

# the news

PHILADELPHIA SECTION



AMERICAN SOCIETY OF CIVIL ENGINEERS

Vol. 51 - 1

Our 66th Year

October, 1978

## OCTOBER LUNCHEON MEETING

Philadelphia Section, American Society of Civil Engineers

**TUESDAY, OCTOBER 10, 1978**

Engineers' Club, 1317 Spruce Street, Philadelphia

Lunch — 12 Noon

Meeting — 12:30 P.M.

**SUBJECT:**

**CENTER CITY COMMUTER RAIL CONNECTION**

**SPEAKER:**

**BERNARD GOLDENTYER, PE**

Project Manager, Department of Public Property, City of Philadelphia

**PROGRAM HOST:**

**FRED PLOTNICK, Chairman, Construction Group**

The Center City Commuter Rail Connection (CCCRC) is one of the most controversial transportation projects ever undertaken in Philadelphia. The \$308 million project will link and integrate the metropolitan Philadelphia regional rail network. Technical problems include major utility relocations, complex underpinning and detailed coordination of work to minimize the impact on the CBD and existing transportation system.

A native Philadelphian and a graduate of Central High School, Mr. Goldentyer has earned Bachelor's and Master's degree in Civil Engineering from Drexel University. He also holds a Master's degree in Public Administration from the University of Pennsylvania. A member of several scientific and professional societies, Mr. Goldentyer is a registered professional engineer in Pennsylvania and New Jersey and has served on technical advisory committees for R&D projects in the transit and public works fields. Since 1962 he has been employed by the City of Philadelphia in a variety of positions. He is presently Project Manager for CCCRC. He and his wife Nancy, a psychologist, live in Northeast Philadelphia and are the parents of three children.

**SPECIAL FEATURE:**

**TEMPLE UNIVERSITY NIGHT**

The ASCE Student Chapter members, faculty and alumni of the Civil Engineering Department of Temple University College of Engineering Technology will be honored at this meeting. All students, faculty and alumni are cordially invited to attend.

## TECHNICAL GROUP ACTIVITIES

### Geotechnical

Date: **Tuesday, October 17, 1978**

**7:00 P.M.** — Engineers' Club

Subject: **Mine Subsidence**

Speaker: **Richard Mabry,**

Woodward-Clyde Consultants

Program Host: **Scott A. Fritzinger,**

Chairman, Geotechnical Group

Refreshments are served.

At a Group meeting on September 19, 1978, **Kenneth J. Zitomer**, Deputy Commissioner, Phila. Water Department, and recently installed Second Vice-President of the Phila. Section, was the principal speaker on the subject: Rock Tunnels in Philadelphia.

### Hydraulics and Sanitary

#### September Meeting

At the well attended H & S Group Luncheon Meeting at the Engineers' Club, September 27, 1978, **Michael D. Nelson**, Chief, Water Pollution Control Division, Phila. Water Department spoke on the subject, Wastewater Treatment Plant Upgrading Using "Surfact". **Patrick R. Cairo**, Vice-Chairman, Hydraulics and Sanitary Group was Program Host. The talk described the results of pilot plant and full-scale testing of the "Surfact" system at the Northeast Water Pollution Control Plant.

#### November Meeting

Date: **Wednesday, November 1, 1978**

**Luncheon Meeting** — Engineers' Club

**12:00 Noon**

Subject: **Chemical Waste Disposal in the Future**

Speaker: **Ron Buchanan**, Chief, Bureau of Chemical and Hazardous Wastes, New Jersey Department of Environmental Protection

(continued on page 4)

Mail Reservation Cards Immediately or call Mr. deKovacs at the Engineers' Club — PE 5-5234  
Win a FREE DINNER!

