards** (optional), representing the state of the art for safe design
- The **Notified Bodies**, as independent and competent "third parties"
- The **Declaration of Conformity**
- **CE Marking**



## *Essential Safety Requirements*

The lift must be designed to guarantee adequate safety, considering the risks that might originate from the "intended use" of the lift but also from "foreseeable misuse", which should never be ignored as it might be caused by unexpected situations that are part of the working life. In this respect, the lift installer must identify, assess and provide adequate design for all possible hazards and risks inherent to his product.

To assist the designer, the Lifts Directive (Annex I) identifies a number of Essential Safety Requirements (ESRs) specific to lifts, intended for the protection of normal and disabled users, and of the workers performing their activity at the lift whether this be for routine maintenance, for rescuing passengers or for the installation, replacement or repair of worn parts.

In addition, the more generic ESRs listed in the Machinery Directive and considered relevant to lifts are also applicable. In particular the ESR 1.1.2 of the Machinery Directive - which is identified as "Principles of safety integration" and shall always be applied to lifts – provides a very good summary of all the safety tasks to be performed when designing, manufacturing, installing, maintaining, repairing and dismantling any machine, including lifts.

If ESR 1.1.2 – which can be considered as a complete set of safety requirements covering very many aspects of the product – is correctly applied, all the risks that might be incurred by the workers involved in lift operations would be properly covered. In fact, however, it is actually a different understanding of the appropriate implementation of this specific ESR that is still causing debates about the open issue concerning those lifts with reduced safety spaces in the headroom.

Compliance with the ESRs (whenever applicable) is mandatory. However, their formulation as "safety objectives" cannot always be very precise, which leaves room for interpretation. Also, the Risk Assessment and the identification of the acceptable risk level for a design are subject to possible misjudgement. This is why the correct identification and implementation of these ESRs leaves more and more room for appropriate actions and contributions by the trade union representatives, who might find any improvement that might positively affect the level of safety for the multitude of workers that they represent quite rewarding, and highly appreciated.

## *Complying with the Essential Safety Requirements - New risks for lift maintenance workers*

The Lifts Directive is a New Approach Directive and – as such – it specifies only the *safety* objectives to be achieved, i.e. the Essential Health and Safety Requirements, but it does not require that products have to comply with the specifications of the relevant Harmonized Standards.

With the implementation of the Lifts Directive, most lift manufacturers decided to take advantage of this new opportunity and started developing new lift products that tend to deviate more and more from the specifications given in the relevant harmonized safety standards. It is sufficient that the products deviating from the standards provide a level of safety at least equivalent to that provided by compliance with the harmonized standards available.

The impact of this approach is extremely important as it allows the development of new, advanced products so that the introduction of new technologies, for instance, is now possible - something which was actually more difficult according to the rules enforced in most countries in the past.

Theoretically, there is no reason to be worried about the proliferation of such new products in the market, but the 10-year long experience with this new situation leads us to acknowledge

some consequences that seem already to have a certain negative impact. This is especially true concerning the working conditions of the personnel employed in the lift business, specifically those who deal with the installation and even more so those who deal with the maintenance operations in the new types of lifts.

Undeniably, the amount of accidents or fatalities in the lift business has always been quite low due to the presence of reasonably safe precautions specified by the existing safety standards.

However, some new type of lifts recently placed on the market do not appear to guarantee an equivalent level of safety due to the fact that the procedures followed for the Risk Assessment to evaluate the expected level of safety are not based on precise algorithms but on subjective comparisons that might overlook some important issues and might lead to wrong conclusions.

As many other businesses, the lift sector is characterised by increasing pressure to achieve a sufficient competitive edge over the other competitors, to improve profits and gain market share. As it is not commercially advisable to cause any reduction in the safety of users, this competitive edge is too often achieved by introducing technical solutions which could be of a nature that does not adequately address the level of safety of the operations carried out by inspection, maintenance and emergency rescue personnel.

Let us examine some specific cases in order to better understand what drives some of the new developments and what the foreseeable consequences are.

### *New lift products: an open door to unsafe working conditions*

Among the parties that are quite interested in the implementation of new lift solutions which deviate from the harmonized standards, a prominent position can be assigned to: architects, consultants, builders, developers, lift companies, owners and workers.

- Architects and consultants would very much like to be proposed lift solutions that reduce the need for extra space in which the lift equipment needs to be located. A reduction in the overall height of the technical volumes would also help to make the building design more flexible, pleasant and possibly efficient.
- Builders and developers are interested in making efficient buildings at reasonable costs. A reduction in "wasted volumes" is very much appreciated - no matter what the real consequences are.
- Lift companies are happy to place in the market products that give them a competitive edge both at the time of the initial sale and later on in the after sales service.

In this picture there are two categories which mostly bear the consequences of the initial decisions: final owners and workers.

- Final owners are only seldom involved in the process of defining the type of lift to be installed in a certain site, but they are always affected by the consequences of the selection made by others. This is extremely important, especially in terms of future responsibilities such as safety issues and costs for the after sales services (maintenance, repairs, etc).
- Workers are the weakest link in the chain and bear the consequences of the fierce competition in the lift market that leads to the cutting of costs and spaces to improve the competitiveness of products, too often at the expense of the level of safety of their working conditions.

Looking now at some of the proposed new products, we can focus on the **new lifts with extremely reduced safety spaces on top of the car** and on the **Machine Room Less lifts (MRL)**.

As regards the installation in new buildings of lifts with extremely limited safety spaces above the car when it is at its extreme top position of travel, the Lifts Directive indicates, in Annex I – item 2.2, that the safety or refuge spaces at the extreme positions of the car shall be permanent, whereas the possibility to use alternative means is left to the decision of the relevant Member State.

Nevertheless, there are already on the market quite a number of lifts providing reduced safety spaces at the top of the car that are claimed to be permanent as specified by the Lifts Directive and at least equivalent to those available when the harmonised standards are applied.

In reality, these reduced top safety spaces appear to be very far from properly complying with the relevant requirements as given in the lift standards. This situation is caused by the fact that a manufacturer decided to develop a product with very limited safety spaces, requiring less room in height, which has a major appeal to the decision-making parties such as architects and developers.

We are speaking here about new lifts assuring only 0.5 m clear free height above the car roof instead of 1.0 m as specified in the relevant harmonized standards EN 81-1 and EN 81-2.

This solution, which most likely does not take into full consideration the potential consequences for the working conditions of the maintenance operators, has been considered acceptable and certified by a Notified Body, although many other Notified Bodies do not seem to fully agree with this position.

An investigation carried out by the Health and Safety Laboratories (HSL), under a mandate given by the EU Commission, seems to support the proposed solution, which is based on the use of additional safety devices. This is questioned by many other interested parties, because the additional safety devices cannot guarantee the same level of safety as the permanent means specified by the Lifts Directive.

