VOL. 37 NO. 6

**SERVING 2000 ENGINEERS & LAND SURVEYORS** 

NOVEMBER, 2001

# HAWAII SECTION AMERICAN SOCIETY OF CIVIL ENGINEERS 2001 OUTSTANDING CIVIL ENGINEERING ACHIEVEMENT AWARD

## NIMITZ HIGHWAY RECONSTRUCTED SEWER

The Nimitz Highway Reconstructed Sewer, owned by the City and County of Honolulu, is the recipient of the 2001 Hawaii Outstanding Civil Engineering Achievement (OCEA) Award. The project consisted of successfully installing a new 8,000 ft long, 36-inch diameter sewer line through downtown Honolulu, a highly congested utility corridor with difficult subsurface soil conditions, by the use of microtunneling.

Lives and property were protected during construction of the project by ensuring adequate support for the microtunneling shafts. Some shafts were constructed as close as one foot from historic 4-story buildings. The microtunneling shafts were covered daily to allow surface traffic to drive through undisrupted.

This project achieved the following technical and industry milestones:

- Successful installation of 8,000 feet of 36inch diameter sewer pipe by microtunneling through highly complex subsurface conditions with no dispute, on schedule, and \$3 million under the allocated budget. The project included 21 drives and 22 access shafts for jacking and/or receiving the drives.
- Completion of the longest (800 feet) remote-controlled drive for 36-inch diameter pipe. The drive was aligned through pre-placed intermediate manholes, to within ½-inch accuracy. The microtunneling alignment was designed and constructed to cross under live 23 and 44kV lines in several locations with only one to two inches of clearance.
- An innovative combination of sheet piles and jet grouting shaft construction methods effectively controlled groundwater inflows and provided for shaft construction with multiple existing utility lines incorporated within the shafts. This unique method allowed construction without delays when unknown, conflicting utilities were encountered.
- Design and installation of 80-foot long jet grout columns, the longest to date. The columns were installed to support the pipeline in variable and highly compressible soils.
- Outstanding partnering efforts by the Owner, Contractor, Design Engineer/Construction Manager, and other stakeholders. These constructive relationships, combined with state-of the-art technology, were instrumental in anticipating potential problems and successfully resolving them in a timely manner.
- The disruptive effects of trenching and dewatering along the highly congested



alignment were avoided. Open trenching would have required the relocation of hundreds of utilities and closure of portions of Queen Street and Nimitz Highway. Major traffic gridlock and severe impacts to people and businesses in downtown Honolulu were avoided.

 A construction cost savings of at least \$10 million and a dramatic shortening of the construction duration were realized by the successful application of microtunneling.

## **KEAIWA STREAM BRIDGE REPLACEMENT**

The recipient of the 2001 Hawaii OCEA Merit Award is Replacement of Keaiwa Stream Bridge on Mamalahoa Highway, owned by the Hawaii Department of Transportation (HDOT), Highways Division. A storm on November 1 and 2, 2000 inundated the east side of the island of Hawaii with 37 inches of rain in a 24-hour period and destroyed the Keaiwa Stream Bridge located just outside the town of Pahala. Floodwaters took out the south side approach of the bridge, widening the previously 80-foot wide stream to over 200 feet.

A design team was quickly assembled by

the Federal Highway Administration (FHWA), HDOT, and County of Hawaii, and given a tight schedule to begin design on November 15 and provide bid documents by December 12. The entire project, which would normally take six months to design, was designed within six weeks. A total team effort enabled the design to be accomplished within the short time period

Major challenges encountered and solved by the designers included the high seismicity of the southeast side of the big island (a peak ground acceleration of 0.8g) and the 42.5degree skew of the wall piers (causing high stresses and shrinkage in the bridge deck).

The new bridge is a reinforced concrete structure, consisting of two abutments and seven continuous spans with expansion joints at the abutments. The bridge is 230 feet long and has a 40-foot wide roadway to accommodate two 11-foot traffic lanes and two 9-foot shoulders. Reinforced concrete wing walls and CRM walls (to preserve the historic presence of the bridge) were used to stabilize the stream

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## **WILIKI MAILING LIST**

Additions and/or corrections should indicate the proper society, institution or association.

#### LAVERNE HIGA

c/o Dept. of Facilities & Maintenance City & County of Honolulu 650 South King Street, 11th Floor Honolulu, Hawaii 96813

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## HAWAII COUNCIL of **ENGINEERING SOCIETIES**

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HOME PAGE:

Chairman:

http://www.eng.hawaii.edu/~hces/HCESHome.html

486-2092

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## **MEETING HIGHLIGHTS**

October 2, 2001

## WILIKI O HAWAII

A cover article is needed for the December 2001 issue. Please submit your articles to Warren Yamamoto at wyamamoto1@co.honolulu.hi.us. Each HCES Member Society is to submit their updated mailing list and the e-mail address of the person responsible for distribution of the Wiliki PDF files ASAP. Please notify your society membership chairperson if you prefer to receive your Wiliki via U.S. Postal Service or e-mail. Societies are to submit updated names to Warren and e-mail addresses to Webmaster Juny La Putt for webuser group.

(continued on page 10)

## CE STUDENT RECEIVES SCHOLARSHIP FROM **BONDED MATERIALS COMPANY**



Timothy Goshi, a junior in Civil Engineering at University of Hawaii College of Engineering, was awarded the 2001-2003 Eric N, Jacobson Memorial Scholarship, donated by Bonded Materials Company. announcement was made by Jeff Deer, President of Bonded Materials Company.

Goshi was awarded two years undergraduate tuition. As part of the scholarship, Goshi also accepted a paid internship with Bonded for employment during the summer of 2002.

The scholarship was created in memory of Eric Jacobson, a beloved and invaluable Product Manager of Bonded Materials Company who suddenly died in 1996. The purpose of the scholarship is to encourage and reward community involvement and academic excellence by engineering students. Bonded Materials, established in Hawaii in 1955, is a diversified manufacturer and distributor of construction and concrete-related products with sales offices in Phoenix, Las Vegas, Saipan, Guam, Oahu, Kona and Maui.

From a list of applicants provided by the College of Engineering at University of Hawaii, Bonded Vice President Lyle Creadick and Ms. Bessie Estonactoc, Executive Assistant to President Jeff Deer, conducted the selection process. Criterial used in selection included academic record, community service, intellectual curiosity, integrity, motivation and interpersonal communication skills.

Timothy Goshi is pictured above with his parents Deanna and John Goshi.

## **ENGINEER & YOUNG ENGINEER OF THE YEAR**

In conjunction with the activities for the Engineer Week 2002, the Hawaii Society of Professional Engineers (HSPE) will select the Hawaii Engineer of the Year and the Hawaii Young Engineer of the Year. HSPE will evaluate the nominees for both awards. The selected engineers will be announced at the Engineers Week Banquet on February 22,

Completed nomination forms must be either postmarked no later than January 23, 2002 or hand delivered to Manny Lanuevo by the end of business day on January 25, 2002 at the following address:

Hawaii Society of Professional Engineers c/o Manuel S. Lanuevo Honolulu International Airport 400 Rogers Blvd., Suite 700 Honolulu, Hawaii 96819-1880

#### Requirements for Engineer of the Year Candidate

- Shall be current practicing Licensed Professional Engineer in the State of Hawaii;
- 2. Shall be current State of Hawaii resident;
- 3. Need not be a member of HSPE or any other society; and
- Shall not be a State Officer or Director for HSPE.

### Requirements for the Young Engineer of the Year Candidate

- 1. Shall be less than 35 years of age as of Jan. 1st of the year the award is to be presented:
- Shall be a current practicing Licensed Professional Engineer in the State of Hawaii:
- 3. Shall be a current State of Hawaii resident:
- 4. Need not be a member of HSPE or other society; and
- 5. Shall not be a State Officer or Director of HSPE.

### Criteria for Young Engineer & Engineer of the Year Awards:

- 1. Technical Accomplishment (Technical Awards, Papers & Presentations, Major Projects) - 30%
- 2. Professional History & Contributions (Positions Held, Professional Affiliations, Special Contributions to Profession & Special Recognitions) - 35%
- 3. Civic & Community Contributions (Affiliations, Positions Held, Special Recognitions) - 20%
- Recommendation (Why the individual is being nominated) - 15%

## EXPANDED EFFORT EQUALS INCREASED ENROLLMENT

The beginning of the school year has brought many new faces to the University of Hawai'i College of Engineering: The college was proud to welcome 120 incoming freshmen to Holmes Hall, an 18-percent increase in enrollment over last year.