**STUDENTS — Plan to attend for Dinner (Half Price) or meeting after Dinner**

FREE BEER and REFRESHMENTS AT THE MEETING

### THE PRESIDENT'S MESSAGE

It is with great pleasure and gratitude that I commence my term as President of the best group of professional and technical people in the Delaware Valley. The Philadelphia Section ASCE enjoys an excellent reputation in the engineering community as a leader in civil involvement and as an example for professional conduct. I will do my best as your President to maintain this image.

As I look ahead, I recognize that there are three major areas of concern. These are finances, politics, and legislation.

The financial problems and solutions are easily defined. Because of ever rising costs, the Section needs additional operating funds. The solutions are to increase dues, curtail spending or continue to reduce the Humphrey Fund. The Board of Directors has discussed these alternatives and concluded that the dues will remain the same, spending will be curtailed, and only minimal funding will come from the Humphrey Fund.

The more difficult areas to approach are the Political and Legislative. To the engineer these are confusing and frustrating. In the Political arena, with the problems of contracts, contributions, and kickbacks, we find that the engineer has a tendency to shy away from the public's view. We let the more publicity aggressive attorneys vocalize on the issues of which many are technical in nature.

A particularly frustrating area is that of contracts, contributions and kickbacks. Since the Agnew situation, a number of engineers have been involved in illegal payoffs. In these incidents, the politicians involved get indicted and usually convicted. The engineers, however, remain free to practice engineering with no more than an embarrassment. This should not be the case. He is just as guilty as the corrupt politician and should be punished accordingly. I recognize the right of the individual to support financially a candidate or political party of his choice and he should do this. However, every engineer has the right and ability to walk away from any illegal situation. If he chooses not to, he should suffer the consequences.

Another area of great frustration is that of legislation. It is impossible to predict accurately what will happen to proposed legislation. Engineers must, however, continue to monitor legislative activity. We must provide as much input as possible where our expertise is needed or where proposed legislation might affect our well being. In addition, we should not hesitate to contact our political representatives. This is especially true if we have established a rapport with them by supporting their campaign financially or through committee work. We must urge them to vote as we deem appropriate and provide them with pertinent data pertaining to proposed legislation.

As your President, I hope to do what I can to be sure that the engineer's interests are heard in the political arena, and that we remain as involved as possible with legislative matters affecting the engineer.

We have an interesting program for the year. It is one that I am sure you will find beneficial. I thank each of you for this opportunity. In particular, thanks are due the committee chairmen and Board members who work so hard to put our program together and operate and maintain the Philadelphia Section ASCE.

Sincerely,

CHUCK

(C. R. Pennoni, *President*  
Phila. Section, ASCE)

### MEMBERS IN THE NEWS

Phila. Section Past President **Brian J. Lewis** has assumed the position of President of Aqua-Science Corp., Princeton, N.J. The firm specializes in environmental engineering projects.

**Joseph R. Syrnick**, Phila. Section, Assistant Chairman of Publications, has had the following two articles published:  
\* "HIGHWAY NEGLIGENCE SUITS: A City Engineer's View", which appeared in the August issue of **Rural and Urban Roads**.  
\* "ENGINEERING ADVERTISE-

MENT—Where Should The Line Be Drawn", printed in the October issue of **Engineering Issues**, The Journal of Professional Activities, ASCE. This article was the 1977 Zone I Mead Prize winner.

ASCE Life Member **Elmer W. Gain** is the recipient of the 1978 Royce J. Tipton Award, upon the recommendation of the National ASCE Irrigation and Drainage Division to the Board of Direction. Mr. Gain, an active Phila. Section member, received the award at the I & D Division Specialty Conference in Blacksburg, Virginia on July 26-28, 1978.

### Drexel Tri-Span Honored

Don't miss the nice write-up in the September issue of **Civil Engineering** (page 118) on the geodesic tri-span which was designed and built by Drexel seniors as part of a senior design course. Nice going, guys.