The EU Commission gave a mandate to the HSL to investigate the case but it did not take a clear position on the subject: if "permanent" spaces are to be preferred, alternative solutions supported by a good design could also be considered. Consequently, the Commission asked CEN TC10 to investigate the corresponding clauses of the EN81-1/2 and the NB-L (Coordination of Lift Notified Bodies) to issue a Recommendation for Use (RfU) describing the parameters to follow in the event a lift installer decides to deviate from the requirements of the standard.

To date (end 2009):

- CEN TC10 has reviewed the sizes of the "safety volume" (variable dimensions and positions depending on the sizes of the car roof and pit). This new formulation will be proposed for the ongoing revision of the standard
- The NB-L has not been able to agree on the formulation of an RfU, and is currently working on a "Position Paper" limited to "defining criteria for acceptable free space equivalent to those described in EN 81-1/2 clause 5.7".

Issues such as these limited free dimensions to be defined for pit and headroom safety spaces would certainly benefit from adequate feedback or other contributions provided by trade union experts.

It is now practically certain that the Lifts Directive will undergo a revision and that Article 2.2 concerning safety spaces will be one of the subjects of debate.

There is pressure from industry to revise the Lifts Directive to allow artificial safety spaces on new lifts. Trade unions are against changes to the directive in this respect, as they put the life of the lift sector workers at risk. On the other hand, trade unions are pleased to contribute to the debate as to what should be the minimum size of such permanent safety space. In this connection, the Health and Safety Laboratory (HSL) has published a study on Technical assessment of means of preventing crushing risks on lifts subject to Directive 95/16/EC - Report No. ME/07/07.

The trade union view is simple: workers' safety must have the highest priority. First of all, the permanent safety space is vital for the workers' safety in the lift shaft. There are many artificial solutions to technically creating safety spaces, but they depend on the procedures to be followed and on the training needed. Since every manufacturer has a particular preferred system design, the associated working system and procedures are consequently different. Maintenance companies generally work on lifts from different manufacturers. This requires additional competence in order to be able to maintain such a variety of systems and procedures, but with an accompanying high risk of misconceptions and misuse resulting in incidents and accidents.

A second critical topic concerns solutions such as the **Machine Room Less (MRL) Lifts**, which open up the possibility to reduce the amount of building volume to be dedicated to the placement of the lift equipment. This represents such an important advantage that many lift companies were immediately led to develop their own proprietary solutions.

MRL lifts today include lifts with very different technical solutions, each of which requires specific procedures for installation, maintenance, inspection and rescue operations. These procedures must be collected in the manuals that accompany each lift, to be given to the lift owners, who in turn will put those manuals at the disposal of the organisation in charge of the lift maintenance. In this connection, there is evidence that such manuals are very rarely given to lift owners or – when given to them – they are incomplete and of poor quality.

There are economic reasons for this situation. On the one hand, lift owners are not obliged to rely on the lift installer for the maintenance operations: they can task this service to other service providers. On the other hand, lift installers are reticent to share with others knowledge representing their particular know-how and the source of their economic income. As a result, lifts that are not followed by the original installer are very rarely equipped with complete, high-quality maintenance manuals.

This has a direct impact on the working conditions of those carrying out maintenance service. In fact, the risk assessment to be carried out by maintenance personnel before operating on a lift in service cannot be exhaustive without the information contained in the proprietary maintenance manuals, and this is especially true for MRL lifts due to their wide design differentiation.

As an example, the absence of high-quality maintenance manuals raises the problem of how the maintenance and emergency rescue operators would be able to correctly and safely operate in the various different conditions. For these lifts it is very important that all the necessary tools and instructions are permanently present at the lift site in order to enable the maintenance personnel to carry out all the necessary safety checks. Lack of these tools and instructions might cause the maintenance personnel to adopt practices that could lead to very unsafe situations for themselves and for the users. In this case, the installing company has to be blamed for any possible consequences if it did not provide the owner with the required equipment and documentation.

In connection with rescue operations, it should be stressed that there is always a lot of pressure on the operator who has to rescue trapped passengers because they are frightened and want to be freed as quickly as possible. But if it is not perfectly clear to the operator which type of lift is the one in which the passengers are stuck and, even worse, if the necessary tools and instructions are not readily available on site, he might be bound to follow procedures that are not the most appropriate even if they seem to be much quicker. In particular, the absence of the necessary tools and instructions readily available on site puts the worker in the uneasy situation of having to decide:

- if it is better to wait for the necessary tools to be made available or
- if it is better to try to rescue the trapped passengers immediately, with whatever tools he has available on site and in whichever way he thinks this possible.

Even if the correct course of action would be the first one, the rescue worker very often takes the second one as the pressure coming from the trapped passengers would lead him to refrain from causing further delay. This pressure to act quickly without the correct tools and instructions is very risky: if an accident happens, the blame will be on the operator for his "human error" in not following the correct procedures, and not on the companies that did not make the necessary tools and instructions readily available on site.

The lack of availability on site of the necessary tools and instructions to carry out rescue operations is mainly caused by economic reasons and by a desire to make it more difficult for a competitor to take over the maintenance business for these MRL lifts from the original manufacturer.

In this connection, trade union experts could provide advice to all the parties involved in order to make them understand the risks arising from such wrong behaviour and then agree to provide safer working conditions for the maintenance and rescue operators, whatever consequences this might have in the after sales business, such as accepting more open competition among maintenance service providers.

### *Notified Bodies*

It needs to be clearly understood that all the Conformity Assessment Procedures, both for safety components and for complete lifts, require the direct or indirect involvement of a Notified Body for Lifts (NB-L), which is a specialised, competent organisation entrusted to assess the conformity of all lift products with the requirements of the Lifts Directive.

Notified Bodies are selected and authorised at national level and their competency is notified to all the other Member States and to the EU Commission, which in turn acknowledges this notification and includes their reference information in the European list of NB-Ls. This list is then both officially circulated to and published on the web site of the EU (NANDO - New Approach Notified and Designated Organizations - Information System) and regularly updated.

Although the Notified Bodies are selected at national level, due to the mutual recognition embedded in the notification procedure, their competence is acknowledged and accepted in the whole of the EU.

The Notified Bodies assess not only the conformity of lift products according to the relevant Annexes IV, V, VI and X, but also the conformity of the lift companies' Quality Management System according to the relevant Lifts Directive Annexes IX, XI, XII, XIII and XIV, and issue the appropriate Certificate of Conformity.

In order to facilitate the most uniform behaviour and the most correct approach of all NB-Ls to the assessment of conformity with the Lifts Directive requirements, the EU Commission sponsors regular meetings for the Co-ordination of NB-Ls, which take place twice a year. Participation in these co-ordination meetings is open to all NB-Ls that wish to attend, and to a representative of the Commission (normally the person chairing the Lifts Committee). Participation is also open to observers invited from the industry, the CEN standardization body and other interested parties.