The primary reason for this increase was the support of an army of 256 alumni, students, faculty members, and staff, who donated their time, effort, and knowledge to help promote engineering and the college. Each of the volunteers had an important role, serving as ambassadors, leading tours of the facilities, answering questions, performing demonstrations, handing out programs, or serving lunch-

The College of Engineering thanks all of the volunteers for their hard work. Their efforts have encouraged many young men and women to pursue their studies in engineering. Their efforts have also shown that the College of Engineering is not just a learning institution, it is also a family of professors, students, alumni, and staff, all willing to help and support one another. It is this togetherness and their belief in the college that has fueled its growth.

The increase in freshman enrollment was evident in the three engineering disciplines. Mechanical engineering enjoyed the largest jump, 67 percent, the most the department has experienced since 1994. Civil engineering freshman enrollment rose 25 percent, the highest in two years. The electrical engineering department had a 2-percent increase in enrollment. The electrical engineering freshman class, consisting of 60 students, is the largest since 1997.

The total COE student population is up 6 percent over the previous year, which is the first overall increase the college has seen in eight

General interest in engineering is also on the rise. There was a 21-percent boost in COE applications. By department, civil engineering saw a 36-percent increase, electrical 14, and mechanical 18

Some of the overall increase was credited to the college's extensive recruitment efforts. During the past year there were more than 35 recruitment and outreach events. Holmes Hall and the Pacific Ocean Science and Technology Building were the settings for many of them, such as the Architecture and Engineering Exploration Day, Rainbow Day, Engineering Expo, and Open House. Attendees were given a tour of the facilities, introduced to the micro-mouse and concrete canoe student teams, and shown demonstrations in various laboratories.

(continued on page 11)



2540 Dole Street, Holmes Hall Honolulu, Hawaii 96822

## **COLLEGE DEANS AND CHAIRS**

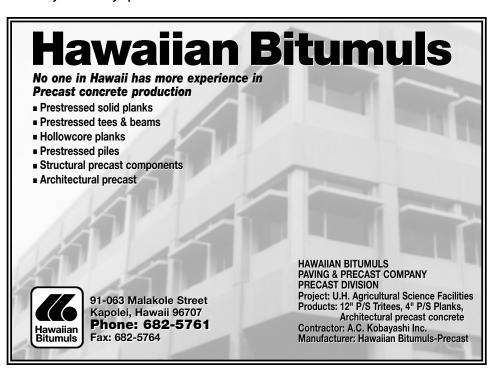
W.F. Chen 956-7727 Dean Chair, CE Edmond Cheng 956-7550 956-8403 Chair, EE Anthony Kuh 956-7167 Chair, ME Bruce Liebert



Noelani School students and Randy Akiona, CE faculty member, demonstrate the strength of a truss bridge.



Students demonstrate teamwork for COE students and alumni during the Sacred Hearts Academy Science Symposium for Girls.





P.O. BOX 3348, HONOLULU, HI 96801 Web Page URL http://www.seaoh.org

#### **2001 OFFICERS & DIRECTORS**

Position	Officer	Phone	Fax
President	Dennis Hanatani	737-9488	735-1432
Vice Pres	Tom Tanimura	536-7692	537-9022
Secretary	Darin Okuda	689-5400	689-5406
Treasurer	Craig Sakanashi	942-9100	942-1899
Director	Irving Hirata	839-0606	839-0396
Director	Wes Segawa	536-4495	524-4466
Past Pres	Glenn Miyasato	488-7579	488-7818

## **HIGHLIGHTS OF BOD MEETING**

October 1, 2001

Reviewed and approved treasurer's report. Current general checking account balance: \$7,304.01. Current money market account balance: \$5,975.22. Current convention checking account balance: \$6,363.02.

Status of Past Treasurer's Audit: Craig Sakanashi reported that a letter was received from Gina Ichiyama, indicating that the she has completed the 1999 audit and found it to be accurate.

2000 Tax Return: Craig Sakanashi reported that the 2000 tax return has been filed.

Quicken Software: Craig Sakanashi reported that he has reviewed both Quicken and Quickbooks software for SEAOH's financial records. The Board will further discuss the of use financial software for SEAOH at the next Board meeting. Members with any concerns should contact a Board member.

September 20 General Membership Meeting Report and Revised June 21 General Membership Meeting Report: The Board reviewed and accepted the Income and Expenditures Reports for the meetings prepared by Tom Tanimura.

**New Membership Applications:** Adriano Bortolin of the Sika Corporation and Steve Duddles of the Simpson Strong-Tie Co., Inc. have applied for membership as Affiliate Members. Brian Board of Englekirk Partners, Inc. has applied for membership as an Allied Member. Their applications will be voted on in the December Board meeting.

September 21 WCSEA Board Meeting Report: Dennis Hanatani presented a brief report on the WCSEA Board meeting held at the WCSEA Convention on September 20, 21, and 22, 2001 in Park City, Utah. A WCSEA treasurer's report was received from Dennis. Some of the issues discussed at the meeting were the purpose of the Western Council, the Building Seismic Safety Council, the Applied Technology Council, licensing, continuing education programs, and complex building codes. Members interested in more detailed information about the WCSEA Board meeting should contact Dennis.

**NCSEA Convention:** Tom Tanimura will be attending for the NCSEA Ninth Annual Conference in New Hampshire on October 3-6, 2001. Tom will be presenting the issue of complex building codes at the conference.

**SEAOH Dues Increase:** The proposed amendment to the By-Laws regarding an increase in membership dues requires an acceptance by Members. Glenn Miyasato will be mailing ballots to Members.

**September 26 Project Impact Meeting Report:** Tom Tanimura reported that SEAOH has become a partner with Project Impact. SEAOH will be assisting in promoting educational programs for hazard mitigation and the construction of safe rooms.

### Committee Reports:

**Program:** Tom Tanimura presented a revised schedule of upcoming meetings and seminars. See calendar of events for revised topics. The breakfast meeting scheduled for October 30, 2001 was postponed until February 2002.

**2001 Annual Convention Financial Update:** Glenn Miyasato reported that there has not been a change since the last Board meeting.

Nomination of 2002 Officers and Directors - Elections/Ballots: Glenn Miyasato reported that the ballots have been mailed to Members with the proposed amendment to the By-Laws. Results of the Election are as follows: President- Tom Tanimura; Vice President-Randy Chu; Secretary- Russ Miyahara; Treasurer- Craig Ellingson; Director- Ibottson Kellet; Hold-over Director- Wesley Segawa.

**HCES:** Irving Hirata that Wiliki will convert to an electronic version in 2002. Irving will get more information about the conversion and also a budget report from HCES. The Board will vote at the next meeting on continuing Wiliki subscriptions.

**2002 Installation Banquet:** The Board voted and approved having a plastic surgeon from Straub Clinic and Hospital speak at the banquet

**2002 Annual Convention in Japan:** Glenn Miyasato presented a revised date, schedule and travel package for the convention. The Board voted to accept the proposal from Kobayashi Travel for travel arrangements.

**Board Discussion Topic #2 – IBC 2000 and NFPA 5000:** The Board deferred discussion to the next Board meeting.

## 2001 CALENDAR OF EVENTS

November 3, 2001 - ASCE/SEAOH Turkey Tennis Challenge. See the SEAOH website at www.seaoh.org or call Mike Kasamoto at 955-6834 for more information and registration.

November 14, 2001 – Seminar on the Design of Concrete Buildings for Earthquake and Wind per UBC 97 by Attila Bares, P.E. from PCA Western Region.

