

ANNEX II

STRUCTURAL SAFETY REQUIREMENTS AND TESTS

Introduction

In setting the requirements of this Annex, it is implicit that in all phases of the operation of containers the forces as a result of motion, location, stacking and weight of the loaded container and external forces will not exceed the design strength of the container. In particular, the following assumptions have been made:

- (a) the container will so be restrained that it is not subjected to forces in excess of those for which it has been designed;
- (b) the container will have its cargo stowed in accordance with the recommended practices of the trade so that the cargo does not impose upon the container forces in excess of those for which it has been designed.

Construction

1. A container made from any suitable material which satisfactorily performs the following tests without sustaining any permanent deformation or abnormality which would render it incapable of being used for its designed purpose, shall be considered safe.
2. The dimensions, positioning and associated tolerances of corner fittings shall be checked having regard to the lifting and securing systems in which they will function.
3. When containers are provided with special fittings for use only when such containers are empty, this restriction shall be marked on the container.

Test loads and test procedures

Where appropriate to the design of the container, the following test loads and test procedures shall be applied to all kinds of containers under test:

TEST LOADINGS AND APPLIED FORCES

TEST PROCEDURES

1. LIFTING

The container, having the prescribed INTERNAL LOADING, shall be lifted in such a way that no significant acceleration forces are applied. After lifting, the container shall be suspended or supported for five minutes and then lowered to the ground.