## Child Safety Requirements for Internal Blinds BS EN 13120, BS EN16433 and BS EN 16434

The new regulation for child safety requirements for internal blinds is now upon us. It has been passed as a standard in Europe and adopted by British Standards. This is a précis of the regulations as we understand them, in as simple a form as possible. The act became operative on the $28^{\text {th }}$ February 2014 and applies to all blinds made after that date. You are able to sell old stock. You must ensure that you acquaint yourself with the regulation.

There are two other European documents that apply EN16433 andEN16434, they refer to the testing of the blind components and blind system to make sure they meet the standard and are more concerned with manufacturers rather than curtain-makers.

This document is intended as a guide only to the regulations, as understood by Merrick \& Day Ltd at this time. We accept no responsibility for any subsequent changes in regulation and/or our misunderstanding of the regulations as they stand.

The act covers all internal blinds presenting hazardous loops and hazardous cords where they are "intended" to be installed in premises where children aged 0-42 months are likely to have access or be present. The act does not apply to offices, factories etc. where children are unlikely to have access. In this case a notice with the following text "product intended to be installed in premises where children are not likely to have access" shall accompany the internal blind.

If you do not know where the blinds are going to be installed you must assume they will be used where children will be present. It is also recommended that if children up to 42 months will have access then consideration should be given to installing a window treatment without operating cords

DO NOT PANIC, the regulations are awkward in some cases but still possible to comply with. In the main, the regulations concern themselves with:

- Making safe the operating chain or cord
- Making safe the accessible inner cords behind the blinds
- New warning labels and instructions that must accompany the blind to the consumer

To avoid any confusion when reading this, three specific definitions need to be understood;

1. "Cord(s)" are used throughout the standards to mean cord(s) chain(s), ball-chain(s), tape(s) and similar.
2. A "curtain" is part of the product which is set in motion by the operating mechanism and ensures its function so in effect it is the moving part of the blind and not a curtain as in a drapery product.
3. Any text shown in speech marks is a verbatim quote from the standard.

## Where the safety regulations apply, the following MUST be observed.

## Simple Do's and Don'ts

| Do's | Don'ts |
| :--- | :--- |
| Do ensure that you deliver the blind to <br> your customer with the correct labels, safety <br> instructions, correct length of cord or chain <br> and the correct safety devices. | Do not mix and match. Purchase your <br> blind mechanism and safety devices from <br> the same supplier, the mechanism and <br> safety devices must be tested together for <br> compliance. Blinds on a batten may be used <br> providing all of the components and safety <br> components have been tested together with <br> a batten system. |
| Do fit the safety devices, if you are <br> installing you must install a compliant <br> product, your customer cannot sign <br> 'something' to absolve you of that <br> responsibility. Your customer may install <br> whatever they wish in their own home. | Do not fit a Chain Breakaway and a <br> Tensioning Device on the wall at the same <br> time, only use one or the other. |

## General construction of internal blinds

"Special attention shall be paid by the manufacturer of internal blinds to ensure there are no parts which can cause harm to the individual. Sharp and projecting edges of any moving parts and parts related to the child safety eg. Safety devices of the internal blind likely to be located to a height lower than 2.5 m above the floor or any permanent access level, shall be rounded with a minimum radius of 0.5 mm . Bottom rail end plugs shall have a minimum of 0.5 mm radius, or edged, or protected by foam or rubber."

| Installation Height | Cord or Chain Length |  |
| :---: | :---: | :---: |
| Operating loop with Breakaway System |  |  |
| Known | Distance from floor to bottom of pull cords shall be at least 0.6 m | "In either instance the hazardous loop shall be eliminated when a mass of 6 kg is applied to the pull cord(s) gradually or within 5 seconds of application" |
| Not Known | Less than or equal to $2 / 3$ drop of blind |  |
| Operating loop with Fixed Tensioning System |  | EN 13120 |
| Known | Distance from floor to bottom of pull cords shall be at least 1.5 m | "The distance between the two strands of the loop shall not be more than 50 mm at the point of exit from the fixed tensioning device" |
| Not Known Drop less than or equal to 2.5 m | Length of pull cords shall be less than or equal to 1 m |  |
| Not Known Drop greater than 2.5 m | Shall be less than or equal to drop of blind minus 1.5 m |  |

## Merrick \& Day solution



## CHBREAKCLR



CHSAFE-R

Our chain operated head rails are supplied with a compliant breakaway device in the chain, the chain can be a maximum drop of 0.6 m from the floor.