**Next BOD meeting:** will be at 11:45 am on Monday, November 5, 2001 at Dennis K. Hanatani, Inc.



#### **HAWAII CHAPTER**

P.O. Box 508, Aiea, Hawaii 96701 Phone: (808) 485-1400 Fax: (808) 485-1500 Web Page:www.lgsea.com

#### 2001-2002 OFFICERS & DIRECTORS

Position	Name	Phone	Fax
President	Les Nagata	951-5916	941-6489
Vice Pres.	Brian Ide	536-2108	521-3000
Secretary	Mike Kasamoto	955-6834	955-2483
Treasurer	Colleen Miyasato	735-3211	735-3280
Director	Mike Goodnight	1-245-3975	1-245-3977
Director	Tim Waite	485-1400	485-1500
Director	Ron Iwamoto	533-2210	533-2686
Director	Gary Lum	536-4495	524-4466
Past Pres.	Dipankar Sengupta	955-4441	942-2027

### 2001-2002 COMMITTEE CHAIRS

Program:	Brian Ide	536-2108	521-3000
Technical:	Gary Lum	536-4495	524-4466
Membership:	Ron Iwamoto	533-2210	533-2686
Corp. Spon.:	Mike Goodnight	1-245-3975	1-245-3977
HCES:	Ather Dar	486-2092	486-9261

## STRATEGIC PLANNING CONFERENCE

The Strategic Planning Conference has been tentatively rescheduled to November 15, 2001. Check with Les Nagata for time and place.

#### COMING EVENTS

Mid-November, 2001, 12:00 p.m. HI Chapter LGSEA Board of Directors Meeting at Hawaii Pacific Steel Framing Alliance conference room. Check with Les Nagata on exact date.

## **MEMBERSHIP IN LGSEA**

LGSEA membership is open to engineers, architects, and trades people interested in light-gauge steel framing. \$50 per year. Call Ron Iwamoto at 533-2210 for membership forms.



## **SLATE OF OFFICERS**

President	Allan Cadieux	523-9696
Vice-Pres.	Joe Uno	263-4113
Treasurer	Max Shoura	523-9696
Directors	Amarjit Singh	956-3933
	Karl Kagesa	735-3211
	Maelyn Uyehara	521-2641
Past Pres.	Richard Campbell	834-3103





P.O. Box 4135, Honolulu, Hawaii 96812 Website: http://www.falea.org

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President	Oscar C. Paez, Jr.	676-2797
Pres-elect	Rogelio A. Urbi	693-8913
Vice-pres	Marites Calad-Shoji	671-3961
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Treasurer	Elvira Marie B. Pineda	780-2858
Asst. Treas	Diosdado M. Urgasan	836-7507
Auditor	Francisco T. Cruzata	677-9477
Bus. Manager	Gregorio S. Garcia	833-7985
P. R. O.	Zam Louie P. Criste	947-3405
Directors:	Joel L. Francisco	721-4440
	Armando P. Ines	486-7814
	Marcelino C. Labasan	422-8867
	Ricardo J. Magday	423-1771
	Leonard G. Obaldo	672-4538
	Alfredo A. Quibol	678-2572

Every year, The Filipino American League of Engineers & Architects recognizes and awards a selected few among its members. This year' awardees were Leonardo G. Ubaldo and Francisco T. Cruzata.

Leo Obaldo has a PH.D in Agricultural Engineering from Kansas State University and currently works as a Research Scientist at the Oceanic Institute - Center for Applied Aquaculture and Marine Biotechnology. He has presented and published numerous engineering and scientific articles including a college textbook entitled "Engineering Properties of Foods and other Biological Materials. He is actively involved in various professional organizations such as University of Hawaii's Bio-systems Engineering Educational Advisory Committee and the American Society of Agricultural Engineers.

Frank Cruzata has a Bachelors degree in Architecture. He recently rejoined Architects Hawaii Ltd., after having been a self-employed architectural Consultant with Danilo D. Lopez Associates as a Project Architect. Prior to that, he worked at Architects Hawaii Ltd., for almost 22 years where he functioned as a Senior Job Captain and acts as Project Manager on some significant projects. His work experience includes hotel/resort renovation projects as well as residential, commercial, healthcare and governmental projects. He is a member of the Filipino Chamber of Commerce of Hawaii, President of the Bicol Club of Hawaii, Past Chairman - Modifications Committee (Waikele), and currently the Architectural Consultant in Waikele and Ewa by Gentry housing development.

The organization has also awarded scholarships to three deserving students at \$ 1,000 each. Ryan Escober, a Freshman at Santa pursuing University Electrical Engineering, Robyn Chung, a Senior at Aiea High School and Dom Joavanni O. Cueva, another Senior from Saint Louis School, both aiming of becoming a Civil Engineer.

There were two successful Golf tournaments that were aimed to support our yearly scholarships. The 1st one was held at Kapolei Golf Course, August 18, 2001 Saturday. Overall

Champion Trophy - Rico Pascua (90-28=62), FALEA Champion Trophy - Manny Lanuevo (93-28=65) and PAR 3 Winners - Fred Guzman, Rocky Marquez, Segundo Velasco, and Chris Galicia. The 2nd Golf Tournament was held at Coral Creek Golf Course. October 6, 2001 Saturday. The winners were FALEA Champion Trophy - Armando Ines (115-57=58), PAR 3 Winners - Marites Shoji, Oscar Paez, Jun Delos Santos, and Ben Aquino. The 3rd tournament is scheduled on November 17, 2001 (Saturday) at Coral Creek. Interested parties can call Leo Obaldo at (808) 259-3131.

## NOVEMBER SEMINARS OF INTEREST TO ENGINEERS

## "PROJECT DELIVERY ALTERNATIVES - A **MEASURED CHOICE"** presented by CECH.

Date: Friday, November 2, 2001 9:30 AM to 1:00 PM Time:

Location: Sheraton Moana Surfrider Hotel-

Parlor Room

Speaker: Win Westfall, P.E., a former president of APWA and current Chairman of

ACEC's Procurement Committee. Project delivery methods and the Topic: role of the design professional as a

trusted advisor in selecting a project delivery method.

\$60 includes lunch

For further information, contact CECH at FAX 234-1721.

## "2001 AIA/CSI BUILDING TRADE EXPO" presented by HONBLUE.

Friday, November 2, 2001 Date:

8:00 AM to 6:00 PM Time:

Location: Sheraton Waikiki Hotel Hawai'i

Ballroom

Expo, accredited seminars, lunch, Topics:

events, prize drawings, entertain-

ment and reception.

Cost: **FREE** 

For further information, call Bk Corporate Coordinators, Inc., at 845-4994.

"AVOIDING CONTRACT **DISPUTES:** Producing an Effective Project Manual with Clear Expectations" sponsored by Honolulu Chapter CSI.

Date: Saturday, November 3, 2001

7:30 AM to 4:30 PM Time:

University of Hawaii School of Location: Architecture, Room 216

Presenter: Henry W. Berg, CSI, SCIP, CCS,

CCCA

\$110 for non-CSI, AIA and ASID Cost:

members

For further information, contact Neal Lebsack at Architects Hawaii, 523-9636 ext

"OCEANS 2001" presented by Institute of Electrical and Electronics Engineers.

November 5-8, 2001 Location: Hilton Hawaiian Village

For further information, Fred Kobashigawa at

fkobashi@ieee.org or

http://www.oceagns2001.com/invitation.htm

## **WORKSHOP ON** INTERCONNECTING DISTRIBUTED GENERATION

Sponsored by the U.S. Department of Energy and the State of Hawaii, Department of Business, Economic Development, and Tourism.

> December 12 - 13, 2001 Sheraton Waikiki Hotel

Presentations by nationally recognized policy and interconnection experts and case studies of Hawaii installations will be featured. There will be a nominal registration fee. The agenda and registration form will be sent out in November. To request a registration please form, e-mail: mtome@dbedt.hawaii.gov, call: 587-3809, or fax: 587-3820.

## DESIGN OF CONCRETE BUILDINGS for Earthquake and Wind Forces per UBC 1997

Sponsored by the Cement and Concrete Products Industry of Hawaii and the Structural Engineers Association of Hawaii

This seminar focuses on the proper design and detailing of concrete buildings based on the provisions of the 1997 UBC; and timesaving analysis and design techniques for simplified design of concrete buildings. Explanations and rationale relating ductility concepts and construction techniques to ACI-318 requirements as well as innovative new concrete lateral systems will be covered.

