### Neptune Ball Set For Feb. 7 and 8 at Center



NEPTUNE BALL General Chairman Rhea Blenman and Tickets Committee Chairman Maura McCreery check agenda for various committees working toward success of the colorful event to be held at Community Center on Feb. 7 and 8.

Plans are well underway this week for the colorful Second Annual Neptune Ball which will be held at the Community Center on Friday and Saturday, Feb. 7 and 8.

Various committees, including are as follows: the Decorations and Tickets Lucia Shults, assistant general committees, swung into action chairman; Lois Hamblin, produring the past few days. Gen- grams; Sue Byrd, costumes; Maueral Chairman of the two-day ra Mcreery, tickets; Betty Clasen, Valley-wide event is Rhea Blen- treasury; Mickey Freedman, ar-

the Community Center, Commissioned Officers Mess, and of course from the Tickets Committee members. In Ridgecrest they are available at Champs Market and from Glenadyn Puckett and Lois Hamblin.

Chairmen of the committees ter tonight at 7:30.

rangements; Glenadyn Puckett Tickets are now available at and Joanne Grabowsky, co-decand Mary Stotz, co-chairmen of dancing

Capt. Floyd Reck is producer of the show and Bill Valenteen

Anyone wishing to help them, please be at the Community Cen-

# JPL Man To Conduct Management Class

Project Manager for the Survey- held successively responsible or Program, a NASA project positions in the fields of torpewhich embraces methods of do design and project managelanding an unmanned spacecraft | ment. on the moon, will conduct a Dr. Gautschi, an electrical class in project management at engineer, earned his MS degree

Jet Propulsion Laboratory in Technology in 1957 under the Pasadena, is a former employee | Sloan Fellowship program. He



DR. T. F. GAUTSCHI

Dr. T. F. Gautschi, Assistant of NOTS Pasadena, where he

China Lake, beginning Jan. 28. in Industrial Management at Dr. Gautschi, now with the the Massachusetts Institute of received his doctorate in Public ENSIGN WILBURN C. SMITH Administration from the Uni- is the new approach controller versity of Southern California

The Project Management class will meet in Room 205, Training Building, 2:30 to 4:30 P.M. each Tuesday for ten successive weeks.

managers and prospective pro- in 1948. ject managers an opportunity to analyze the role of the project manager. Concepts and German Language Club techniques of project planning, The German Language Conorganization and staffing, decis- versation Club will meet Monion-making coordination and day, Jan. 20, in Room B of the communication will be present- Community Center, starting at ed through development of 7:30 p.m. practical project problems.

The project management ration will be screened. They course is part of the Supervisor are "Salmo, the Trout"; "The Program sponsored by the Per- Birth of a Violin" and "Wupsonnel Department. It is being pertal." coordinated by K. W. Heyhoe, All members are urged to at-Associate Head of Staff for Man- tend to hear plans for the club's agement, Central Staff.



"SWORD OF LANCELOT" (115 Min.)

(Adventure in Color) The famed Knight

"FRANCIS IN THE NAVY" (80 Min.) Donald O'Connor SHORT: "Witty Kitty" (7 Min.)

"Manhunt No. 15" (16 Min.) - EVENING -THE WRONG ARM OF THE LAW" (91 Min.)

(Comedy) When an outside gang muscles erates with Scotland Yard to catch the chising blighters. Laugh away! (Adult).

7 p.m.

"Speedway" (10 Min.) SUNDAY-MONDAY "FOR LOVE OF MONEY" (109 Min.) Kirk Douglas, Mitzi Gaynor, Gig Young

7 p.m. (Comedy in Color) Wealthy widow hires tended. Just for laughs. (Adults and You

SHORT: Football Hilites '63 (18 Min.) UESDAY-WEDNESDAY Alan Ladd, Dianne Foster, Wm. Bendix

(Action-Drama in Color) Destroyer's gunboard the USS Stephen Potter. (Adults and Young People).