The importance of NB-Ls is extremely high, as they are the only organisations which routinely make sure that all the lift products placed in the market are in full compliance with the requirements of the Lifts Directive, independent of the availability of suitable harmonized standards to cover the specific needs of any particular application.

NB-Ls face all sorts of special situations, even those for which the specifications given in the standards do not seem to be readily applicable: here NB-Ls have to assess whether the solutions proposed by the installers do effectively guarantee a sufficient and acceptable reduction of the possible risks.

An important means to circulate such specific solutions and other more general issues are the so-called Recommendations for Use (RfU) that collect all the decisions taken by the Coordination Committee, in due order and format. To give even more value and importance to the RfUs after approval by the NB-L, they are submitted to the Lifts Committee to be endorsed and published on the EU website. All NB-Ls in the EU are expected to follow the RfUs that have been approved.

An interesting initiative of the Notified Bodies Coordination for Lifts (NB-L) has to be mentioned, namely the Ad Hoc Working Group "Conditions of Work" created in 2001 to "prepare proposals for measures to ensure safe working conditions for maintenance and inspection personnel as well as rescue operations as far as they are influencing the design and the construction of lift installations and therefore being part of the conformity assessment procedure and are not sufficiently described in harmonised standards."

The involvement of trade union representatives as observers in the NB-L meetings would enable them to provide the necessary and knowledgeable feedback to all the discussions relevant to risks concerning the conditions of work of employees in the lift business. Issues such as limited free dimensions to be defined for pit and headroom safety spaces, and the issue of the behaviour towards and safer worker conditions for maintenance and rescue operators, would certainly benefit from adequate feedback or other contributions provided by trade union experts. It might enable these issues to be more appropriately analysed and brought to a widely accepted solution.

As indicated, the Notified Bodies are key players in the application of the Conformity Assessment Procedure of the Lifts Directive, and the NB-L is an essential tool for the harmonization of the understanding of the procedures.

The performance of the NB-L is not unsatisfactory overall, but considering the present legal environment within which the Notified Bodies operate, there is certainly room for clear improvement.

- Notified Bodies operate as commercial entities and are susceptible to compete with each other: this does not facilitate finding consensus on delicate issues
- The notification and criteria for notification are the Member States' responsibility: Currently, different requirements for notification exist in the different Member States. This creates the perception of inequality as regards the competence levels of the Notified

Bodies. This also explains the large number of Notified Bodies in e.g. Italy, many of which are not involved in NB-L work.

- Notified Bodies do not apply conformity assessment in an identical manner.

All this has been recognized by the EU Commission, and the reconsideration of appointment and operation of the Notified Bodies constitutes a large part of the "New Legal Frame" (revision of the "New Approach" principles, applicable in 2010): The Notification will still be the responsibility of the Member States, but, essentially:

- Rules for Notification and requirements for notifying authorities will be harmonized
- Requirements and obligations of Notified Bodies will be defined
- Role of subsidiaries and sub-contractors will be defined
- Operation surveillance will be intensified, and common rules for de-notification implemented.

### *Harmonized Standards*

Harmonized standards are a paramount feature of the Lifts Directive, whether directly used as an element of the conformity assessment or to describe the adequate level of safety to be achieved.

By their nature, voluntary standards play an important role in achieving a competitive and dynamic, knowledge-based economy. Standards have been an integral part of the market system - since very early times - and have played a key role in advancing the wealth of nations. Standards tend to increase competition and allow lower output and sales costs benefiting economies as a whole. Standards function by reducing variety, ensuring inter-operability, maintaining quality and providing information. This shows why standardization is so important for European policies.

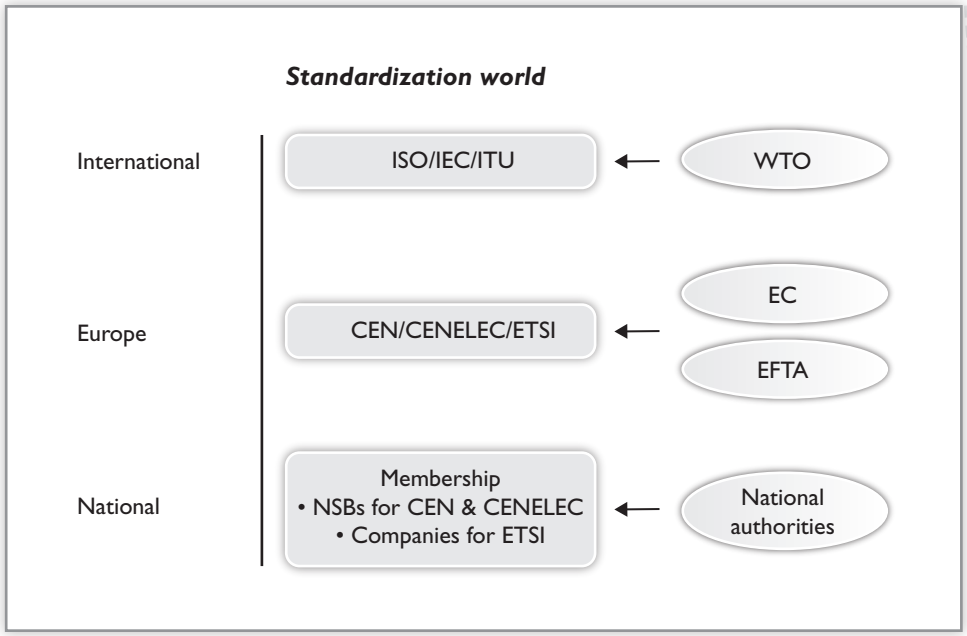
Harmonized standards are European standards that are adopted by European standards organisations. The official standards organisations are the CEN, which covers most sectors, CENELEC (Electro-technology) and ETSI (Telecommunications).

The operation of the "New Approach" requires that the standards offer a guaranteed level of protection with regard to the essential requirements established by the directives,

European legislation, in the particular case of lifts and escalators, is however essentially limited to new equipment. National regulations are still in place to monitor the requirements for maintenance, modernisation and eventual periodical inspections of the equipment by accredited bodies.

This does not mean, however, that there is no European standardization activity related to safety aspects of existing lifts, as we will see later.

## *The standardization world: the CEN System and Processes*




CEN is an international association set up to manage cooperation among the national standards bodies of the countries of Europe, with the objective to adopt standards that are voluntary through consensus and transparency.

"The aim of the association is the implementation of standardization throughout Europe to facilitate the development of the exchange of goods and services by the elimination of the barriers set by provisions of a technical nature."