### PHILADELPHIA SECTION AMERICAN SOCIETY OF CIVIL ENGINEERS

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#### SEND COPY TO:

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## SPRING HAPPENINGS

### Concrete Canoe Race — April 8, 1978

The Phila. Section for the first time sponsored this annual spring event on the Schuylkill River just south of the Strawberry Mansion Bridge. In previous years the University of Pennsylvania Civil Engineering Department, under the competent direction of **Dr. Frederic Roll** arranged and sponsored the regatta.

Participating schools whose Civil Engineering Students built and manned the canoes included: Widener, Villanova, Drexel, Temple, the University of Pennsylvania, and Princeton.

Winner of the Men's Finals was Princeton's team of **Terry McGrath** and **John Reiling**, who covered the ¼-mile course in the excellent time of 2:32.3. An innovation this year was a Women's Race, and again Princeton's fair sex came in first. Time for the team of **Carol Meier** and **Sue Schindler** was a respectable 2:54.4.

Villanova's **Dennis Shelly** and **Ron Fender** scored first in the faculty race in 3:00 minutes flat. (In this race the Philadelphia Section, using a canoe borrowed from Drexel, entered the usually indomitable team of **Joe Syrnick** and **Bill Malarkey**. But a sudden cross wind forced them off course and they finished fifth in the unenviable time of 4:05.7. It was a gallant effort, though, and we're very proud of our Joe and Bill).

### Student Chapter Conference — April 14, 1978

The 40th Annual Pennsylvania-Delaware ASCE Student Chapter Conference was hosted at Lafayette College, Easton, Pa. The principal objective of the Conference, originally established by the Philadelphia Section in 1926, is an indoctrination of civil engineering students in their profession through the oral presentation of technical papers of their own authorship, on diverse topics of interest to themselves and to their peers. In addition, the Conference provides a forum in which the various Student Chapters discuss common problems and objectives.

Eight papers were presented by student representatives of Lehigh (2 entries), Lafayette, Widener, Drexel (2 entries), Penn State and the Univ. of Pa. All were excellently executed, and a credit to the authors and speakers.

Prize awards were as follows:

**First Prize — Group A** (this category involves laboratory testing and experimentation, as well as investigative research): "Design, Behavior and Model Analysis of Cable-stayed Bridges", by **Frank McCreesh**, Drexel University.

**First Prize — Group B** (requires no lab work, but features literary research and analyses): "Numerical Solutions to Partial Differential Equations Using a Collocation Finite Element Method", by **Michael Celia**, Lafayette College.

**Second Prize — (Tie):** "Bamboo-Reinforced Concrete — An Alternative to Steel-Reinforced Concrete", by **Mark Karpowich** and **Alan Siegfried**, Lehigh University. Mr. Siegfried made the oral presentation. This was a Group A Paper.

**Second Prize — (Tie):** "The Use of Lightweight Concrete in Multi-story Buildings", by **Edmond Speitel**, Drexel University. A Group B paper. (Second and/or third prizes are awarded irrespective of Group A or B category).

Certificates of Honorable Mention were presented to all authors and speakers.

Chairman of Judges for the Conference was Phila. Section Chairman of Publications **Sidney Robin**, who has performed this rewarding task for many years at the Conferences. Joining him as judges were **Robert L. Gifford**, an official of Gilbert Associates, and President of the Reading Branch of the Phila. Section, ASCE; and **Michael Harter**, of Bethlehem Steel Corporation.