SHORT: "Message to Gracias" (7 Min.) URSDAY-FRIDAY JAN. 23-24 "THE HAUNTED PALACE" (85 Min.) Lon Chaney, Vincent Price, Deborah Paget

7 p.m. (Horror in Color) A superior of its type An ancient curse made by an ancestor rencarnates in a man who has inherited a eople. E-E-ERIE! (Adult).

SHORT: "Little Whirlwind" (7 Min.) "Navy Screen Hilites' P" (18 Min.)



for GCA-57 at San Clemente Island. He relieved Lt. Joseph E. Chruma who has been ordered to RATTC, NAS, Moffett Field. Prior to reporting to San Clemente Smith was with the GCA unit at Pt. Mugu for three years. He entered the It is designed to give project | Navy as an apprentice seaman

Three films with German nar-

future programs.



NAVY RELIEF 100-HOUR PINS are presented by Capt. Leon Grabowsky, Executive Officer, to Phyllis Reilly and Helen O'Connor (right) for work in assisting the many local Navy Relief programs. Presentation was at the Commissioned Officers Mess.

#### New Officers of Y-WEDNESDAY JAN. 21-22 Council To Be Installed Jan. 23

nery officer runs into trouble with the crew China Lake Community Council ecause of his Quaker background - until will be installed at a dinner hibit in Room B of the Communext Thursday evening, Jan. 23, nity Center. at the Community Center, start-

> Hensley, vice-president; Rich- design elements. ard Frederick, executive secre-

plate prime rib dinner should Wilson and Mike Young. charge of the arrangements. | are welcome.

#### Students' Salon Photos on Exhibit

Salon photographs taken by Burroughs High School and Ba-Newly elected officers of the kersfield Junior College photography students are now on ex-

The show which continues through this month, includes ab-The new slate is comprised of stracts which are interesting ex-Robert Glen, president; John amples of the application of

Students whose work is extary; Walter Schmick, recording hibited are Jay Brents, Joy secretary, and Joe Dorgan, treas- Broaker, Tom Frisbee, Evelyn Myers, Brian Reese, Henning Reservations for the \$2.50 per Roth, Frank Vaughan, Carroll

be returned no later than to- The gallery is a project of morrow. Harry Bearman is in the Desert Art League. Visitors

### CROSSWORD PUZZLE . Answer to Previous Puzzle

ACROSS Greece 27-Pertaining to 30-Size of type 34-Fixed period -Heroic story

DOWN -Englishman

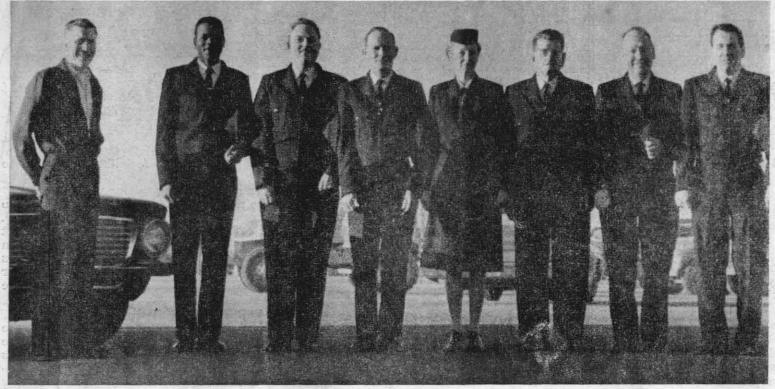
3-Rear part of

41-Country of

For Use In Authorized Service Newspapers Only.

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ord same subject (See 1)	HERE
то	

# Taxi Drivers Spruce Up In New Uniforms!



PREVIEW OF NEW UNIFORMS is given by taxi drivers T. E. Stoudemire, J. V. Adamson, E. E. Blurton, Mrs. F. M.

Mullin, R. R. Raney, J. Kiernan and J. R. Neffew. At left is Bobby Brown, head of Transportation Section personnel.