Our blind system is fitted with a chain breakaway device; for child safety this device must remain fitted to the chain. The correct position of the breakaway device is just below the chain drive, on the down side of the chain, when the blind is fully up. This ensures that the operating load on the chain breakaway device is the least possible, because the weight of the blind is working with the breakaway device.
The bottom of the chain must be no lower than 60 cm from the floor. Shorten the chain if necessary.
Our system is fitted with a standard chain drive for blind weights up to maximum 2 kg .
For heavier weights, up to maximum of 6 kg , replace the standard chain drive with a heavy duty chain drive.
The chain breakaway device now cannot be used as the heavy duty chain drive requires a continuous chain that passes through the chain drive more than once.

A chain without a breakaway device must be retained by a safety tensioning device, screwed to the wall. The continuous chain must be the correct length to ensure that the tensioning device can be installed no lower than 1.5 m from the floor. These additional Items are available from Merrick \& Day.

## Cords with an operating pull cord(s)

| Installation Height | Cord Length | Accumulation Device |  |
| :---: | :---: | :---: | :---: |
| Pull Cord(s) - NB this covers single cords as well |  |  |  |
| Known | Distance from floor to bottom of pull cords shall be at least 1.5 m | 2 Pull cords: <br> Cords shall not tangle, if they do the loop must be eliminated under mass of 6 kg within 5 seconds OR Pull cords connected to breakaway system (condenser) which eliminates hazardous loop under 6 kg within 5 seconds <br> More than 2 Pull cords: <br> Pull cords connected to breakaway system (condenser) which eliminates hazardous loop under 6 kg within 5 seconds <br> More than 4 Pull cords: | Unless at all positions of the blind the cords are as described in the cord length column of this table (which is highly unlikely!) An accumulation system shall be supplied so that pull cords can be stored out of reach of children. The accumulation system shall be designed so that: |
| Not Known Drop less than or equal to 2.5 m | Length of pull cords shall be less than or equal to 1 m | In absence of a suitable breakaway connector it is accepted that the cords may be connected to a single pull cord on condition the connector is positioned at less than 50 mm from the headrail where the internal blind is in fully extended position | the accumulation device, the curtain being in the fully retracted position" |

## Merrick \& Day solution



CORCON4


CHSAFE-R

For blinds with up to 4 cord drops, our head rails are supplied with the Merrick \& Day breakaway 4 cord connector.

For 5 cords or more a Merrick \& Day normal cord connector may be used, but the cord connector must be installed at a maximum 50mm down from the head rail when the blind is fully down.

Please note that the 4 cord breakaway is designed as a safety breakaway. If the blind is heavy it may be necessary to install 5 cords, irrespective of the width so that the standard cord connector may be used.

The head rail also includes two cleats, the lower cleat must be installed no lower than 1.5 metres to the floor and the cleat must be able to take all of the cord when the blind is fully up. If one cleat cannot take all of the cord, two cleats should be installed, one above the other, approximately 15 cm apart or sufficiently apart to ensure that all of the cord can be accumulated on the cleats and no part of the cord or acorn is lower than 1.5 metres to the floor.

## Accessible inner cords

| If inner cords are accessible | European Directive <br> Number |
| :--- | :---: | :---: |
| a. The maximum distance between two consecutive attachment/retention points of <br> inner cords shall be less than or equal to 200 mm | EN $\mathbf{1 6 4 3 3}$ |
| b.It shall not be possible to insert the head probe defined in EN 16433 after having <br> applied a vertical force of 50N |  |
| If either a) or b) is not fulfilled, the hazardous loop shall be eliminated when a mass of <br> 6 kg is applied within 5 s of application |  |

## Merrick \& Day solution



The rear cords or tape on the blind should be connected to the blind using a safety breakaway system.

The Orb safety breakaway system should be installed by sewing the Orb to the bottom fiberglass rod, using the ring attached to the Orb, thread the cord or tape through the Orb as shown in the picture. Adjust the cord or tape length by pressing the button and moving the Orb to the required position.

DO NOT knot or heat seal the cord or tape as it must pass through the Orb and give way when the cord or tape is under any undue load.

Mandatory warning labels
General Warning Notice

Must be included with all blinds with or without integral safety device.

## Merrick \& Day solution

Warning labels are supplied with our head rails. Ensure that they are fitted with the large warning label attached to the chain and the smaller label attached to an orb breakaway connector (if the blind is a stock blind and not made to measure).

When using a tensioning device or cleats, these must be attached to the chain together with a tensioning device warning label. These labels must be supplied in this way to your customer.

## Instruction Requirements

All blinds must contain printed product instructions.
The name or trademark of the manufacturer or importer or distributor must be displayed on the blind.