Wednesday, Nov. 14, 2001 from 8:00 am to 3:00 pm at Pagoda Hotel. Instructor is

## DR. ATTILA BERES, P.E.,

Western US Regional Engineer, Portland Cement Association.

Full day seminar registration is \$75 per person includes seminar notes, two reference books: Seismic Detailing of Concrete Buildings, and Design of Concrete Buildings for Earthquake and Wind Forces per UBC. Lunch is also included. Registration deadline is Nov. 7, 2001.

For additional information or to register, call CCPI at 833-1882





Website: www.ascehawaii.org

## 2001-2002 OFFICERS

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President	Tony Lau	524-3771	
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	brandes@wiliki.e.	ng.hawaii.ec	du
Vice-Pres	Westley Chun	488-0477	488-3776
	engrsol@verizon.	net	
Secretary	Keith Niiya	533-3646	526-1267
	kniiya@atahawaii	.com	
Treasurer	Walter Billingsley	539-1432	538-7819
	wbillingsley@belt	collins.com	
YMF Dir	Willie Gacutan	847-3763	843-0294
	wgacutan@hotma	ail.com	
Past-Pres	Joanna Seto		586-4352
	jseto@eha.health	.state.hi.us	

Phone

#### **NOVEMBER DINNER MEETING**

Program: Highlights of the University of Hawaii

at Manoa Student Chapter.

Date: **Friday, November 16, 2001**Location: Treetops at Paradise Park

Manoa Valley

Time: 5:30 p.m. - Social Time

6:30 p.m. - Dinner 7:30 p.m. - Program 9:00 p.m. - Adjourn Multi-entree buffet

Menu: Multi-entree buffet

Cost: \$22.00 for Hawaii Section members

\$25.00 for non-section members and

guests

\$11.00 for University of Hawaii at Manoa Student Chapter members

Make check payable to "ASCE-Hawaii Section." Mail to Walter Billingsley, ASCE Treasurer, Belt Collins Hawaii, Ltd., 680 Ala Moana Blvd., 1st Floor, Honolulu, HI 96813-5406 postmarked by Monday, November 12, 2001. Reservations to Walter Billingsley by Monday, November 12, 2001 by phone at 539-1432, fax at 538-7819 or email at wbillingsley@belt-collins.com.

## EXECUTIVE COMMITTEE MEETING HIGHLIGHTS

September 27, 2001

## 2001 CALENDAR OF EVENTS (subject to change)

December 2002 - Joint Luncheon with HWEA, AWWA, and ASCE (specific date and location to be announced).

## 2001 ASCE HAWAII SECTION OCEA AWARD

Congratulations to all whom participated in this event. The ballots are in and the winner is announced on the cover of this issue.

#### **MEMBERSHIP COMMITTEE**

Stacie Saito was selected as ASCE's National 2001 Outstanding Membership Chair for her dedicated efforts to ASCE's membership growth and retention. Congratulations Stacie! Keep up the hard work!

The special membership drive continues. Members who recruit 150 new, paid members between April 1, 2001 and September 30, 2002 will receive \$5,000. Please contact our Membership Chair, Stacie Saito, at 449-9195 or Stacie. Saito@hickam.af.mil for more information.

## West Point Bicentennial Engineering Design Contest

The West Point Bicentennial Engineering Design Contest kicks off on November 11, 2001. This contest will showcase the talents of the nation's K-12 students. Please encourage all students in grades K-12 to participate in this Civil Engineering design contest. Participants could win a laptop computer or the grand prize, a \$15,000 scholarship. For further information please visit ASCE's 150th Anniversary web site www.asce.org/150/programs.html.

## 150th ANNIVERSARY OF ASCE

ASCE is the nation's oldest national engineering society. ASCE kicked-off its year long 150th Anniversary celebration. On November 3-6, 2002, ASCE will celebrate its 150th Anniversary at the Annual Engineering Conference and Exposition in Washington D.C. The Hawaii Section is looking for volunteers to help out with ASCE's 150th Anniversary. Please contact Delwin Ching (dching@hgea.org) to find out more information and how you may assist in this effort.

#### **GET CONNECTED AND KEEP UPDATED**

Do you currently receive ASCE dinner meeting notices by e-mail? If not, you are not on the ASCE e-mail list. Sign up now to receive quick updates on ASCE activities such as legislative affairs, Section meetings, field trips, and future Wiliki O Hawaii.

Visit our website at www.ascehawaii.org and register to be on the ASCE e-mail list. There is no charge. However, you must be a current member of the Hawaii Section and have your ASCE membership number available when registering.

If you prefer to receive your future Wiliki O Hawaii newsletters by U.S. Postal Service please contact our Membership Chair, Stacey Saito, at 449-9195 or Stacie.Saito@hickam.af.mil.

## REMEMBER WHEN YOU WERE IN COLLEGE?

Show your support for our Civil Engineering students by sending your donations for the ASCE Endowed Scholarship Fund to the attention of Joanna Seto at the ASCE Hawaii Section address.

## **KNOW YOUR ASCE HISTORY**

by C.S. Papacostas

On his mother's side, John Henry Wilson's great grandparents were Henry Blanchard, the captain of the brig "Thaddeus" that brought the first New England missionaries to Hawaii in 1820, and Koloa, a Chiefess from Moloka'i. His mother Eveline ("Kitty") was befriended by future Queen Lili'uokalani owing to their common love of song at Kawaiaha'o Church. Kitty's brother George Townsend became captain of the schooner "Emma" mainly plying the waters between Honolulu and Leeward O'ahu.

According to Bob Krauss' 1994 book "Johnny Wilson: First Hawaiian Democrat," Johnny's paternal great grandfather was the Rev. Charles Wilson who reached Tahiti in 1801. His father, Charles Burnette (C.B.) Wilson, and his uncle Richard were brought to Hawaii by Captain Harry English in whose care the children were put by their mother, Chiefess Tataria.

According to Krauss, C.B. Wilson was briefly a classmate of future King Kalakaua and, because of his athletic prowess, got to rub

shoulders with the "upper crust" of Hawaiian society who were fond of sports. C.B. became a blacksmith and also joined the Volunteer Fire Department. In 1882 Kalakaua appointed him as "superintendent of the waterworks." In this capacity, he oversaw the building Honolulu's first hydroelectric power plan in Nu'uanu (1888). Two years earlier, he had attained the prestigious position of Fire Chief and in 1891, Queen Lili'uokalani appointed him to the Privy Council and Marshal of the Kingdom.

Born in 1871, Johnny Wilson became an enterprising young man with connections to all strata of Hawaiian society from royal houses to his father's shop at 26 Fort Street and the wharf. Lili'uokalani's famous song "Ku'u Pua Paokalani" was dedicated to him and she also listed him and his mother as members of her entourage on an 1861 trip to Maui.

Johnny attended the precursors of McKinley High School, the Fort Street School and then St. Alban's College in Pauoa Valley. On graduation day, he won a prize in mathematics. At the age of 17 in 1889, he sailed to the West Coast and engaged in a series of odd jobs for half a year. Returning to Honolulu, he went to work as a stevedore but his adventurous spirit made him stow away on the whaler "Triton" that left for Alaska in 1890.

His father's powerful friend John D. Spreckels saw to it that he was sent back in December of that year and he ended up working as "brush cutter and chainman" for Mr. Kuegel, the civil engineer for Benjamin F. Dillingham's Oahu Railway & Land (OR&L) Company. That's when he decided to become a civil engineer and road builder.

With financial support from the Queen, he enrolled in the very first class when Stanford College opened its doors in 1891. Among his classmates was Herbert Hoover, the future U.S. President. At Stanford "Kanaka Jack," as he was nicknamed, also met Louis M. Whitehouse who enrolled in civil engineering a year later.

Lack of funds after the 1893 overthrow of the Hawaiian Kingdom forced him to leave Stanford at the end of his junior year in the spring of 1984 and, along with his friend Whitehouse, became manager of the National Hawaiian Band that brought Hawaiian music to America. The band included several superb musicians who had been his boyhood friends.

