

BULLETIN OF EARTHQUAKE RESISTANT STRUCTURE RESEARCH CENTER

No.35
MARCH 2002

Contents	
Foreword	K. Sudo, Dr. of Science 1
Papers	
Provisional Report of the June 23, 2001, Atico Earthquake, Peru K. Konagai, K. Meguro, J. Koseki, K. Ohi, H. Sato, J. Koshimura, M. Estrada, J. Johansson, P. Mayorca, R. Guzman and T. Kimura.....	3
Fundamental Analysis for Semi-active Seismic Isolation System with Controllable Friction Damper Using Piezoelectric Actuators E. Sato and T. Fujita	21
Seismic Observation System for a Building and Surrounding Ground in Komaba Research Campus G.D. Calle, M. Kohiyama and F. Yamazaki	31
Effect of Structural Parameters on Fragility Curves of Highway Bridges Based on Numerical Simulation K. R. Karim and F. Yamazaki	45
Assessment of Satellite Imagery Capability for Damage Detection Using Landsat 7/ETM+ Images for the 2001 Atico, Peru Earthquake M. Estrada, M. Kohiyama and F. Yamazaki.....	65
Simplification of Non-linear Dynamic Design Procedure on Steel Moment-resisting Frames to Seismic Actions T. Ito, K. Ohi and P. Khandelwal	79
Cyclic Loading Tests on Semi-rigid Partial-strength Connections with Column Skin Plate Deformation R. Guzman, Z. Lan, K. Ohi, Y. Shimamura and H. Otsuka	93
Effect of Seismic Base Fault Motion on Stress and Deformations in Soil Deposit –a 3D Numerical Approach- P. K. Ramencharla and K. Meguro	105
Simulation of Failure Mechanism of Vulnerable RC Column before and after Seismic Strengthening F. Uehan and K. Meguro	115
Use of Earthquake Prediction Data for Cost-Benefit Evaluation of Retrofitting Existing Houses M. Yoshimura and K. Meguro	125
Application of Power Demand Changes to Evaluate Building and Dwelling Damages due to Earthquake K. Meguro and Y. Hada	135
System for Promotion of Retrofitting of Existing Pre-code Revision Structures K. Meguro and T. Takahashi.....	145
Vibration Experiments of Tension Truss Dome as an Annex on the Former Institute Building at Roppongi A. Nishida, P. Liu, Y. Teshima, Y. Utsumi, N. Araki, T. Kanayama and K. Oda and K. Kawaguchi.....	155
Cyclic Triaxial Tests on Deformation Properties of Softrocks J. Koseki, H. Indo, K. Hayano, T. Sato and M. Torimitsu	163
List of Papers by Members of Earthquake Resistant Structure Research Center.....	175
News	182
Meetings of Earthquake Resistant Structure Research Center	185

**INSTITUTE OF INDUSTRIAL SCIENCE
UNIVERSITY OF TOKYO**