The CEN is an international non-profit organization founded in 1961, which became a legal entity in 1976. The CEN Management Centre is based in Brussels.

CEN today is essentially composed of:

- **29 National Members:** the national standardization bodies of the EU and EFTA
- **5 Affiliates:** national standards bodies of Central and Eastern European countries which can in principle become members of the Union or EFTA
- **8 Associates** from the European sector organisations, including trade unions.

A number of Corresponding Organisations and Associated Bodies are also part of the CEN, and more than 400 trade and professional organizations work in liaison with the CEN.

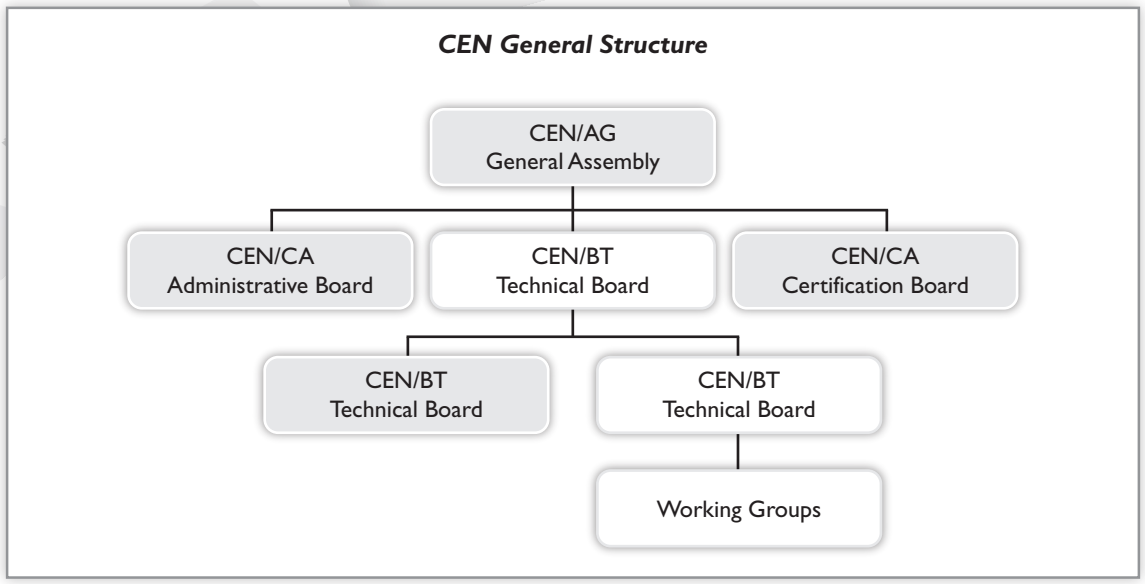
- The number of experts involved in the CEN standardization work thus exceeds 60,000.

The **"Key values"** of CEN in the elaboration of standards are:

- **Consensus:** ensured by the representative expertise of all national members participating in the elaboration of the standards.
- **Openness and transparency:** guaranteed by public enquiry procedures. A public enquiry also involves the associations in liaison and eventual partners.
- **National commitment:** expressed by a formal vote casted by the national members.

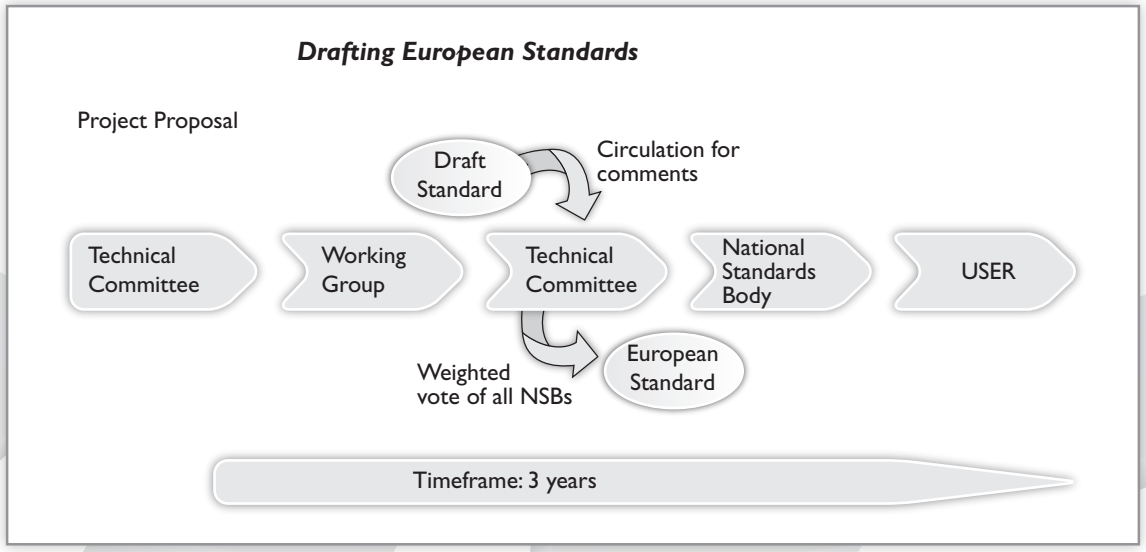
- **Technical coherence at the national and European level:** When a standard is adopted, all CEN national members are obliged to implement this standard as a national standard, and to withdraw the eventual existing standard(s) dealing with the same subject.
- **Correct integration with other international work:** Close cooperation with ISO.

**The general organisation of CEN:** The main actors for the elaboration of standards are the "Technical Committees" and the "Working Groups"




## Elaboration of standards

The Technical Board, on justified request (industrial or social needs), approves the standardization work on (a) particular subject(s), and allocates the task to the most appropriate Technical Committee, which in most cases will appoint one or several Working Group(s) composed of experts in the particular subject.



### *The Technical Committee*

The Technical Committee (TC) is usually appointed to cover a number of subjects within the same family of equipment for example. The Technical Committee is responsible for correctly conducting the elaboration of the standards although the technical formulation is typically "delegated" to Work Groups.

### *The Working Group*

The Working Group (WG) is appointed by the parent TC for a specific task. The WG essentially:

- Drafts documents in accordance with the work specifications, guidelines and time schedule provided by the parent TC.
- As an individual expert, each member of the WG maintains understanding and awareness of the national position by being in contact with related standardization activities within the National Standards Body of his/her home country

The CEN Enquiry (as the most common route for standards approval)

- When a WG terminates the drafting of a standard, the CEN national members, associations in liaison and "partners" are requested to provide eventual comments.
- Each comment resulting from the CEN enquiry is analysed and evaluated, and a decision is taken concerning its incorporation in the revised draft

### *The CEN Formal vote*

The corrected draft is usually submitted to a "formal vote" by the national members. CEN members are required to cast unconditional votes and to justify any negative vote. Only editorial comments are permitted. The vote of each CEN Member is worth a certain number of points depending on the importance of the represented country (in terms of population).