Back in Honolulu in 1896, he joined OR&L and then worked under the Republic's Chief Engineer W.W. Bruner on a survey for a "carriage road" over the Pali for which \$40,000 was allocated by the government. Securing a bond from Benjamin Dillingham, he submitted the low bid of \$37,500 for the road job and summoned Lou Whitehouse to help. According to Rick Sapien's "The Path of Progress Over the Pali," two other bids for \$67,500 and \$81,000 were submitted by more experienced contractors who, per Krauss' description, were not as aware as route surveyor Wilson about the weathered conditions of the rocks along the alignment.

Ground was broken on May 26, 1897 and the road was opened for carriages on January 19, 1898. To secure the needed labor force, according to Krauss' account, Wilson offered \$15 per month (\$5 more than the going rate for plantation work) plus bonuses. Where the rock was sound, Wilson and Whitehouse resorted to blasting. October 4, 1897 was one such occasion. A front page story in the "The Pacific Commercial Advertiser" entitled "New Pali Road: Section of the Big Ridge Blown to Pieces," on the next day tells how.

More than 200 people including dignitaries, St. Louis College pupils, "strangers, malahinis and kamaainas were there and everyone pronounced the blast a success," although "this blast had closed the old road for ever -not for a month- as Minister King ordered."

Interestingly, while working on the Pali, the young and inexperienced Wilson and Whitehouse team underbid Walter Dillingham on a job to extend Benjamin Dillingham's railroad around Ka'ena Point. The trick for the low bid was to lease a boat ("Iwa") to carry laborers, equipment and supplies to the site and freight on the way back. Johnny's uncle George Townsend captained the boat. The place where the first Japanese laborers landed for this job on October 14, 1897 is known to this day as "Yokohama Beach!"

The intriguing life of Johnny Wilson as road builder, entrepreneur extraordinaire, politician and mayor of Honolulu continued for almost 60 more years after building the then New (and now Old) Pali Road.

Do you know of a civil engineering accomplishment or event that your fellow ASCE members might find interesting? Please send a brief description to C.S. Papacostas (fax 956-5014, email csp@wiliki.eng.hawaii.edu). Previous articles in the series may be found at the Section's web site. Just point your browser to http://www.ascehawaii.org.



Hawaii Section — Younger Member Forum Web site: http://www.ascehawaii.org/ymf.html

## 2000-2001 OFFICERS

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lornish@hotmail.com

## 2002 ASCE YMF PE REFRESHER COURSE

Dates: Saturdays, January 19, 2001 to March

30, 2002

Times: 9:00 a.m. to 12:00 p.m. (An afternoon class from 1:00 p.m. to 4:00 p.m. may be added if there is enough interest)

Place: Parsons Brinckerhoff, Pacific Tower, 1001 Bishop Street, Suite 3000

Cost: \$275 Early Registration Fee for ASCE

Members

\$350 Early Registration Fee for Non-

ASCE Members

\$375 Late Registration Fee

## Early Registration Deadline is December 21, 2001.

## Class size is limited and registration is done on a first-come first-served basis.

This year's ASCE YMF PE Refresher Course will cover the "breadth-and-depth format" of the civil engineering professional examination. This year's lecturers are:

Structural Engineering-Ron Iwamoto, KAI Hawaii Highway Geometry-

Randall Urasaki, Parsons Brinckerhoff Traffic Engineering-

Wayne Yoshioka, Parsons Brinckerhoff Geotechnical Engineering-

Dr. Brennon Morioka, URS

Environmental Engineering-Raj Rath, C&C of Honolulu,

Dept of Design and Construction Hydraulics/Hydrology-

Raj Rath

In addition to copies of the individual lecturer notes and study supplies, class attendees will receive a copy of Michael R. Lindberg's Civil Engineering Reference Manual for the PE Exam, 8th edition. Attendees will also have the option of ordering the following reference material at the listed discounted prices.

Practice Problems for the Civil Engineering PE Exam, 8th edition, Michael R. Lindberg, \$30

Civil Engineering Sample Examination, 5th edition, Michael R. Lindberg, \$22

101 Solved Civil Engineering Problems, 4th edition, Michael R. Lindberg, \$35

Quick Reference for the Civil Engineering PE Exam, 2nd edition, Michael R. Lindberg, \$25

PE Civil License Manual, Structural Analysis, 6th edition, C.V. Chelapati, \$65

PE Civil License Manual, Geotechnical Engineering, 6th edition, C.V. Chelapati, \$50

PE Civil License Manual, Concrete and Steel Design, 6th edition, C.V. Chelapati, \$85

PE Civil License Manual, Highway Geometry and Traffic, Concrete Materials and Mix Design, 6th edition, C.V. Chelapati, \$70

PE Civil License Manual, Hydraulics and Hydrology, 6th edition, C.V. Chelapati, \$65 PE Civil License Manual, Water Quality and Water Supply, Wastewater Engineering, Solid Waste Engineering, 6th edition, C.V. Chelapati, \$60

PE Civil License Manual, Surveying, 6th edition, C.V. Chelapati, \$75

To sign up for the 2002 ASCE YMF PE Refresher Course, contact Tony Lau at 522-7426 or *tlau@hawaiipacificengineers.com*. Other reference material is available so if the reference you are looking for is not listed, please inquire.

## ASCE NATIONAL CONTESTS FOR YOUNGER MEMBERS

ASCE is offering the following awards and prizes to members of ASCE who are 35 years of age or less as of February 02, 2002.

- DANIEL W. MEAD PRIZE, an award given on the basis of paper on professional ethics. This year's paper must be written on: "Ethics and Civil Engineering: Past, Present and Future."
- EDMUND FRIEDMAN YOUNG ENGINEER AWARD, an award that recognizes the professional contributions of Younger Members of the Society for service, technical competence, high character, integrity, and leadership.
- 3. YOUNG GOVERNMENT CIVIL ENGINEER AWARD, an award that recognizes distinguishes civil engineers employed in public service for demonstrated leadership potential in Public Service Engineering.
- 4. COLLINGWOOD PRIZE, is awarded to author(s) of a paper (1) describing an engineering work with which the author(s) have been directly connected, or (2) recording the investigations contributing to engineering knowledge to which the author(s) have

contributed some essential part, and (3) containing a rational digest of results.

If anyone is interested in obtaining additional information and award nomination forms, please call Willie Gacutan at 864-5943, or please visit the ASCE website at www.asce.org or log onto their FTP server at <a href="fttp://gsd.asce.org">fttp://gsd.asce.org</a> and click on Younger Members for al of the awards information.

## ALL ARE WELCOME!

Civil Engineering Seminars (CE 691 - Fall Semester 2001)

LOCATION: Holmes Hall 211, Department of Civil Engineering, University of Hawaii at Manoa

TIME: 3:30 p.m.

NOV 9 Wayne Kawano, Cement and Concrete Product Institute- Concrete for Sustainable Construction.

NOV 16 Randy Schmitt, McCorriston, Miller, Mukai & MacKinnon LLP- "It may not be pretty, but its the Law."

NOV 23 No class-instruct. holiday.

NOV 30 Richard Cox, Engineering Consultant- Irrigation Development in Hawaii.

DEC 7 LGSEA Representative- Light Gauge Steel Construction in Hawaii.



http://www.geocities.com/hals\_us

#### **OFFICERS FOR 2001**

	OIN ZUU I	
President	Byron Komatsu	692-7599
Vice-Pres	Kendall Hee	591-8116
Secretary	Dennis Chong	523-4482
Treasurer	Eric Hee	591-8116
Director	Kevin Kea	521-7491
	David McDonald	536-2705
NSPS Gov	Patrick Cummins	247-6602
Past Pres	Layton Nakao	543-7317

## **EXEC BD MEETING HIGHLIGHTS**

Oct. 11, 2001

Membership: 8 (life), 2 (complementary), 19 (sustaining), 176 (regular)

## **COMMITTEE REPORTS**

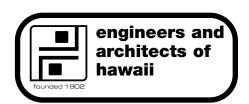
Workshops – GPS workshop Nov. 10, 2001 (Contact David McDonald for more information at 536-2705 or *dmcd@lava.net*. AUTOCAD 2002 workshop Dec. 8, 2001 on Maui (Contact Kevin Kea for more info at 808-521-7491 or *kevink-cpi@hawaii.rr.com*).

HALS 2002 Conference – Layton reports, concurrent session list submitted. There will be a Pre-conference workshop on "PUBLIC LANDS" on February 6, 2002 (Wed.) be on the lookout for the flyer containing all the details of our conference.

