

Earthmoving equipment is heavy equipment, typically heavy-duty vehicles designed for construction operations which involve earthworks. They are used to move large amounts of earth, to dig foundations for landscaping and so on. Earthmoving equipment growth and needs are always indicators about staple of the economy, Infrastructure growth. Today with a whole host of different machinery being used on many projects across India and different parts of the world. Earth -moving machines comprise a large set of industrial machines used in construction, mining, forestry, agriculture, cleaning and many other industries.

Indian Standards on Safety of Earth moving machinery aims to minimize the possibility of accidents and to ensure safe use of HEMM. Earth Moving machinery and material handling committee MED 07, is the technical committee responsible for formulation of Indian Standards on 'Heavy Earth Moving Machinery (HEMM)'.

The following series of product specific safety standards have been developed:

Part 2 Requirements for tractor dozers, Part 4 Requirements for backhoe loaders,

Part 6 Requirements for dumpers, Part 7 Requirements for scrapers,

Part 8 Requirements for graders, Part 9 Requirements for pipelayers,

Part 10 Requirements for trenchers, Part 11 Requirements for earth and landfill compactors,

Part 12 Requirements for cable excavators and Part 13 Requirements for rollers.

All the above mentioned standards specifies the safety requirements of the particular Heavy earth moving machinery. These standards are intended to be used in conjunction with IS 17055 (Part 1), which specifies general safety requirements common to two or more earth moving machine families.

This document deals with all significant hazards, hazardous situations and events related to the earth moving machinery when used as intended or under conditions of misuse reasonably foreseeable. They specify the appropriate technical measures for eliminating or reducing risks arising from relevant hazards, hazardous situations or events during commissioning, operation and maintenance of the machinery.