

1967 FALL CONVENTION

PROGRAM



HOTEL FORT DES MOINES

October 30 - November 3, 1967

DES MOINES, IOWA

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Detroit, Michigan 48219

ACI REGISTRATION \$10.00

Registration daily October 30 - November 3 in the Assembly Area on the Mezzanine Floor. Registration fee payable at the convention registration desk covers all the general sessions, symposia, and the technical committee meetings listed in this program.

NOTE FOR PROGRAM PARTICIPANTS

A program breakfast is planned for Thursday at 7:30 a.m. in the City Room. Breakfast is by invitation only.



University of Illinois Alumni Breakfast . . . 7:30 a.m.
Wednesday in the Grand Ballroom. Tickets available
from alumni and the University of Illinois staff
members. \$2.50



Cocktail Party "Concrete Mixer" . . . 6:30 p.m. Thurs-
day in the State Ballroom. Wear your registration
badge.



NOTE FLOOR PLAN ON PAGE 6 OF YOUR PROGRAM

ACI Headquarters and Press Room in Room B on the
Mezzanine Floor.



*Please note any change, or addition to, the committee meeting schedule or room assignments on the bulletin board. You will find the bulletin board located near the registration desk.

*"Concrete Mixer" Cocktail Party . . . 6:30 p.m. Thursday in the State Ballroom.

MONDAY, October 30

9:00 a.m. to 12:00 Noon

COMMITTEE	Meeting Room
201 Durability of Concrete	Wedgwood
318 Subcommittee 8, Building Code—Reinforcement	City
435 Subcommittee 3, Deflections—Composite Beams	Governor

2:00 p.m. to 5:00 p.m.

207 Mass Concrete	City
213 Lightweight Aggregate Concrete	Capital
318 Subcommittee 9, Building Code—Design	Room A
347 Formwork for Concrete	Wedgwood
438 Torsion	State

7:00 p.m. to Midnite

347 Formwork for Concrete	Wedgwood
352 Connections in Monolithic Structures	Room A
438 Torsion	State
531 Concrete Masonry Structures	Capital

TUESDAY, October 31

9:00 a.m. to 12:00 Noon

COMMITTEE	Meeting Room
224 Cracking	Capital
318 Subcommittee 20, Building Code—Slabs and Joists; and Committee 421—Reinforced Concrete Slabs (Joint session on Reinforced Concrete Slabs)	Grand Ballroom (South End)
428 Limit Design	Grand Ballroom (North End)
441 Columns	Wedgwood
443 Bridge Design	State
524 Portland Cement Plastering	Room A
533 Subcommittee 2, Precast Panels	See bulletin board

2:00 p.m. to 5:00 p.m.

104 Notation	Drake-North
118 Use of Computers	City
344 Circular Prestressed Concrete Structures	Drake-South
428 Limit Design	Grand Ballroom (North End)
443 Concrete Bridge Design	State
504 Joint Sealants	Capital
512 Precast Structural Concrete	Grand Ballroom (South End)
524 Portland Cement Plastering	Wedgwood

7:00 p.m. to Midnite

114 Research and Development	Drake-North
118 Use of Computers	City
214 Evaluation of Results of Strength Tests of Concrete	335
223 Expansive Cement Concretes	Grand Ballroom (North End)
308 Curing Concrete	Capital
311 Inspection of Concrete	Grand Ballroom (South End)
316 Construction of Concrete Pavements and Concrete Bases	Room A
318 Subcommittee 13, Building Code—Bond	317 & 318
333 Composite Construction	Governor
344 Circular Prestressed Concrete Structures	Drake-South
443 Concrete Bridge Design	State
516 High Pressure Steam Curing	Wedgwood
533 Precast Panels	321 & 322

9:00 a.m. to 12:00 Noon

COMMITTEE	Meeting Room
117 Tolerances	335
119 Education	City
309 Consolidation of Concrete	Governor
311 Inspection of Concrete	Capital
318 Standard Building Code	Grand Ballroom (North End)
344 Circular Prestressed Concrete Structures	Drake-South
348 Structural Safety	Wedgwood
443 Concrete Bridge Design	321 & 322
515 Coatings for Concrete	317 & 318
523 Insulating and Cellular Concretes	State
543 Concrete Piles	Drake-North

2:00 p.m. to 5:00 p.m.