## **UNFINISHED BUSINESS**

Education – CE-491 will be offered in the spring of 2002 (call Kendall Hee, ph. 591-8116 or Pat Cummins, ph. 247-6602 for more information). Kendall also reported on the U.H. endowment program.

Lapel pins – Layton reports that the design has been chosen and we will begin to have the pins made.



po box 4353,honolulu,hawaii 96813 An association for Hawaii's Engineers and Architects New WEB Address http:community.hei.com/eah

## 2000-2001 Officers:

President	Kai Andrade	521-4711
1st VP	Victor Russell	949-4155
2nd VP	Maria Tome	587-3809
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Secretary	Sam Gillie	543-4739
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Director	Niel Guptill	483-3392
Director	Brian Kang	449-5563

Meetings held every Friday at YWCA room 205 on Richards Street downtown. Parking at Alii Place off Alakea Street for \$1.00 per hour. Meetings start at NOON and end promptly at 1:00 pm.

Members-\$7.50 Guests-\$8.50

Program schedule may be adjusted. Call Secretary to confirm speaker.

## November 2001 EAH Program

November 2, **Phillip S.K. Ooi,** Assistant Professor Department of Civil Engineering, University of Hawaii; **Boston's Central Artery/Tunnel Project.** Professor Ooi will talk about Boston's billion dollar highway project to tunnel under Boston's main downtown business district

November 9, No Meeting; Veterans Day Holiday.

November 15, To Be Announced.

November 23, No Meeting; Thanks Giving.

November 30, **Dr. James Kwong,** URS Corp (tentative); **The Sand Island Force Main Pipeline Project.** Dr. Kwong will talk about the sewer force main project under Honolulu harbor to Sand Island.

### September Program Report

**Evan S. Dobelle,** President University of Hawaii; "The University of Hawaii"

Evan S. Dobelle is happy to be President of the University of Hawaii. It is a challenging position in a difficult time, particularly due to the tragic events on September 11. But America will prevail and we will get back to making the University a great institution for the people of Hawaii and the rest of the US.

People ask him what a President does and President Dobelle tells his fondest story about Earl Long, younger brother of Hughie Long, both Governors of Louisiana. Earl was in his office with a young state legislator and Earl said "Son, I need your vote." The young state legislator said, "Governor when you're right, I'm with you, but when you're not right I just can't be with you and on this issue, I just don't think you right." Earl leaned across his desk and said. "Son, when I'm right... I don't need ya."

Over the last 10 weeks since becoming president, Dobelle has evaluated the needs of the State, what the University is and what it can be. He believes that Hawaii needs an institution that is island wide, has less bureaucracy, has the ability to put more resources into the classroom and has the ability to celebrate the different missions of all the UH campuses. He

believes that for a long time there has been a "zero sum game", where one college would get resources, and other colleges believed it came their expense. It's not a healthy situation when there are different missions which all need to be celebrated.

He has asked Price Waterhouse to prepare an administrative audit by December. He needs to understand without anecdotal evidence, what the reality is. Are there too many administrators? He suspects from his 30 odd years in public life that there are.

Dobelle respects people, coming from a working class town, where he has been in kitchens of childhood friends whose parents were laid-off. It is not an attractive situation. But, the reality has been that you are not a good CEO unless you are prepared to make those kinds of decisions. He doesn't like it, but he has to right size the institution because he has a finite amount of resources and has to put them into the classrooms and research laboratories.

He didn't grow up being told there are limitations and he has never been in a setting where you don't believe you are the best and you can attain the best. He's sure that June Jones is not telling the football team that its all right if they just kind of do their best. There are no reasons why the University of Hawaii at Manoa could not to be similar to a Berkeley, an Austin, an Ann Arbor, or a Chapel Hill. UH is one of the most powerful research Universities in the country that won over \$219 million research dollars last year. Manoa has preeminence in four fields in the world, not parity. UH is preeminent in astronomy, tropical agriculture, marine oceanography and research, and travel industry management.

UH needs to celebrate the undergraduate experience at the same level that we celebrate the graduate level experience. We don't celebrate the undergraduate experience. Students in from Hawaii should at coming to the University of Hawaii first. They should look at coming back as graduate students in the medical school, law school or business school.

What are the facts? 92% of our students are from Hawaii. There is no ranked University in the country that has more than 70% of its students from their home state. The average age of student body is 26. 91% of the students work. There is an attrition rate, a fancy word for students who don't graduate, of 45%. Dobelle said he likely stands as the only President of a Research-One University that has a football team that has a higher graduation rate than the rest of the student body. President Dobelle is looking for someone who can tell him why.

He suspects that a lot of the "why" is that we do not celebrate the undergraduate experience; we do not embrace the students. We don't have a place for them to live. There are only three thousand dormitory rooms, most of which are reserved for students from the neighbor islands. So there is no sense of place, no sense of alma mater. We need to create a community, a village, if you will, that would be as much a destination as a location for a university. We should start around King and University and have private enterprise build art galleries, coffee houses, places for music and lectures, as many as 5,000 more dormitory rooms and make it a place where there is energy and a place that people want to go. These are the kinds of things that give people the sense of

Without that sense, you are dealing with just an institution. There are about 200,000 UH

alumnus throughout the county, with about a 9% giving rate from the alumni to the University. "The institution gave them a education that was transitional but not transformational." It was simply the opportunity to get a credential and be able to get job. It wasn't a place where they stayed, they lived, they related, they had conversations. It wasn't necessarily a place where they got to relate to others and to learn more about themselves.

Oahu's demographics are that in the next 10 to 15 years 70% of the people will live west of Aloha Stadium. So in the second city, they need to capture a University that is non-residential, that is an institute that doesn't necessarily offer graduate degrees or have great research, but does have the capacity to offer a board range of programs, with certifications, or master programs in teaching or nursing. This could make Kapolei a University town since many of the best places to live in the US are around university towns.

President Dobelle's vision is a San Diego State in West Oahu with the capacity to draw in Leeward and Windward two-year programs to make a 4-year degree. At Manoa he sees a university celebrating the undergraduate experience along with the graduate experience, with at least 5000 more students from Asia, from Europe and from the mainland, all paying full price so UH doesn't have to raise tuition. We should have a university town that is fed by all the community colleges, particularly Kapi'olani. Then create opportunities at what would be UH Kaua'l, UH Maui, smaller regional colleges that have modest dormitories of 500 or 1000 beds in Kaua'i and 2000 in Maui so they could attract many out of state students who would love to come to Hawaii but don't have anyplace to stay.

The capacity to capture that permanent tourist market of students with disposable income; the ability to attract at least 20,000 more students throughout the Island, with all the accompanying facility, staff, buildings and grounds, means construction. This is a real opportunity. In meetings today with the Governor, here is an opportunity to make a decision through capital improvement projects to make a lasting impact on the future economy of the State. The capacity to build a San Diego State in Kapolei, build that Berkeley at Manoa, build that UH Maui, and UH Kaua'i, build that Medical school and the Biotech Park is an extraordinary opportunity, that even in the short run for architect, engineers and contractors would mean full employment for 3 or 4 years.



## 2000-2001 Officers

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Terry Brothers		949-7334	943-7951
brothers@wilbursmit	h.com		
Richelle Suzuki	Secretary	541-2530	541-2700
richelle.suzuki@fhwa			ext. 311
Fred Smoot	Treasurer	841-7617	842-1819
ppihnl@aol.com			



### 2001-2002 OFFICERS

To be announced Chairperson Vice-chair James Grogan 254-2947 527-6063 Treasurer Chester Kaitoku Secretary Sam Gillie 543-4739 Ed Chang 543-4227 Dir 1-yr Dir 2-yr Ron Flegal 455-0254

#### **MEETING NOTICE**

A Joint Meeting with ASHRAE is planned for November 8, 2001, Thursday Date:

5:30 p.m. start gathering Time:

6:00 p.m. dinner

Place: Pagoda Hotel & Restaurant

1525 Rycroft Street

Speaker: Mark A. Hertel, P.E., of INTER Island

Solar Supply.

Designing Commercial Solar Water Topic:

Heating Systems

All interested members are asked to attend. For more information, please call Sam Gillie at 543-4739, or send an e-mail to sgillie@hei.com.

