## **CONTENTS**

Papers	Page
PROBABILISTIC RESPONSE ANALYSES TO EARTHQUAKES by R. Narayana Iyengar and K. T. Sundara Raja Iyengar	207
EQUIVALENT LINEARIZATION FOR RANDOM VIBRATION by Loren D. Lutes	227
BENDING OF CLAMPED ORTHOTROPIC SANDWICH PLATES by G. M. Folie	243
BOUNDS ON LARGE DYNAMIC DEFORMATIONS OF STRUCTURES by Tomasz Wierzbicki	267
CABLE NET: CONTINUOUS SYSTEM ANALYSIS by Hugh Tottenham and Paul G. Williams	277
WATER SURFACE VELOCITIES INDUCED BY WIND SHEAR by Erich J. Plate	295
THREE-DIMENSIONAL BAR CELL FOR ELASTIC STRESS ANALYSIS	
by Alexander Hrennikoff and A. Gantayat	313
by Mahmoud Khojasteh-Bakht and Egor P. Popov	327
EXTENSIBILITY OF CONCRETE AND THEOREMS OF LIMIT ANALYSIS	
by W. F. Chen	341
PLASTIC INDENTATION OF METAL BLOCKS BY FLAT PUNCH by W. F. Chen	353
(over)	

This Journal is published bimonthly by the American Society of Civil Engineers. Publications office is at 2500 South State Street, Ann Arbor, Michigan 48104. Address all ASCE correspondence to the Editorial and General Offices at 345 East 47th Street, New York, N.Y. 10017. Allow six weeks for change of address to become effective. Subscription price is \$10.00 per year with discounts to members and libraries. Second-class postage paid at Ann Arbor, Michigan. EM, SA, SM.

## DISCUSSION

## Proc. Paper 7309

COLLAPSE OF YIELDING STRUCTURES DURING EARTH-QUAKES, by Paul C. Jennings and Raul Husid (October, 1968.  Prior Discussion: Aug., 1969).  closure and errata	367
SEISMIC RESPONSE OF STRUCTURE-FOUNDATION SYSTEMS, by Richard A. Parmelee, David S. Perelman, Seng-Lip Lee, and Leon M. Keer (December, 1968. Prior Discussions: June, 1969, and October, 1969).  closure and errata	368
BEARING CAPACITY OF CONCRETE BLOCKS OR ROCK, a by W. F. Chen and D. C. Drucker (August, 1969. Prior Discussions: None).  by A. R. Santhakumar, L. K. Kamaraj, and M. Lakshmipathy	370
HYPERBOLOIDS OF REVOLUTION SUPPORTED ON COLUMNS, a by Phillip L. Gould, and Seng-Lip Lee (October, 1969. Prior Discussions: None).  by David G. Elms	372
AXISYMMETRIC FINITE DEFLECTION OF CIRCULAR PLATES, by Gordon B. J. Mah (October, 1969. Prior Discussions: None).  by Robert Schmidt	<b>3</b> 73
LIFE EXPECTANCY OF HIGHWAY BRIDGES TO VEHICLE LOADS, by Chi Chao Tung (December, 1969. Prior Discussions: None). errata	0.54
Ciiata , , , , , , , , , , , , , , , , , ,	374

## INFORMATION RETRIEVAL

The key words, abstract, and reference "cards" for each article in this Journal represent part of the ASCE participation in the EJC information retrieval plan. The retrieval data are placed herein so that each can be cut out, placed on a  $3 \times 5$  card and given an accession number for the user's file. The accession number is then entered on key word cards so that the user can subsequently match key words to choose the articles he wishes. Details of this program were given in an August, 1962 article in CIVIL ENGINEERING, reprints of which are available on request to ASCE headquarters.

<sup>&</sup>lt;sup>a</sup> Discussion period closed for this paper. Any other discussion received during this discussion period will be published in subsequent Journals.