119 Education	Room A
215 Fatigue of Concrete	335
301 Specifications for Structural Concrete	317 & 318
304 Measuring, Mixing, and Placing Concrete	Grand Ballroom (South End)
309 Consolidation of Concrete	City
318 Standard Building Code	Grand Ballroom (North End)
344 Circular Prestressed Concrete Structures	Drake-South
348 Structural Safety	Wedgwood
423 Prestressed Concrete	State
443 Concrete Bridge Design	321 & 322
503 Adhesives for Concrete	Capital
543 Concrete Piles	Drake-North

7:00 p.m. to Midnite

211 Proportioning Concrete Mixes	Grand Ballroom (North End)
301 Specifications for Structural Concrete	317 & 318
305 Hot Weather Concreting	Wedgwood
325 Structural Design of Concrete Pavements for Highways and Airports	335
344 Circular Prestressed Concrete Structures	Room A
408 Bond Stress	Governor
423 Prestressed Concrete	State
443 Concrete Bridge Design	321 & 322
503 Adhesives for Concrete	Capital
517 Low Pressure Steam Curing	City

9:00 a.m. to 12:00 Noon . . . Grand Ballroom

Welcome to Iowa — Carl E. Ekberg, Jr., general chairman, 1967 Fall Convention, professor and head, Department of Civil Engineering, Iowa State University, Ames, Iowa

INSPECTION AND QUALITY CONTROL OF CONCRETE

(ACI Committee 311)

CHAIRMAN: Dixon O'Brien, Jr., Chairman of ACI Committee 311, and project engineer, Soil Testing Services, Inc., Northbrook, Illinois

Specifications, the Starting Point — Russell S. Fling, president, Fling and Eeman, Inc., consulting engineers, Columbus, Ohio

Responsibility of the Design Engineer — Bertold E. Weinberg, planning coordinator, State University Construction Fund, Albany, New York

Contractor Competency, the Key to Minimum Inspection — Roger H. Corbetta, board chairman, Corbetta Construction Co., New York, New York, and president, American Society of Concrete Constructors

Quality Control Does Not Cost; It Pays — Raymond C. Reese, consultant, Raymond C. Reese Associates, consulting engineers, Toledo, Ohio

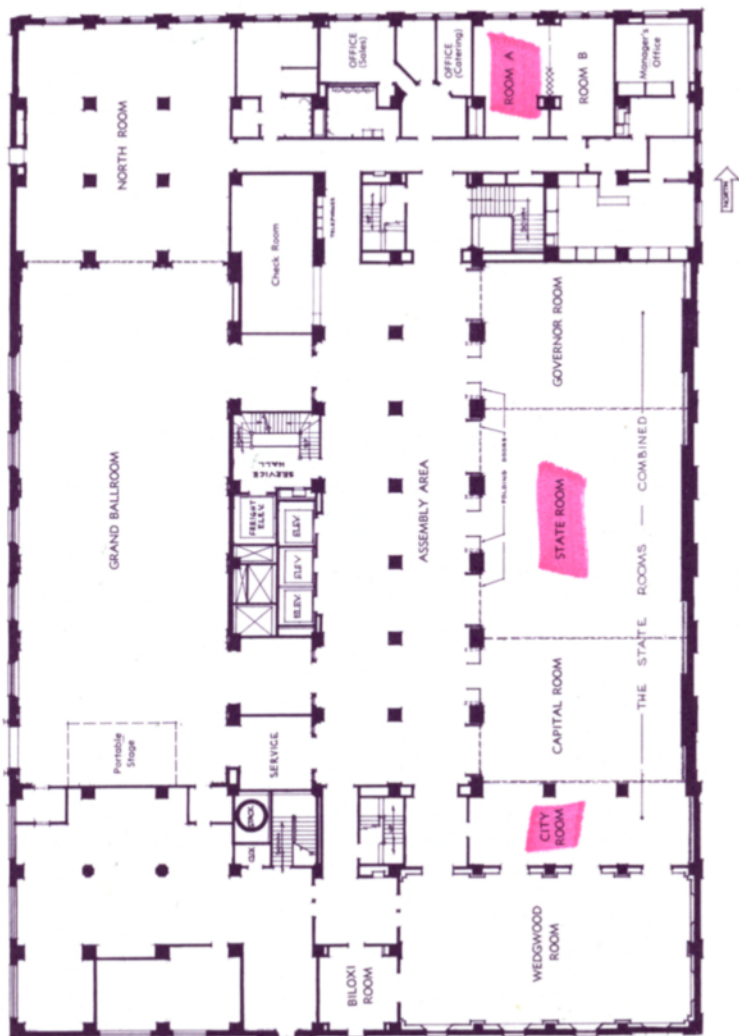
Training and Concrete Quality — A Cement Company's View — Joseph J. Waddell, technical service engineer, Riverside Cement Division, American Cement Corporation, Riverside, California