### *Adoption and implementation of a standard*

When the voting is terminated (if positive):

- The Standard is formally ratified by CEN
- The CEN National Member implements the EN at national level by giving the EN the status of a national standard within the defined time frame which means withdrawing any national standards conflicting with the EN

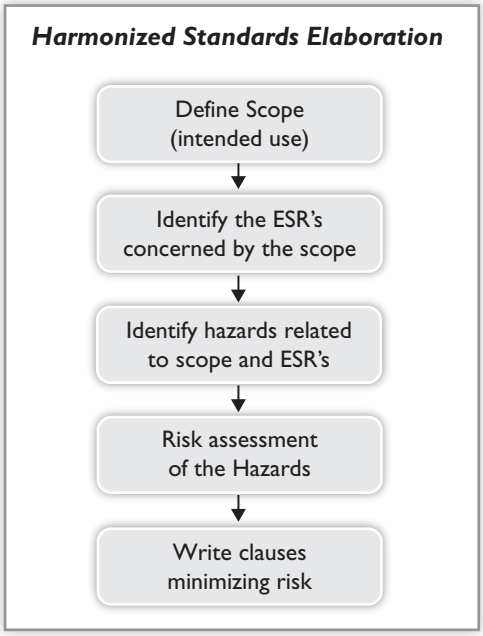
### *Harmonization of EN Standards*

Harmonized standards are not a specific category amongst European standards. The terminology used in New Approach directives is a legal qualification of technical specifications which exist as European standards but to which a special meaning has been given by these directives.

Harmonized standards maintain their status of voluntary application in the field of New Approach directives.

In addition to being an "EN" standard, the conditions for a "Harmonized" standard are:

- That the standardization work is mandated by the EU (generally) or EFTA.
- That the adequate response of the clauses of the standard to (an) Essential Safety Requirement(s) is supervised by a "CEN Consultant" on behalf of the EU Commission. All technical clauses of the standard are submitted to a formal Risk Analysis.
- The content of the standard is accepted by the EU Commission and the reference of the standard is published in the Official Journal of the EU.




## CEN TC 10 "Lifts, Escalators, and Moving Walks"

*Establishment of safety rules for the construction and installation of lifts and service lifts, escalators and moving walks.*

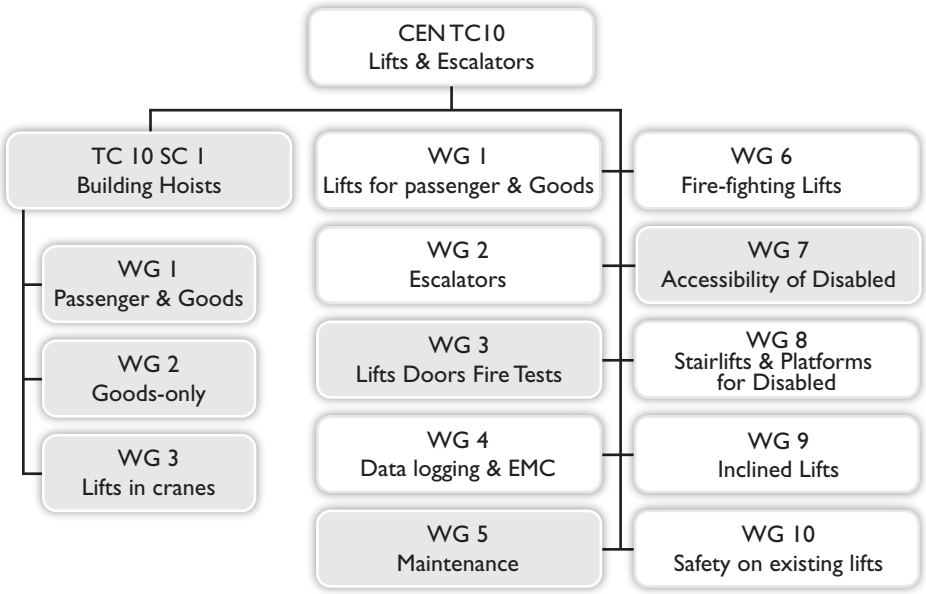
The CEN TC 10 was established in 1962 and is today the oldest Technical Committee in activity.

Today, the TC 10 comprises:

- One Sub-Committee essentially dedicated to building hoists, which comprises 3 Work Groups,
- 10 Working Groups for lift and escalator issues, producing standards in response to Directive requirements and others. Today, some of the WGs are dormant since they have terminated their mandate. This is the case for the WG3 (Lift landing doors fire tests), WG5 (Maintenance) and WG7 (Accessibility for the disabled).

In all, the TC10 is constituted by over 150 active members from most of the CEN countries before the last enlargement of the EU.

***Organisation of the CEN TC10***




Several work groups are concerned with the safety aspects of lifts, the main one being WG1, in whose work the trade unions participate.

## *The role of trade unions*

One concrete target is CEN TC 10: Do mirror TCs exist in all Member States? If yes, are EMF people present in those TCs? CEN rules require that mirror groups display a balanced representation of stakeholders. This ensures that national delegates attending the CEN TC 10 meetings bring into play a balanced national position on occupational health and safety matters. In short, action at national level is needed to understand the 'status of play' in different Member States. When this picture is available to EMF, action can be taken to select an EMF expert to follow the TC 10 work and disseminate this information to EMF national contacts attending the national TC 10 mirror groups.

We need the support of employers (in terms of time, training and resources) and to convince them that participation in CEN is "good for business".

## *Market surveillance*

Market surveillance is an essential tool for enforcing New Approach directives, in particular by taking measures to check that products meet the requirements of the applicable directives, that action is taken to bring non-compliant products into compliance and that sanctions are applied when necessary.

A high level of protection is envisaged in the New Approach directives. This requires Member States to take all necessary measures to ensure that products may be placed on the market, and put into service, only if they do not endanger the safety and health of persons, or other interests covered by the applicable New Approach directives, when correctly constructed, installed, maintained and used in accordance with their purpose.

This implies an obligation for Member States to organize and carry out market surveillance in a way that is effective and sufficiently extensive in order to discover non-compliant products. This is not only to protect the interests of consumers, workers and other users, but also to protect the interests of economic operators from unfair competition.

The obligation for market surveillance is complementary to the provisions of the New Approach directives, which require Member States to allow free movement of products that are in compliance with the requirements. This obligation also corresponds to the right of Member States to challenge the free movement of substantially non-compliant products under the safeguard clause.

### Market surveillance activities

Market surveillance involves two main stages:

- National surveillance authorities shall monitor products placed on the market to ensure they comply with the provisions of the applicable national legislation transposing the New Approach directives.
- Subsequently, when necessary, they shall take action to establish conformity.
- Although market surveillance operations cannot take place during the design and product stages, efficient enforcement usually requires that surveillance authorities act in collaboration with manufacturers and suppliers in order to prevent the placing on the market of non-compliant products.