For the first time since NOTS began more than 20 years ago, Station taxi chauffeurs will be all spruced up in new uniforms, beginning Monday.

The uniforms are Navy blue, with Eisenhower-type jackets. The drivers will wear white shirts, black ties and eight-point

Mrs. F. M. Mullin, the only woman chauffeur, will have a Navy blue ensemble of skirt and jacket, white blouse, black bowtype tie and a WAVE-type hat.

Men drivers are J. V. Adamson, F. L. Bennett, E. E. Blurton, G. M. Brown, G. H. Davis, B. F. Durham, Joe Kiernan, M. V. Manning, J. R. Neffew, R. R. Raney and T. E. Stoudemire.

Bobby Brown, head of personnel of Public Works Transport Section, says in the near future the new jackets will also have shoulder patches inscribed "U. S. Naval Ordnance Test Station, Public Works Transportation .China Lake, Calif.

Naval Ordnance Test Station, China Lake, California Friday, Jan. 17, 1964 Vol. XIX, No. 2

# Plan Commission to Help **Operate McBride Park Here**

Steps to form a China Lake "park commission" to assist Station management in day-to-day and long-range plans for the operation of McBride Park, were taken last week.

Community participation in ation, projected plans of operathe park operation — when it tien and improvement, and how is reactivated — was the topic it will participate in the park's of a meeting at the home of Mrs. Marilyn Yukelson of the operation. American Association of Univer- will be needed for scheduling,

day at Mrs. Carol Chatterton's beautification, programs and achome, Mrs. Yukelson was elect- tivities, and publicity. ed to serve as chairman of a Those present: Marilyn Yukelsteering committee to form the son, Janet Hays, and Carolyn was elected secretary.

its aims and philosophy of oper- (Continued on Page 4)

Other committees probably long-range planning, general At a second meeting yester- operation and maintenance,

commission. Mrs. Judith Lind Lindberg, AAUW; Carol Chatterton, Girl Scouts; Eleanor Rod- payroll of \$36,000,000 is finding told the conference that "we are he noted. The committee decided it must gick, PTA; Lucille Mutchler and its way into Kern County's econing the process of studying the In closing, Capt. Blenman resubmit a proposal to the Station Ruth Garrett, Garden Club; Judy Command containing the make- Lind, Unitarian Fellowship; Bob up of the proposed commission, Glen and Dick Hays, Community

Capt. Blenman at Business Outlook Conference

# Tells NOTS Impact on Kern County Economy

The economic impact of the U. S. Naval Ordnance Test Station on Kern County in 1964 was tressed Wednesday by Capt. Charles Blenman Jr., ComNOTS, before the Business Outlook Conference sponsored by the Kern County Board of Trade at Bakersfield.

Capt. Blenman pointed out that business contracts between which have been announced by ting out of the housing business

#### Cites Building Programs

He cited construction programs — a new machine shop for which a \$750,000 contract is being negotiated, elementary school additions for which the Federal government has commited \$1,500,000 — indicating a continued growth of China Lake's importance to the county's economy.

"We have reason to believe more and more of our annual omy," Capt Blenman told the business leaders.

spite cutbacks in the military munity" entails the Navy get-

NOTS and Kern County indus- President Johnson, "there is no and selling the residences tries had increased from four to foreseeable indication that this aboard the Station to occupants. five million dollars in the past will affect any of the research "An open community would and development installations of also mean that the Navy would the military, such as NOTS." get out of the retail sales bus-

> May Transfer 105 Acres iness and allow private enter-"We feel at NOTS that we prise to perform that function. contribute to the economy of Decision on Feasibility Kern County in many different "I would like to emphasize and varied ways," Capt. Blen- that we do not expect a decisman continued, saying that leg- ion on this matter this year. But islative action is now under we do expect a decision as to its study by Congressman Harlan feasibility, and if feasible, a date Hagen for the transfer of 105 for its implementation."

