EUROPEAN CO-ORDINATION MACHINERY OF NOTIFIED BODIES	**CO-ORDINATION OF NOTIFIED BODIES** **Machinery Directive 2006/42/EC + Amendment** **RECOMMENDATION FOR USE**	CNB/M/08.001 Revision 04 Language: E

Date of first stage: 23/06/1997	To be approved by:	Approved on:
Origin: VG8 Vehicles servicing lifts	☑ Vertical Group ..... ☑ Horizontal Committee	12/04/2010 13/12/1995
	To be endorsed by: ☑ Machinery Working Group....	Endorsed on: 04/06/1996

Question related to: Directive 2006/42/EC	Article:	EN/prEN: pr EN 1493	Other:
Annex:	ESR (1):	Clause: 5.6.5.6	Other clause:
		CEN TC concerned: TC 98 WG 2	

Key words: Polyamide Nuts

Question: With regard to screw drives red brass or bronze are the most common materials for the load bearing nut and the safety nut as written in the comments of the German prevention rule VBG 14. However, some manufacturers intend to use polyamide for the load bearing nut.
Some tests in our institute have shown that polyamide nuts can have the same or even a better tribological behaviour than bronze nuts, e.g. with regard to self-locking and self-retarding. Is it allowed to use polyamide nuts in vehicle lifts? Do the other NB's have any experiences with these nuts, especially when the lubricant is contaminated with dirt or particles (e.g. swarf)?

Solution:

Polyamide nuts may be used in vehicle lifts, provided that lifetime tests have been carried out. The technical should

- describe the conditions for this test which should include
- carrying out min. 30000 load cycles (nominal load), which relates to a life time of 10 years.

A safety factor of 6 against breaking shall be used.

Adaptation procedure: FORMAL ADAPTATION IN CONFORMITY WITH DIRECTIVE 2006/42/EC

(1) Essential safety requirement

Note: According to point 6.6 of the Guide of the implementation of directives based on the New Approach and the Global Approach, the notified bodies apply as general guidance this recommendation for use.