### Walnut Lane Bridge Honored

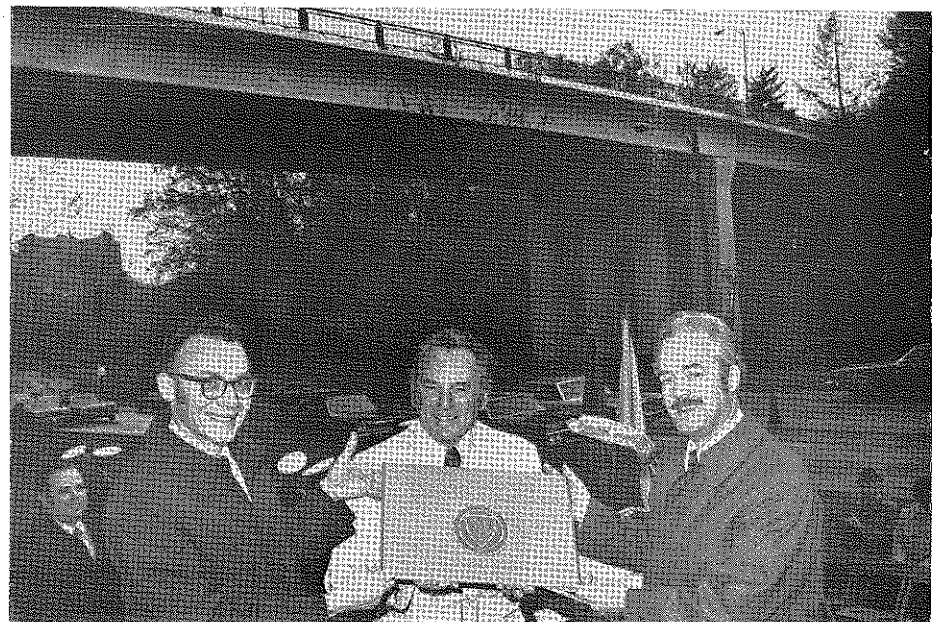
An historic ceremony was conducted, on behalf of the Philadelphia Section, ASCE, by its Committee on the History and Heritage of American Civil Engineering, on May 5, 1978. The function designated the **Walnut Lane Memorial Bridge** over Lincoln Drive — in upper Germantown adjacent to Roxborough and Wissahickon — an **Outstanding Civil Engineering Achievement**.

The Walnut Lane was the first prestressed concrete bridge constructed in the United States. It was dedicated on November 11, 1950 and opened to traffic February 1, 1951. The Bridge honored the memory of the men and women of Philadelphia's 21st and 22nd Wards (the Bridge spans both) who served and died in the United States Armed Services during World War II.

Distinguished guests and speakers included officials of National ASCE as well as the Phila. Section; Historical Societies; business and civic groups; Philadelphia Public Works Department — past and present; Pennsylvania Department of Transportation (PennDOT); and designers and consultants on the original Bridge Project. The event was televised throughout the Metropolitan Philadelphia area.

A bronze plaque describing the designation was installed on the Bridge pier following the ceremonies at the site. A luncheon at a nearby restaurant was hosted by the Section to conclude the memorable day.

In the photo, with the Walnut Lane Memorial Bridge in the background, **Sidney Robin** (center) Chairman of the Phila. Section's Committee on the History and Heritage of American Civil Engineering presents the beautiful bronze plaque to **Robert L. Rowland**, District Engineer, PennDOT (left), accepting for the Commonwealth of Pennsylvania; and **James W. McPhillips**, Chief Engineer and Surveyor, Phila. Dept. of Streets (representing Streets Commissioner **David J. Damiano**), accepting for the City of Philadelphia. Seated at left (background) is National ASCE District 4 Director **Ronald J. Druevich**.



### DAVID SHAW MEAD PRIZE WINNER

For the second consecutive year a Phila. Section member is the Zone I winner of the Daniel W. Mead Prize for Associate Members. He is **David S. Shaw**, of Royersford, Pa. an Engineer with the Consulting firm of Greeley & Hansen.

The Committee on Younger Members of the Society selected Mr. Shaw's paper. As the Zone winner he will receive a suitable certificate that will be sent (in November) to Albert M. Tantalala, Secretary of the Philadelphia Section, for presentation at a time and place to be arranged.

The subject of this year's Mead competition was: **"When in Rome Do as the Romans: Should the Professional and Business Ethics of American Engineers be a Function of the Country in which They Practice?"**

In a letter to Mr. Shaw, ASCE Executive Director Eugene Zwoyer congratulated him for his excellent paper. National Award winner was A. Colin Lanchlan.