A Typical Procedure for Reinforced Concrete Inspection and Various Inspection Problems Encountered in the New York and New Jersey Areas — J. Di Stasio, partner, Di Stasio and Van Buren, consulting engineers, New York, New York, and president, Cippoc Corporation, Spring Lake Heights, New Jersey (**Paper to be presented by John Hogan.**)

FLOOR PLAN

Mezzanine Floor

Drake - North, Drake - South and the 300 series rooms are located on the third floor. You will find all of the other meeting rooms on this floor plan.



THURSDAY, November 2

2:00 p.m. to 5:00 p.m.

Concurrent with the first session on
ULTIMATE STRENGTH DESIGN

RESEARCH State Ballroom

(ACI Committee 115)

The Research in Progress session differs from the other ACI general sessions in that the reports given are not released for publication. Request is made that the proceedings be regarded as confidential.

CHAIRMAN: Adrian Pauw, chairman of ACI Committee 115, acting dean, College of Engineering, University of Missouri, Columbia, Missouri

SECRETARY: J. H. Walker, secretary, ACI Committee 115, and vice-president for research and development, Research and Development Division, Portland Cement Association, Skokie, Illinois

Causes of and Cures for Iowa Shale-Induced Concrete Popouts — Derwin C. Merrill, instructor of civil engineering; and R. L. Handy, professor of civil engineering, Engineering Research Institute, Iowa State University, Ames, Iowa

Corrosion of Steel in Lightweight Concrete Specimens — S. B. Helms, research engineer; and A. L. Bowman, research chemist, Research Laboratory, Lehigh Portland Cement Company, Coplay, Pennsylvania

Pore Characteristics of Concrete Aggregates by Evaporation Techniques — Reid H. Brown, associate research engineer, Research and Development Division, Portland Cement Association, Skokie, Illinois

Rapid Test for the Strength-Producing Potential of Cement — Delmar L. Bloem, director of engineering, National Sand and Gravel Association and National Ready Mixed Concrete Association, Silver Spring, Maryland

CONCURRENT

THURSDAY, November 2

2:00 p.m. to 5:00 p.m.



RESEARCH (Cont.) State Ballroom

Accelerated Strength Testing of Concrete — Thomas W. Brockenbrough, assistant dean of engineering, College of Engineering, University of Delaware, Newark, Delaware; and Gene H. Schaller, assistant construction engineer, Delaware State Highway Department, Dover, Delaware

Study of Creep in Concrete by Statistical and Probability Models — Haresh C. Shah, associate professor of civil engineering; and Tsu Yao Chow, graduate student, Towne School of Civil and Mechanical Engineering, University of Pennsylvania, Philadelphia, Pennsylvania

Deck Slab Cracking in Continuous Reinforced Concrete Girder Bridges — Hans Gesund, professor of structural engineering, Department of Civil Engineering, University of Kentucky, Lexington, Kentucky; and James H. Havens, director, Division of Research, Kentucky Department of Highways, Lexington, Kentucky

Connections Between Precast Structural Members — Robert G. Mathey, assistant chief; and Edward O. Pfrang, chief, Structures Section, Building Research Division, IAT, National Bureau of Standards, Washington, D.C.

Shear Resistance of Perforated Reinforced Concrete Slabs — Frederic Roll, professor of civil engineering; and Saizid T. H. Zaidi, research fellow, Towne School of Civil and Mechanical Engineering, University of Pennsylvania, Philadelphia, Pennsylvania

Behavior of Deep Reinforced Concrete Slabs Loaded to Ultimate Capacity — Edward J. Rhomberg, associate professor of civil engineering, University of New Mexico, Albuquerque, New Mexico

SESSIONS

THURSDAY, November 2

2:00 p.m. to 5:00 p.m.



