THE RUBBER WALL DAMPER FOR FRAMED STRUCTURES

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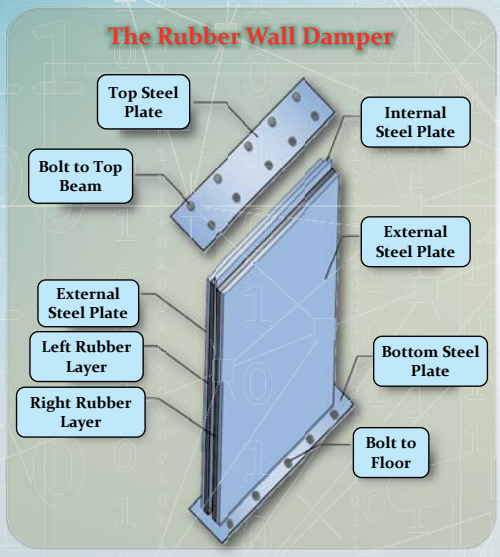
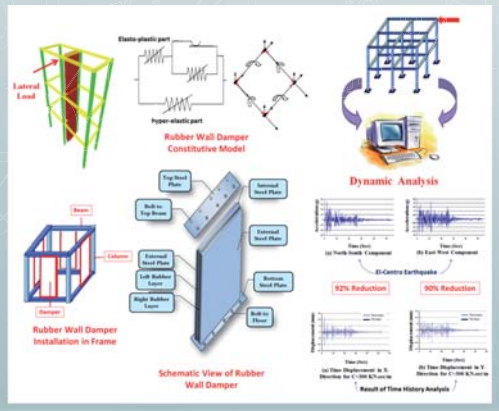
Viscous Wallpaper



PROCESS



INTRODUCTION

Rubber wall damper is one of the inventive passive energy dissipation techniques which can increase the overall lateral resistance capacity and damping characteristic of the structures. Nowadays, Malaysia is known as one of major countries in production and exportation of rubber materials. So, in the present work, the latest concepts of rubber wall damper and rubber wall damping device have been implemented with the use of advance technology and techniques of Malaysian rubber to reduce dynamic load effect and preclude vibration damage of buildings. The rubber wall damper component can be implemented to any structure which is subjected to vibration and it can be assure the serviceability and safety design criteria.

OUR INNOVATION

- In line with latest development in this field current research deals with following claim:
- Development rubber wall damper device using Malaysian rubber product.
- Development of 3D nonlinear rubber wall damper element.
- Development of a finite element technique to inelastic analysis of 3 Dimensional reinforce concrete buildings equipped with rubber wall damper system.
- Developed of finite element program code for nonlinear analysis of RC buildings with supplemental wall damper devices.
- Applicable for design of new earthquake resistance buildings and retrofitting and rehabilitation of existing buildings.

INDUSTRIAL APPLICATION

- Construction and housing companies
- Building and Structures Consultant Companies
- Government organization deals with housing industry and analysis and design of high rise building against earthquake
- Bridge Construction companies
- Mechanical Engineering
- Aerospace and airplane Engineering

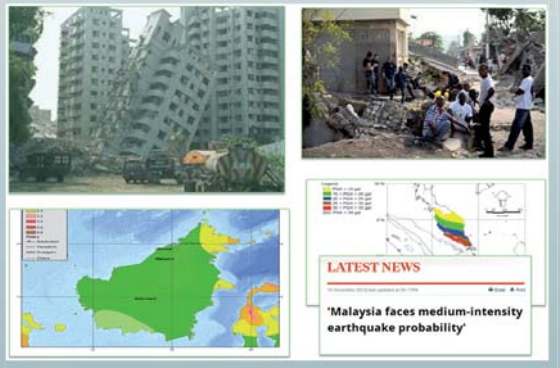
POTENTIAL CONSUMERS

LOCAL MARKET:

This product is the best option to use in high rise buildings which are situated in seismic regions and high monsoon wind belt in Malaysia to reduce the structural damage and guarantee structure safety and serviceability. Also, this product is applicable in all buildings which are subjected to the vibration such as train stations, airport, laboratories and factories.

GLOBAL MARKET:

Since the rubber is one of the main production and exportation of Malaysia, so from economical view, the present product is having high potential to export to all countries which are in prone seismic zone areas.



PROFIT

- Prevent human lost
- Ensure social and psychological confident
- Diminish of seismic damaged of building
- Minimize structural response subjected to earthquake

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