The 1977 Zone I winner was Phila. Section's **Joseph Syrnick** for his paper: **Engineering Advertisement — Where Should the Line be Drawn?** This paper was abstracted in the February and March, 1978 issues of THE NEWS.

In 1974, **John E. Spitko, Jr.** Section Director, was the Mead Prize National Award winner.

The Phila. Section is very proud of these accomplishments by its distinguished Associate Members and heartily congratulates them.

### COMMITTEE MEMBERS NEEDED

The Public Relations Committee for the Philadelphia Section has a new Chairman, **Judy Y. Longfield**. There are a number of openings for people interested in serving on this committee. With enough participants, each will need to expend minimal time and effort. There are a number of Section activities this year that are worthy of public announcement and we need to become more ag-

### ENGINEERING SPECIFICATIONS SEMINAR

The New Jersey Industry Advancement Fund (NJIAF) in cooperation with the Philadelphia Section ASCE and others announce a Seminar entitled—**"Engineering Specifications, Their Impact on the Cost of Construction"**.

This seminar will present recommendations for reducing the cost of construction projects by improving engineering specifications, based upon the experience of the panel members and the suggestions in the questionnaire from contractors submitted to the ASCE Committee on Specifications.

DATE: **Tuesday, October 24, 1978**

TIME:

6:00 P.M. Dinner — 7:00 P.M. Program  
LOCATION: The Forsgate Country Club  
Jamesburg, New Jersey (Exit 8A of the New Jersey Turnpike)

The cost of the session is \$15.00. Additional information and registration forms are available by contacting **M. Charles Nugent** at (201) 249-5055.

gressive in promoting our members and interests.

All People interested in helping with this effort should contact Ms. Longfield, either by phone or by mail —

215-864-3922. c/o Catalytic, Inc., 1500  
Market Street, Philadelphia, 19102.

### TECHNICAL GROUP ACTIVITIES

(continued from page 1)

Program Host: **Patrick R. Cairo**, Vice-Chairman, Hydraulics and Sanitary Group

The talk will describe the impact of the newly passed Toxic Substances Control Act on the disposal of chemical wastes in the state of New Jersey.

For details and reservations contact **Clyde S. Younkin**, Greeley, and Hansen, 6 Penn Center, Philadelphia, Pa. 19103, (215) 563-3460.

### Structural

Date: **Wednesday, October 18, 1978**

Luncheon Meeting — Engineers' Club  
12:00 Noon

Subject: **Post-tensioning of the Conowingo Dam**

Speaker: **Edward Marcinkevich**, Engineering Dept., Phila. Electric Co.

Program Host: **Dr. Ish Aneja**, Chairman, Structural Group

Mr. Marcinkevich will discuss the recently completed strengthening and upgrading project at Conowingo Dam which was accomplished by post-tensioning the dam to its foundation.

### WOMEN'S AUXILIARY

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### September Meeting

The Auxiliary's first Luncheon-Meeting of the new season took place at the Engineers' Club on Wednesday, September 20, 1978. **Mary Shoemaker** (Mrs. Edwyn L., Jr.), one of the most active members, was the principal speaker on the subject: "A Visit to Scandinavia".

### October Meeting

The next regular monthly Luncheon-Meeting will be held at the Engineers' Club on **Wednesday, October 18, 1978 — 12:00 noon**. Featured will be Ms. Marie Phillips of American Airlines who will speak and demonstrate on the challenging topic: **"How to Pack for a Two Week Vacation in One Suitcase, Wrinkle-free!"**

**LADIES — JOIN THE SECTION'S AUXILIARY NOW! YOUR SUPPORT IS NEEDED AND YOU WILL ENJOY ALL THE ACTIVITIES. FOR FULL INFORMATION, ATTEND THE OCTOBER MEETING OR CALL MEMBERSHIP CHAIRMAN, MARIE (MRS. KENNETH) ZITOMER — LI 8-5324.**

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