acres of land at China Lake to If the decision is rendered to Kern County for recreation pur- move toward an open community, such a transference would The commanding officer also require a span of several years,

effects of establishing an open viewed 1963 at NOTS:

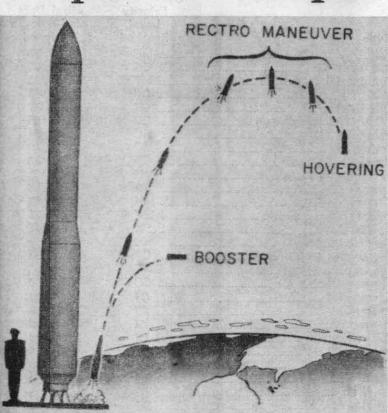
community for our employees. "It was our 20th anniversary, He also emphasized that de- Basically, the term "open com- we were visited by our Com-

# Propulsion Dept. Develops Hovering Rocket

Research Laboratories.

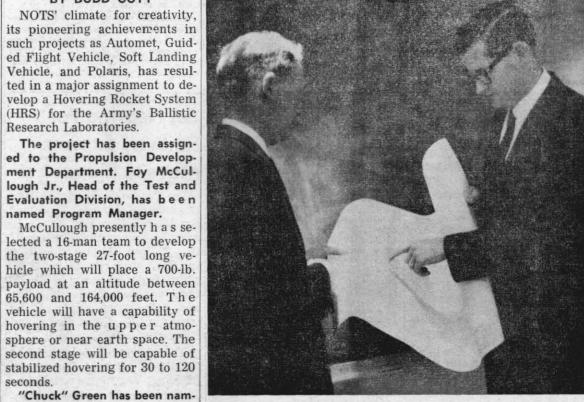
named Program Manager.

(Continued on Page 3)



HOVERING ROCKET SYSTEM—Artist's conception shows trajectory of Hovering Rocket being developed by the Propulsion Dept. for the Army's Ballistic Research Laboratories to place a 700-lb. payload between 65,600 to 164,000 ft.

# BY BUDD GOTT NOTS' climate for creativity,



ed Project Engineer for the Pro-STUDY BLUEPRINTS-Program manager Foy McCullough Jr. and administrative officer Ross Clayton scan blueprints gram while Ross Clayton and Hal Moore will handle the adprior to conference with project engineer "Chuck" Green and his group.

CHAPLAIN'S MESSAGE

# Talks With Teenagers

By Fr. Joseph A. Costa, O.F.M. CAP.

Common Problems and Anxieties

feelings" often gets them into embarrassing situations.

in things outside themselves at this stage than are girls.

"Daydreaming" came next. This is particularly a way

girls have of trying to build a world more attractive in fancy

than the one they actually live in. Boys are far more interested

problems may center about trying to control desires and fears

regarding self-gratification. With girls, they more often cen-

ter about such problems as to how to behave on a date, "going

too far." and how much physical contact should be permitted

Anxieties about temperamental traits begin in earnest.

"Religion" becomes a major concern now, and it is during

"My temper," "my bad disposition," "my moodiness" become

major concerns, because an adult, even a very young adult,

is not permitted the frank expression of feelings we take for

granted in a child. Many young persons worry about "intro-

adolescence that social service begins to challenge the imagina-

and questions seem to demand quick answers. Yet, as a

WELCOMED ABOARD - Chaplain Matthew H. Simon (cen-

ter), first Jewish Chaplain ever assigned to the Station, is

welcomed aboard for two weeks of active duty by Senior

Chaplain Robert C. Fenning and Chaplain Joseph A. Costa.

Chaplain Simon will conuct the Hebrew services to be held

in the East Wing of the All Faith Chapel at 8:15 tonight.

about their "manners" in more formal social situations.



Accounts Maintenance Clerk (Typing) GS-4, elephone Business Officer, work includes variety of clerical duties involved in billing, collection, accounts maintenance, re porting and general office service. Functions A collection of more than a thousand autobiographies are performed on a rotation basis with othe which describe how students feel and what they fear in their clerks assigned to identical positions.

of other means to fill these vacancies.