Despite the above considerations, market surveillance is recognized as the "weak link" of the Lifts Directive chain of operations. Its implementation from one Member State to another is uneven (sometimes not even operating effectively) although its importance is fundamental to eventually detect and reject unsafe products. This situation has alarmed the EU Commission, and the "New Legal Frame" (applying in 2010) focuses on the improvement of the efficiency of market surveillance, e.g.:

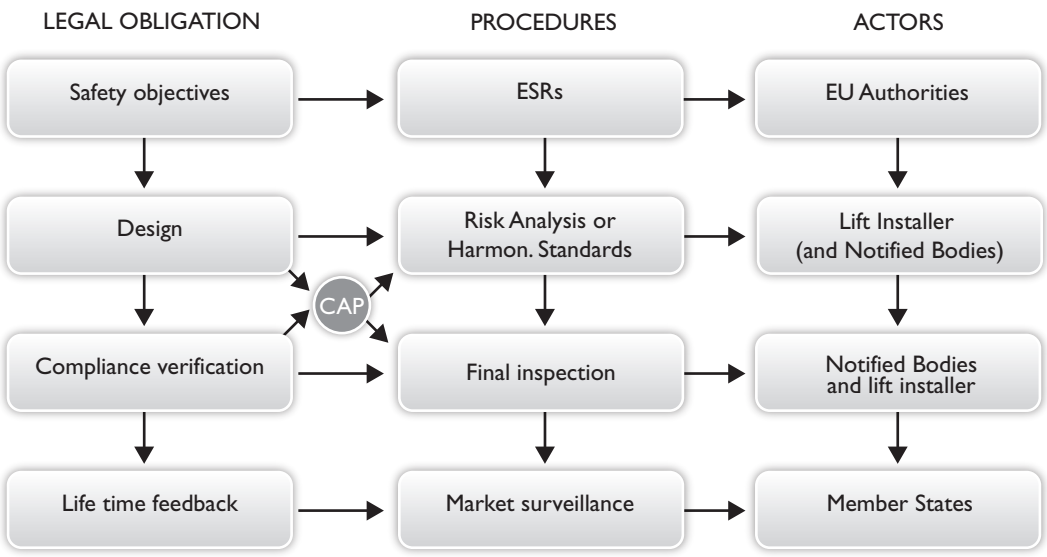
- by specifying common minimum requirements in all Member States,
- by specifying organisational and operational requirements,
- by specifying infrastructures, resources and powers,
- and by implementing adequate checks – internally and at borders.

## *Lifts Directive overview, legal aspects, procedures and players*

The voice of the trade unions has contributed, and will continue to contribute, to the quality of safety approaches, mainly by:

- Cooperation with the EU authorities for adequate formulation of the ESRs
- Participation in the elaboration of Harmonized Standards
- Collaboration with Notified Bodies to define safe rules
- Being partners with National Authorities in essential Market Surveillance

***EU Lifts Directive rules***



## *The revision of the Lifts Directive 95/16/EC*

As provided by the terms of the Directive itself (Article 16), revision is a possibility left to the appreciation of the Commission.

The Commission collected background from the various players and stakeholders of the Directive up to 2002 and then appointed the European Evaluation Consortium (TEEC) to provide better information on the application of the Directive in order to contribute to the re-examination required by Article 16 of the Lifts Directive.

The evaluation, conclusions and recommendations of the TEEC were submitted to the Commission in 2004, essentially finding:

- Some confusion in the scope concerning new and existing lifts, but mainly that the borderline between lifting equipment falling under the Machinery Directive and lifts had to be clarified.
- Some bugs and inconsistencies linked to the Conformity Assessment Procedures (Art. 8 and relative annexes).
- Some needs to interpret or clarify in relation to the Essential Safety Requirements of Annex 1.
- Some questions concerning the competence and operation of certain Notified Bodies.
- Some uncertainty concerning the effectiveness of the market surveillance.

All this led the Commission to consider that application of the Lifts Directive by the profession was reasonably well in place, and that there was no imperative urgency for an immediate and in-depth revision. The points of difficulty would, as a first step, be solved by alternative means:

- The "Borderline" with the Machinery Directive was cleared through the revision of the Machinery Directive (New 2006/42/EC, in application since December 2009).
- Clarification and interpretation of Directive clauses, as well as Essential Safety Requirements would be ensured by the publication of a Lifts Directive Guide (publication 2007).
- Improvement of the operation of the Notified Bodied and Market Surveillance would be within the revision of the New Approach (New Legal Frame, application as of 2010)
- Other orientations and decisions covered by the work and decisions of the Lifts Committee.

Today, the Commission is again considering the feasibility of a revision, possibly limited in content and therefore permitting a reasonably fast acceptance procedure. This is where the inputs of the EMF/ETUI would have upmost importance.

## *The EU legal situation on Existing Lifts*

The Directive 95/16/EC is only applicable with regard to new lifts and certain safety components. It defines:

- safety objectives
- procedure for the assessment of conformity (where harmonized standards define the state of the art)
- rules for market surveillance.

Old lifts in function are not as safe as those newly installed. Moreover, the overall level of safety of the existing lifts in the different EU Member States is far from being identical. The existing lifts are under the individual responsibility of the EU Member States since maintenance, periodical inspections and the improvement of safety are subject to national legislation.

The only EU publication related to the safety of existing lifts is the Recommendation 95/216/CE of the EU Commission on the improvement of safety for existing lifts (cited in the core of the Lifts Directive).

This document:

- Reminds the Member States that they are responsible for the safety of the persons on their territory
- Recommends, for existing lifts:
  - to make provisions to ensure that existing lifts benefit from adequate maintenance;
  - to improve the safety of existing lifts by reference to Standards EN 81-1/2 with particular attention to 10 "dangerous" cases.

However:

- there is no obligation of application as it is a "Recommendation"
- and it is difficult to evaluate the respective importance of the EN 81-1/2 clauses.

To promote the awareness of the Member States as regards the importance of the safety aspects of existing lifts, the EU Commission has suggested the elaboration of a standard addressing the particularities of safety for existing lifts. This project was easily accepted by CEN TC10 (1999), and **the Standard EN 81-80** was ratified in 2003. This standard, which is known as the "**SNEL Standard"** (**S**afety **N**orm for **E**xisting **L**ifts):

- Identifies 74 hazardous situations classified into three Risk Families (using Risk Analysis ISO TS 14798):
  - High risk
  - Medium risk
  - Moderate risk
  - Proposes a calendar for eventual corrective actions
  - Proposes a filtering method to adapt the individual situation of each Member State.

