(12) PATENT APPLICATION PUBLICATION

(19) INDIA

(51) International

(86) International

(87) International

Publication No

Filing Date

Filing Date

Application Number

Filing Date

(62) Divisional to

(61) Patent of Addition :NA

to Application Number :NA

Application No

classification

(22) Date of filing of Application :06/08/2022

:E04H0009020000, G01V0001300000,

E02D0027340000, E04B0001980000,

E04H0001040000

:NA

:NA

: NA

:NA

:NA

(21) Application No.202211045047 A

(43) Publication Date: 19/08/2022

(54) Title of the invention: SEISMIC ANALYSIS OF MULTI STORIED REINFORCED CONCRETE RC FRAMED STRUCTURE WITH AND WITHOUT DIAPHRAGM DISCONTINUITY

(71)Name of Applicant:

1)Ms. Deepali Vasudev

Address of Applicant :Assistant Professor, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102 Moradabad ------

2)Mr. Gaurav Hawadiya

3)Ms. Nisha Kashyap

4)Mr. Pramod Kumar Yadav

5)Ms. Sheetal Sagar

6)Mr. Karan Tiwari

Name of Applicant : NA Address of Applicant : NA

Address of Applicant : NA

(72)Name of Inventor:

1)Ms. Deepali Vasudev

Address of Applicant : Assistant Professor, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102

Moradabad -----

2)Mr. Gaurav Hawadiya

Address of Applicant :Assistant Professor & Head, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102 Moradabad ------

3)Ms. Nisha Kashyap

Address of Applicant : Assistant Professor, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102 Moradabad -------

4)Mr. Pramod Kumar Yadav

Address of Applicant :Assistant Professor, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102 Moradabad ------

5)Ms. Sheetal Sagar

Address of Applicant :Assistant Professor, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102 Moradabad ------

6)Mr. Karan Tiwari

Address of Applicant :Assistant Professor, Department of Civil Engineering, SET, IFTM University Moradabad, UP 244102 Moradabad ------

(57) Abstract:

The present invention relates to the field of the Reinforced Concrete (RC) Framed Structure. The invention more particularly relates to the Seismic Analysis of Multi Storied Reinforced (RC) Concrete Framed Structure with and without Diaphragm Discontinuity. These days high rise multi storied structures are quiet prominent. These types of structures, should not only be designed for aesthetic point of view but also must be designed to resist earthquake forces which are subjected on these structures. These earthquake forces acting on the structures are also known as seismic forces. Due to architectural purposes, some buildings, have openings, provided in them, this creates structural discontinuities in the building. These openings or discontinuities can change the load transfer path of the structures which may cause significant change in the building behavior, under the application of the seismic forces. In present invention pushover analysis is carried out to study the behavior of the building in case of architectural opening for staircase or cut outs etc which results in discontinuity in the structure.

No. of Pages: 25 No. of Claims: 8