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## Poisonous elements test

This part of the European Standard specifies and tests for the movement of certain elements from the toy to the child. Children licking or sucking toys during play is accepted as normal behaviour. Whole or parts of toys can also be accidentally swallowed by a child. The following elements are tested; antimony, arsenic, barium, cadmium, chromium, lead, mercury and selenium.

Tests are completed on the following parts:

- Coatings of paints, varnishes, lacquers, printing inks, polymers and similar coatings
- Polymeric and similar materials, including laminates.
- Paper and paper board
- Textiles, whether natural or synthetic
- Other materials e.g. wood, fibre board, hard board, bone and leather (whether coloured or not)
- Materials intended to leave a trace e.g. graphite in pencils and liquid ink
- Pliable modelling material
- Paints e.g. finger paints appearing as such in the toy.

Use this information when explaining your choice of material, filling etc.

### Testing in industry

A sample is a portion taken from an accessible part of the toy, weighing more than 10mg or 100mg for paper and textiles.

Coatings e.g. paint are removed at room temperature by mechanical means i.e. scrapings.

The sample is then immersed in a chemical such as hydrochloric acid or water which should simulate stomach acid. The solution is then agitated.

The solution is then tested for how much of the element has migrated into the solution. This is analysed and recorded. For each element there is an acceptable limit, e.g. lead is 90mg per kg of toy material.



### Testing in school

Industrial type tests cannot be attempted in school. However, all materials, paints finishes etc. should be checked for any traces of the elements stated in the central box.

Paints, dyes and coatings should be checked against the label on the product, as these have already been tested.

Textiles, paper and card should be checked that they are safe for use by young children.