Trade unions not only have been very supportive during the elaboration and the implementation of the SNEL as a standard, but still have an important role vis-à-vis national authorities to make sure that the fundamental objective of keeping the lifts park in good condition is addressed by adequate legislation, keeping in mind the fact that the health and safety legislation is typically more demanding and covers new and old lifts.

## *The way forward -Proposals for a long-term strategy*

- An exercise of data collection could start by using the spreadsheet used at OTIS, and extend it in the four major companies to gather information on working conditions. These reports would be promoted and endorsed by the respective EWC, and then sent to the relevant Commission fora and committees. Ideally, a report should be prepared from each Member State. The Commission Lifts Committee is in fact attended by national authorities in charge of the application of the Lifts Directive, together with representatives from CEN TC 10 and Notified Bodies.

  Statistics are fundamental to diagnose the wealth of the profession, and identify the weaknesses of the system. Accidents rates, together with the extent of harm and damage and near misses should be reported: they are an important tool for directing the evolution of legislation, standardization or professional consensus. However, the collection of reliable and complete statistics in the field of lift safety is still far from sufficient. There is no organized statistic collection by national authorities. This is not an EU task and very few Member States have adequate structures for undertaking this task (although some attempts to do so have been made in Northern Europe). Nor is it the role of Notified Bodies. Lift manufacturers usually have their own internal statistics, but are reluctant about making public what could represent a severe loss of image. Some lift associations try to cover the subject with great care, but inputs are not necessarily reliable. Only major accidents subject to press coverage are made public; minor accidents are considered as "facts of life" and treated as domestic accidents.

  - **Consider establishing a Forum** to gather accurate information.
    - Possibly composed of workers' representations, lift associations and authorities;
    - Incentive from the Commission, with inputs to the Forum by structured national organizations and lift associations;
      - Could be a task mandated under Market Surveillance for new lifts.
      - Detection of safety flaws in the existing park: this can be very different in each Member State.

- The creation of a permanent "tool" to integrate workers' knowledge, experience and feedback into the harmonized standards development, taking the example of EN 81 revision to improve provisions for the safety of inspection and maintenance staff. This tool should be based on fresh information coming from the lift workforce collected by trade unions at regional/national level.

  There are basically three levels of standardization for lifts:
  - national, in which members essentially represent their professional interests,
  - European (typically) CEN, in which members represent the view of their country, associated with own expertise;
  - international (typically ISO), in which members represent the view of their country, CEN views, associated with own expertise.

  The legal EU structure calls for Harmonized Standards, as a preferred tool for Conformity Assessment. Therefore, EN work will remain predominant in the short/mid-term (CEN TC10 is the Technical Committee for lift standardization).

Although its membership is reasonably "democratic", TC10 participation is mostly represented by the industry, and particularly by the major manufacturers, which, inevitably, have influence on the technical content of the standards.

Although TC10 "strategy is decided at plenary meetings, the technical content is elaborated by the Work Groups. This is where the input of workers' knowledge and experience is most effective. The participation of trade unions in TC10 is already in place, but their participation in the Work Groups remains embryonic.

How to consolidate an EMF/ETUI position on technical issues in the elaboration of the standard?

- ☆ National Committees are not directly informed by the TC10 about Working Group activities.
- ☆ Participation in Working Groups has a non-negligible cost (travel and time). WG 1 (EN 81-1/2) normally meets 6 times per year.

- **Permanent tool**: To create/or further develop a structure
  - ☆ which will be on the distribution list of all TC/WG mailings;
  - ☆ which has the capacity/time to intervene in WG work;
  - ☆ which has the autonomy to take part in the debates of selected WGs;
  - ☆ which will be called for active participation in public enquiries;
  - ☆ which will have an active influence on National Committees so as to influence formal votes.

- Topics of interest: the disparities among the conformity assessment procedures followed in different countries, or the disparities among the Notified Bodies activity, and, finally, the weakness of market surveillance for lifts.

  In principle, the lift installer decides which procedure will apply for the Assessment of conformity of installed lifts, regardless of the place of installation. However, old cultural attitudes prevail so final inspection is made by TÜV in Germany/Austria, while final inspection operating QA Modules is practically general in the UK, etc. Other countries have both approaches, depending on the lift type (whether volume-type or single units). There is also some degree of commercial competition between Notified Bodies. NB-L has defined step-by-step procedures for a reference final examination, but these are rarely followed. Cost of CAP essential parameter for manufacturers.

  - The New Legal Frame indirectly addresses the issue:
    - ☆ Updated and harmonized new rules for appointment and the coordination of the Notified Bodies means that disparities regarding the qualification and operation of the NBs will decrease, or even disappear.
    - ☆ Via the intensified role and responsibility of Member States for the control of the Notified Bodies and Market Surveillance.

- Directives and Standards: How to feed them with workforce input? Risk assessment of maintenance work and state of the art. Drawing data from big companies. Incidents and accidents with casual factors when available. This analysis should cover both NEW and EXISTING lifts.

- **Considerations**
  - ☆ New lifts: for standards see above. For Directives, there is a need of active presence in the deciding forums of the relative directives: social Directives, the Lifts Directive, the Machinery Directive and others. This is already the case, but the available time for constructive interaction could be an issue.
  - ☆ Existing lifts: national rules apply. Trade unions should push for the systematic implementation of Risk Analysis of all working places (already undertaken by some Member States). They should support the implementation of national regulations based on the state of the art as agreed for new equipment (e.g. based on EN 81-80). The "braking forces" here are the Associations of Building Owners, which are concerned with the cost of modernization, but not directly concerned by workers' safety.

- Hazards To Persons Outside The Car (Art. 2.2, Annex I of the Lifts Directive 95/16/EC): How is this requirement complied with in the different Member States? Is this assessment available? The intention of the text of the Directive is clear (natural safety spaces, except in "exceptional cases", the status of "exceptionality" being validated by the Member State operating as a third party). However, for strictly commercial reasons:
  - Different Member States have officially adopted a different understanding.
  - Lift manufacturers do not agree on the meaning and Lift Associations have not provided common guides.
  - Notified Bodies, the "guardians" of safety, have never agreed on a single understanding.
  - Even independent studies (by NHL) were biased by lobbies and did not produce clear comments.

  The debate has gone on since the first days of application of the Directive - and is still not closed.

  The workers' position: The trade union view is simple, i.e. that workers' safety must have the highest priority. *First of all the* ***permanent safety space is vital for the workers safety*** *in the lift shaft. There are many artificial solutions to technically create safety spaces, but they are dependent upon the procedures to be followed and some form of training is needed. Since every manufacturer has a particular preferred system design, the associated working system and procedures are consequently different. Maintenance companies today generally work on lifts from different manufacturers. This requires additional competence in order to be able to maintain such variety of systems and procedures, with a high risk of misuse resulting in potential incidents and accidents.*

  - **Strong commitment** vis-à-vis the Commission and the Lifts ADCO to ensure that the trade union position prevails.
    - ☆ Battle to win at the occasion of the Lifts Directive revision 2010/2011.