ULTIMATE STRENGTH DESIGN

. . . . Grand Ballroom

(ACI Committee 340)

CHAIRMAN: Ray E. Untrauer, professor in charge, Structural Research Laboratory of Iowa Engineering Experiment Station and Structural Engineering Section, Department of Civil Engineering, Iowa State University, Ames, Iowa

2:00 **Introduction** — Noel J. Everard, chairman, ACI Committee 340, and professor of structural engineering, Experiment Station and Engineering Mechanics, University of Texas at Arlington, Arlington, Texas

2:05 **Flexure** — Fritz Kramrisch, assistant chief structural engineer and associate, Albert Khan Associated Architects and Engineers, Inc., Detroit, Michigan

2:40 **Shear** — Charles W. Thurston, associate professor of civil engineering, Department of Civil Engineering and Engineering Mechanics, Columbia University, New York, New York

3:10 **Bond** — Albert J. Gouwens, assistant engineer, Advanced Engineering Group, Portland Cement Association, Chicago, Illinois

3:30 **BREAK**

3:40 **Columns** — Noel J. Everard, professor of structural engineering, Department of Engineering Mechanics, University of Texas at Arlington, Arlington, Texas; and Robert M. Dinnat, professor of civil engineering, Department of Civil Engineering, Georgia Institute of Technology, Atlanta, Georgia

4:10 **Footings** — Jacob Grossman, chief engineer, Robert Rosenwasser, Consulting Engineer, New York, New York

4:35 **Deflection** — Noel J. Everard, professor of structural engineering, Department of Engineering Mechanics, University of Texas at Arlington, Arlington, Texas

CONCURRENT

FRIDAY, November 3

9:00 a.m. to 12:00 Noon



Note time designations for each topic

DESIGN AND MATERIALS . State Ballroom

CHAIRMAN: David H. Comann, vice-chairman, 1967 Fall Convention, and district engineer, Portland Cement Association, Des Moines, Iowa

9:05 **Structures Teaching in Architectural Schools** — Pedro L. Koe-Krompecher, visiting professor, School of Architecture, University of Kentucky, Lexington, Kentucky

9:45 **Compression Seals for Bridges** — Stewart C. Watson, sales manager, Acme Highway Products Corporation, Buffalo, New York

10:25 BREAK

10:40 **Staggered Wall Beams for High-Rise Buildings** — Mark Fintel, manager, Design Section, Portland Cement Association, Chicago, Illinois

11:20 **Behavior of Reinforced Concrete Frames Subjected to Alternating Sway Forces** — Fred W. Beaufait, assistant professor of structural engineering; and Ronald R. Williams, graduate student, Department of Civil Engineering, Vanderbilt University, Nashville, Tennessee

SESSIONS

FRIDAY, November 3

9:00 a.m. to 12:00 Noon



Note time designations for each topic

ULTIMATE STRENGTH DESIGN . . . Grand Ballroom

Second Session

(ACI Committee 340)

CHAIRMAN: Edward Cohen, partner, Ammann and Whitney, Consulting Engineers, New York, New York

9:05 **Torsion** — Gordon P. Fisher, head, Department of Environmental Systems Engineering, Cornell University, Ithaca, New York

9:45 **Slender Columns** — Alfred L. Parme, director, Advanced Engineering Group, Portland Cement Association, Chicago, Illinois

10:25 BREAK

10:40 **Crack Control in Reinforced Concrete Structures** — Edward G. Nawy, professor of civil engineering, Department of Civil Engineering, Rutgers University, New Brunswick, New Jersey

11:20 **Deflections** — Dan E. Branson, professor of civil engineering, Department of Civil Engineering, University of Iowa, Iowa City, Iowa

FINAL SESSION

FRIDAY, November 3

2:00 p.m. to 5:00 p.m.



NEW PROVISIONS FOR SHEAR DESIGN

. . . **Grand Ballroom**

(ACI-ASCE Committee 426)

CHAIRMAN: Roger Diaz de Cossio, chairman, Committee 426, and research professor and head, Graduate Division, Instituto de Ingenieria, Ciudad Universitaria, Mexico, D. F., Mexico

Development of Shear Provisions for Revision of the ACI Building Code — Eivind Hognestad, director of development, Research and Development Division, Portland Cement Association, Skokie, Illinois

Shear Design for Prestressed Concrete and Members with Axial Load — James G. MacGregor, professor of civil engineering, Department of Civil and Municipal Engineering, University of Alberta, Edmonton, Alberta, Canada; and John M. Hanson, senior development engineer, Structural Development Section, Research and Development Division, Portland Cement Association, Skokie, Illinois

Shear Design for Brackets and Deep Beams — John A. Sbarounis, principal structural engineer, P and W Engineers, Inc., Chicago, Illinois

Shearhead Reinforcement for Slabs—W. Gene Corley, manager, Structural Development Section, Research and Development Division, Portland Cement Association, Skokie, Illinois

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NOTES