## **NOVEMBER 17, 2001 MICROTURBINE TOUR**

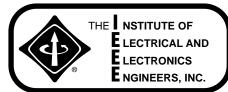
On Saturday, November 17, at 10:00 a.m. we will visit HECO's microturbine located at their Ward Avenue facilities. Those interested in attending should call Ed Chang at 543-4227. Due to increased security everywhere, the names of the attendees are required. Parking arrangements will be announced a week before the tour.

Microturbines along with fuel cells, photovoltaic panels, and diesel engines are distributed generation (DG) technologies which are supposed to help eliminate the need for new central station power plants and help reduce transmission and distribution over-capacity issues

Microturbines are small sized combustion turbines producing kilowatts. They can provide enough hot water and electricity for facilities such as office and condominium buildings. If the facility needs more power, it draws from the utility's grid. If the microturbine produces more power than the facility requires, it is sold back into the grid. Although the initial cost is currently high, as production increases this cost should decline creating a market with high growth.

## **2001 SURVEY RESULTS**

Continuing with the survey results, 22 of the 35 members responding desired meeting reminders via e-mail. For the various volunteer activities, one member would volunteer to help with the PE Review Course, seven members are willing to judge the F. R. Montgomery UH Design Competition, nine members are willing to spend a Saturday to proctor or score at MathCounts, and only one member is interested in mentoring for the TEAMS Competition. For our Power Technical Chapter, eight members are interested. Finally, suggestions for our Outstanding ME Project or Design Competition included the Big Island Irradiation Plant, HECO's microturbine, facility for processing used cooking oil, the electric vehicle sub-assembly facility, MECO's combined cycle power plant, and the docking of the Missouri. This finishes the 2001 survey results report.



#### **IEEE Hawaii Section**

PO Box 37895 Honolulu, HI 96837 Email: sec.hawaii@ieee.org

Web Page: http://community.hei.com/ieee/

#### 2001 Hawaii Section Officers

531-1308 Norman Kawachika Chair: Vice-Chair: Oscar Libed 441-8567 Sec/Treas: Grant Torigoe 945-2984

#### **Section Committee Chairpersons**

Mike Balderston 263-0437 HCES Rep: Membership: Al Toda 455-1331 Webmaster: Steven Sano 543-7981 Prof. Act: Grant Torigoe 945-2984 Stud. Act: Tep Dobry 956-9740

## **NOVEMBER DINNER MEETING**

Nov. 28th (Wednesday) Date:

Time: 6:00 pm

Pagoda Restaurant (1525 Rycroft St.; Place:

we reserved a tea house to hold 20

persons max)

Installation of Officers for 2002 Topic:

Speaker: Chairman Norman Kawachika will

give an overview of the year and his outgoing message of wisdom to all.

\$12.00 (IEEE will subsidize \$13.00 Cost:

since total cost/person is \$25) Call Oscar Libed at 441-8567. RSVP:

Limited seating, so call early.

**DEADLINE** FOR SUBMITTING **WILIKI ARTICLES** IS THE 15TH OF THE MONTH BEFORE **PUBLICATION** 



The Society of FIRE **PROTECTION ENGINEERS** 

## 1999-2000 CHAPTER OFFICERS

FAX 526-9019 537-5385 President Jay T. Higashi Vice-Pres Bob Lohaus 833-4095 Secretary Mel Harano 848-6966 848-6964 537-5385 Treasurer Samuel Dannaway 526-9019

## THE INSPECTION, TESTING, & MAINTENANCE OF WATER BASED **FIRE PROTECTION SYSTEMS**

The Hawaii Chapter of the Society of Fire Protection Engineers is sponsoring this excellent one-day seminar through a special arrangement with the National Fire Sprinkler Association. This seminar will be very useful for those responsible for the inspection, testing, & maintenance of water-based fire protection systems.

Sponsored by: Hawaii Chapter, Society of Fire

Protection Engineers

Date & Time: Monday November 5, 2001,

7:30 AM - 4:30 PM McCoy Pavilion,

Location: Ala Moana Beach Park

\$150 (\$100 for SFPE members, Cost:

Chapter Friends)

Deadline: The registration deadline is

Friday, November 2, 2001.

Who should attend: Fire Protection Contractors, Building & Fire Officials, Fire Inspectors, Fire Protection Engineers, Building Engineers, and Insurance Loss Control Representatives.

For information and to register contact: Sam Dannaway, Program Chairman Hawaii Chapter SFPE Tel 526-9019 / Fax 537-5385

E-mail: seminars@sfpehawaii.org 1. A limited number of copies of NFPA 25 are available for purchase for \$35.00. If you would like a copy please call to reserve a copy and mail a check in with your seminar registration fee.

You can also download a copy of the seminar announcement by visiting our website at http://www.sfpehawaii.org/seminars.htm.

**WILIKI AD** 



www.eng.hawaii.edu/~hspe

#### 2001 - 2002 STATE OFFICERS

2001 - 2002 STATE OFFICERS			
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	rsmith@parkerrance	h.com	
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	ehy@mauigateway.	com	
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	ken@lyonassociate	s.com	
Past Pres	Curtis Beck	969-0134	969-0135
	cbeck@hei.com		
Nat Dir	Bruce Witcher	334-0322	334-0831
	bewitch@ilhawaii.ne	et	

## **BOD HIGHLIGHTS**

October 12, 2001

**Finances:** The fundamentals of engineering refresher course balance will continue on the books pending resurrection of the course. Treasurer K. Rappolt will contact HCES treasurer to clarify account balance and distribution. Long time members are not receiving Wiliki. The board approved balanced budget presented by President and Treasurer. The treasurer's records will be audited on November 16.

NSPE Meetings: National Director B. Witcher reported on the Detroit annual meeting that the restructuring of the NSPE BOD results in limited benefit for participation at the annual meeting. Participation should be directed at the Leader's Forum and Regional Meetings. The new leadership should consider continued participation; however, since Hawaii is hosting in July 2004, participation may be warranted to understand the program. The PEC focus on mentoring was highlighted. At the Reno Western Region Meeting discussion highlights included PEI's career asset manager, the availability of two \$10,000 Steinman scholarships for graduate studies, and CSPE's program to award Fundamentals of Engineering examination scholarships instead of education scholarships. This program encourages licensure.

Chapter Reports: Maui's October speaker was from Maui Electric Company explaining net metering, and November's speaker will be a psychologist discussing recognizing and dealing with stress. Honolulu is pursuing the MathCounts program administration, field trips and service projects (ie Toys for Tots), and non-profit status. State pres-elect S. Seu commended Honolulu pres S. Nojima for her efforts to activate the chapter. Big Island (Hilo) continues success with their membership drive under H. Ono. Kona's MathCounts chair C. Witcher is coordinating a joint competition with Hilo. Kona's membership chair is S. Green.

**Constitution and Bylaw Amendments:** C. Beck presented, and the board approved the HSPE constitution and bylaw amendments to align with NSPE's reorganization.

Community Service: MathCounts – S. Seu distributed a timeline with target dates and responsibilities. Chapter competitions: February 9, 2002 (Honolulu), February 16 (Maui, tentative), State competition March 16, 2002 (Honolulu), National Competition June 14,

2002 (Chicago). Chapter Coordinators are: P. Marcello (Honolulu), L. Dill (Kauai), W. Taomoto (Maui), C. Witcher (Big Island). **Scholarships** – Scholarship Golf Tournament is today under direction of chair L. Agena and R. Ishii. Tournament supports scholarships to the UHM College of Engineering. Over the program's 10 year history a total of \$54,600 was awarded.

**Membership:** C. Beck announced the November 16 HSPE Membership Recruitment Collaborative Planning Session with NSPE consultant Annette Petrick. The session consists of three parts: I Your Show (your opinions), Il Customized Plan (develop a Hawaii specific plan), and III Plan Presentation (what should be done). Contact Curt Beck (969-0134) for more information.

**Licensure:** The Department of Commerce and Consumer Affairs and the National Council of Engineering Examiners are close to finalizing an agreement to allow NCEES to administer the Hawaii licensing examinations. NCEES has agreed to offer a trial neighbor island examination on Maui in April 2002. HSPE has budgeted for room rental, and Maui Chapter members are volunteering for proctors.