- Maintenance: As much as 80% of the serious accidents involving lifts occur during maintenance activities. On the one hand, *maintenance of new lifts* is an essential health and safety requirement, but maintenance is not explicitly addressed in the text of the Directive 95/16/EC. Nevertheless, the Lifts Directive Annex I requires application of the EHSRs of the Machinery Directive when the relevant hazards exist and are not dealt with in the Lifts Directive Annex I since the "Principles of safety integration", EHSRs 1.1.2, are applicable in any event.

Maintenance instructions are requested by the Lifts Directive (EHSR 1.1.2.of the Machinery Directive, and EHSR 6.2 of the Lifts Directive).

Maintenance instructions should include procedures for safe work.

Safe work should include the safety assessment of the working places.

Safe work includes training and information of the workers, based on the particularity of lifts and building types.

- **Actions**
  - Commission level: Requirements for safe maintenance should be completed in the Directive so as to include the aspect of working places.
  - Member State level: Obligation for safe maintenance to become a regulation (already so in most countries); Risk Analysis for working places to be part of the maintenance obligations.

- Therefore, EHSR 1.6 'Maintenance' of the Machinery Directive applies to new lifts. Particular attention is given to "instructions for use". In this connection, CEN/TC 10 "Passenger, goods and service lifts" has developed the standard EN 13015 "Maintenance for lifts and escalators – Rules for maintenance instructions".

  EN 13015 is not a standard on maintenance as this is usually understood. It gives guidance on how to specify the maintenance instructions (e.g. Lifts Directive EHSR 6.2), or how to select a qualified maintenance company, etc. Today, a standard giving guidance on the maintenance procedures is still missing from the EN 81 collection.

  - **Debate with CEN TC10** about the feasibility of such a standard:
    - Such a "guide" already exists in some Member States.
    - There is some reluctance by manufacturers, which consider that they have the responsibility for the maintenance procedures of their products.

- *Maintenance of existing lifts*, on the other hand, is a challenging issue. As a matter of fact, the Commission Recommendation 95/216/EC of June 1995 concerning improvement of the safety of existing lifts was issued the same year as the Lifts Directive since the Commission was already aware of the need to address existing lifts and to provide the Member States with standards supporting the implementation of the Recommendation.

  The Commission was aware of the enormous difference in safety levels in the various Member States for the existing lifts and that the simple application of the Lifts Directive would not level off these differences before decades, considering the very long lifetime of lifts (40-60 years).

  Due to the Principle of Subsidiarity, the Commission has little autonomy for legislation on existing lifts. This explains the reduced input by the Commission (**Commission Recommendation** 95/216/EC of June 1995). In order to gain some effectiveness this recommendation was later supported by a standardization effort (EN 81-80).

  There is some legislation in progress in a number of Member States concerning the upgrading of the safety of existing lifts:

- ☆ Not in all however.
- ☆ Each approach is specific to the individual Member State: there is no harmonization of legislation.
- ☆ There are no similarities in calendars for the decided upgrades.
- ☆ National actions are typically triggered by accidents and emotion.

- **Similar to the above**
  - ☆ Push for the implementation of national regulations to upgrade the existing park, based on the state of the art for new equipment (e.g. based on EN 81-1/2). Opposing organizations to this are the Building Owners Associations, which are concerned with the cost of modernization, but not directly concerned by workers' safety.

# Position Paper for Lift Sector Single Person Working In Lift Construction

*EMF Lift Select Working Party*

## Definition:

It should be made clear to all employers that single person working and lone working is not the same and therefore the following definitions apply.

Single person working is where a worker may undertake certain defined tasks as long as there is at least one more person at the same location for whom the lift worker has confidence that in the case of an emergency this person can offer assistance.

Lone working is where only one person is on site and therefore lift workers should never be subject to lone working.

## Procedure:

Any single person working shall only occur after an agreement with the Union / Local Works Council and/or local workers representatives and the Health and Safety representative has been reached (the agreement should always detail the full remuneration including any incentive/bonus payments). This would then ensure that the safety of all workers is taken into account.

All Single person Working in lift construction should always be voluntary and since each workplace bring their own particular problems an up to date risk assessment where all safety risks are identified and evaluated shall take place before any work commences.

For clarification as employers are duty bound to make sure that any work undertaken can be done without a risk of injury, any attempt to disregard this means the work will not commence and the worker(s) will demand from their employer a formal statement on how can the work be carried out safely and without risk of injury (Risk Assessment).

When installing a lift all work should always commence with at least two people and only when it is at a stage where it is considered viable by the workers should single person working commence.

The lift worker has the right and the obligation to inform the supervisor and/or a management representative that he/she/they do not believe that a particular operation can be carried out in a safe manner, and in these instances single person working should stop immediately.

FEM 13/2009 Adopted by the 110th EMF Executive Committee
in Brussels on 2-3 December 2009

## Suitability:

There should always be a limit regarding the sort of lift that could be considered for single person working such as, by defining the type of installation and /or maximum load and correct tooling must always be provided, as without proper tools work should never commence.

## Health and Safety:

Different companies have introduced procedures for a lift worker to be able to raise an alarm whilst working in "single person" mode examples such as having to acknowledge a safety message by responding on a hand held terminal, or having a HHT with an emergency signal alert.

As all systems rely on mobile technology if a phone signal cannot be obtained on site single person working cannot take place. It must be kept in mind that when an injury occurs the person must receive help quickly although he/she would not be able to raise the alarm alone.

Risk assessment must always be the starting point for Health and Safety in lift work. Safety risks must be recognized and evaluated and obvious risks must be eliminated.

Single Person working should never be permitted if there is a safety risk involved. As SNEL recommendations form a good basis, further development of legislation needs exploring.

The worker's right to safe working must always come first.

The safety standards concerning the danger of falling are outdated and they must be harmonized with construction regulations. The authorities must monitor health and Safety requirements more carefully in order to guarantee the safety of workers.

# Useful links

- http://www.emf-fem.org/Industrial-Sectors/Lifts
- http://hesa.etui-rehs.org/uk/dossiers/dossier.asp?dos_pk=19
- http://ec.europa.eu/enterprise/sectors/mechanical/lifts/index_en.htm
- http://www.cen.eu/cen/Sectors/TechnicalCommitteesWorkshops/CENTechnicalCommittees/Pages/default.aspx?param=5994&title=CEN/TC%2010
- http://ec.europa.eu/enterprise/policies/european-standards/documents/harmonised-standards-legislation/list-references/lifts/

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