**Legislative:** M. Street reported a special legislative session will open next week to address economic matters resulting from the September 11 tragedies. Other legislative issues to watch are qualifications based selection (QBS) and the 3 R's initiatives.

Engineers Week: E-week is February 17 – 23, 2002. M. Lanuevo reported a Honolulu banquet is scheduled on February 22 at the Sheraton Waikiki

**NSPE July 2004 Annual Meeting** – Hawaii: This meeting is scheduled on Oahu. S. Seu will contact NSPE to clarify planning responsibilities

HSPE Goals & Strategic Plan: President Tanaka reviewed an update of the strategic plan and his specific goals for the 2001 – 2002 year. Goals include commitment to community service, communication with all members, improving the image of the engineer, and membership promotion.

**Next Meeting:** Membership Planning November 16, 2001, and State BOD February 1, 2002 on Maui.

SCHOLARSHIP GOLF TOURNAMENT: Thank you all for participating in the October 12th 10th annual scholarship golf tournament. About 120 golfers participated, and with the support of many donors, ensures the continuance of the scholarship program. Special thanks to chairs Larry Agena and Royden Iship of Belt Collins, and the many volunteers. We look forward to seeing you all at next year's tournament.



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## HCES, from page 2

## **ENGINEERS' WEEK 2002**

Engineers' Week is from February 17, 2002 to February 23, 2002. The committees for Engineers' Week 2002 are as follows:

- 1. Kick off Luncheon SAME
- 2. Finance and Budget IEEE
- 3. Exhibits SEAOH/SFPE/ITE
- 4. Banquet ASCE
- 5. Program FALEA
- 6. Registration ASME
- 7. Entertainment AACE
- 8. Lifetime Achievement Award HCES
- 9. Engineer & Young Engineer of the Year HSPE
- 10. Student Engineer of the Year UH
- 11. Publicity EAH
- 12. Awards & Leis HALS
- 13. Proclamation & Photo LGSEA

## **HCES LIFETIME ACHIEVEMENT AWARD**

The HCES Lifetime Achievement Award was designed to recognize the lifetime achievement of recently retired engineers. This yearly award is considered to be highly prestigious and awarded to someone who has contributed significantly to the development of engineering in Hawaii and made a noteworthy impact on the Hawaii engineering community. The first HCES Lifetime Achievement Award was presented to Dr. Arthur N.L. Chiu at the Engineers Week Banquet on February 27, 1988.

Nominations for the HCES Lifetime Achievement Award are due to Manny Lanuevo, Past Chair of HCES, by December 31, 2001. The successful candidate will be selected by a five-member Selection Committee at HCES. Details are available on the HCES website at http://www.eng.hawaii.edu/~hces/HCESHome.html and in the October 2001 Wiliki.

## HSPE HAWAII ENGINEER AND YOUNG ENGINEER OF THE YEAR AWARDS

In conjunction with the activities for the Engineer Week 2002, the Hawaii Society of Professional Engineers (HSPE) will select the Hawaii Engineer of the Year and the Hawaii Young Engineer of the Year. HSPE will evaluate the nominees for both awards. The selected engineers will be announced at the Engineers Week Banquet on February 22, 2002. See article in this issue for details.

### **ETHICS COMMISSION MEETING**

At its September 28, 2001 meeting, the Ethics Commission (Commission) voted unanimously to support an amendment to Section 3-8.2(c), Revised Ordinances of Honolulu 1990, prohibiting city officers and employees from representing private interests before city agencies. The Commission supports language which would permit a board and commission member to appear before city agencies, except for the agency upon which he or she sits.

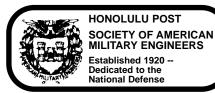
## **NEXT MEETING**

Date: Tuesday, November 6, 2001 (subject to

change) Time: 12:15 p.m.

Place: Plaza Hotel Restaurant, 3253 N. Nimitz

RSVP (regrets and reports) to Ather Dar via hces@yahoogroups.com.



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## Society of American Military Engineers Honolulu Post Scholarships



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- (2) Engineering or Architecture Major
- (3) U.S. Citizenship
- (4) Minimum 3.0 GPA (require copy of latest transcript)
- (5) Military affiliation or experience (i.e., SAME member or dependent, ROTC) not required but given preference

**Requirement:** Submit application information (below) with transcript and the following documents type-written and double-spaced:

- (1) Resume of work experience, academic and extra-curricular accomplishments
- (2) Essay (one page maximum) written around Engineer's Week theme and its impact to society and the military. (See www.eweek.org and www.same.org). Example: 1997 Theme "A Bridge to the Future" essay could discuss how Roman military engineers built roads to quickly move their armies, improve trade and communication that built the great wealth of the Roman Empire.

Mail To: Society of American Military Engineers Honolulu Post

Attn: Scholarship Committee

P.O. Box 30907 Honolulu, HI 96819

Deadline: Postmark 25 January 2002

For Further Information: Ms. Kelly Busquets,

Telephone (808) 438-4980

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School:		
Major:		
Student Number:		_ GPA:
Student Status: Undergraduate Graduate _		
Full Time Student: Yes No		
Anticipated Graduation Date:		
Military Experience:		
SAME Affiliation:		

## OCEA, from page 1

banks. The goal of providing a historic appearance also influenced the choice of an open rail structural system, consisting of reinforced concrete posts and beams. The new bridge was opened to traffic after an accelerated 3-month construction period.

## National Missile Defense Launch Test Facilities, Meck Island

The third nominee for the Hawaii OCEA is the National Missile Defense Launch Test Facilities project in Meck Island of the Kwajalein Atoll. Owned by the U.S. Army Corps of Engineers, the project consisted of the construction of two missile silo shafts 70 feet deep by 10 feet in diameter and installation of launch equipment, including the silo, silo interface vault, and silo head works

Due to the remote location of Meck Island, all materials and equipment had to be shipped to the island by chartered barges. Innovative construction methods included pre-casting the 17-foot diameter shafts that had a bottom elevation 36 feet below sea level rather than casting them in place. A sheet pile cofferdam 24feet square was used to support the excavation. Due to environmental concerns dewatering of the cofferdam was not a viable option. Thus, divers were used to set the 33-ton sections. After all precast sections were set, the water was pumped into the space between the sheet piles and shaft exterior and allowed to seep into the groundwater. The dry work shaft significantly reduced the exposure of workers to a deep, confined space.

The project was completed two weeks ahead of the revised contract schedule and received an outstanding performance evaluation from the owner. The contractor's safety record was outstanding, resulting in no injuries or lost time accidents during the entire 43,500 man-hours of the contract.

### COE, from page 3

Most of the events involved recruiting and outreach teams visiting schools around the state. Rainbow Nights were held at high schools on Oahu, Maui, Kauai, and the Big Island. High school juniors and seniors were given presentations about career opportunities and the advantages of attending the UH.

Spreading the engineering gospel wasn't limited to high school students. The COE team visited elementary and middle schools on Oahu, including King Intermediate in Kaneohe and Noelani School in Manoa, to show how engineering is exciting and enjoyable.

At King Intermediate, the COE participated in the annual Career Awareness Day, made a presentation, and organized a hands-on design competition for students. At Noelani, sixth-graders were introduced to spars—the main support beam on an airplane wing—and assigned the task of designing, constructing, and testing their own spars.

The College of Engineering also organized the TEAMS (Test of Engineering, Aptitude, Mathematics, and Science) Competition. Top engineering firms and societies sponsored participating high schools and served as mentors to the students.

The new recruitment season has begun and the college has exciting plans for the year. The 2001 Rainbow Day kicked off the new season with 228 high school students and parents attending, Many more events are being slated.

Persons interested in supporting the College of Engineering's recruiting and outreach activities should call Cheryl Sato Ishii, at 956-8404, or sign up at <a href="https://www.xtreme.hawaii.edu">www.xtreme.hawaii.edu</a> in the Forms section. The college also has engineering brochures, presentation materials, and video available for those invited to give engineering presentations.

Join the Engineering Ambassador Program Sign-up at: www.xtreme.hawaii.edu

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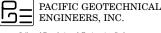
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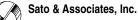


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