ROCKETEER

earlier teen years may be summed up in the following findings: Supv. General Supply Officer, GS-11, PD 225018, Code 259 — As Head of Material "Inferiority feelings" top the list. The experience and Division, plans manages and coordinates the problems described suggest that many young people just do ization and operations of the divisnot feel capable of meeting life. Many are concerned about Division provides logistic support to all the various ways in which they compensate for these feelings. Station programs through receipt, inspection The bravado commonly used in trying to overcome "inferiority storage and delivery of large variety of

Clerk-DMT, GS-4, PD 412001, Code 12 ing transcription from dictated materletters, memos, reports of complex noure, etc. Initiates routine correspondence is receptionist; performs timekeeping "Sex problems" of many kinds plague youth during this iling duties; and uses various office me period and are high on the list of problems. With boys, sex

File applications for above with Pat Dettling, Bldg. 34, Room 28, Phone 72676. Secretary (Typing), GS-5, PD 455005, Code 554 - Secretary to the Head, Manufacturing Division, Engineering Department. The in umbent is solely responsible for all secrearial and clerical duties as is necessary to assist him in the efficient operation of his

division and relieve him of all duties of a

File applications for above with Dora Childers, Bldg. 34, Room 32, Phone 71393

version" - living within themselves too much. They are anxious when meeting new people, do not know how to talk Engineer ,GS-11, 12 or 13. Code 451 - Perto others, do not "feel at home" with others, or are anxious forms analytical studies of expected per mance of various propulsion systems performance in future specified years. Previous experience in similar work is desirable tion of young people. They begin to want to do something to

improve the world. They debate questions of God, heaven and Physical Science Administrator, GS-14, Code 453 - Performs the duties of Head, Test & hell, the afterlife, and the reasons for human existence. Why valuation Division (Code 453). The function were human beings put on earth, they ask? All these doubts f the Divisio nis to initiate, develop and validate methods of physical an dchemical matter of fact, some of them will require a lifetime of thinking. testing needed to study properties of proellants and explosives, study inter-relation hips among tests and the significance of est data, develop quality control test proedures for teh manufacture of propellan nd explosives, and provide other physica d chemical testing services required ne Propulsion Development Dept.

File applications for above with Judy wman, Bldg. 34, Room 28, Phone 72723. Deadline for filing is Jan. 24.

COMPETITIVE EXAM cations are now being accepted

ypist, clerk steno, and clerk DMT. File Card Form 5000-AB with Civil Service Reptive, Code 652, China Lake.

NAVY OVERSEAS VACANCIES

GUAM - Employee Development Officer GS-12; Placement Specialist, GS-11 & 12; Employee Services Specialist, GS-11; mployee Management Relations Specialist, GS-11; Management Analyst, GS-9; Production Conroller, GS-12; Safety Officer, GS-9.

File applications for above with Navy Overseas Employment Office (Pacific), Federal Office Bldg., San Francisco, Calif. 94102, on or before Feb. 2.

Foreman Mechanic (Power Plant), Guan Executive Secretary, Board of U. S. Civil NAVMARIANAS, c/o FPO, San Fro Calif., on or before Feb. 6.

Quarterman, Refrigeration and Air Con- Type ditioning Mechanic, Philippines. - File ap plications for above with Navy Overseas aployment Office (Pacifi), Federal Office Bldg., San Francisco, Calif. 94102, no later

Set Hearing For

Railway Express

Move to Ridgecrest

The California Public Utilities

Commission has set a hearing

for Wednesday, Jan. 22, at 10

a.m., to hear the application of

the Railway Express Agency,

Inc., for authority to move its

office from Inyokern to Ridge-

crest and to provide collection

and delivery of shipments by

truck in the China Lake and

The hearing will be held at

the Ridgecrest Community

All interested parties may ap-

pear and be heard then, Noel

Coleman, acting secretary of

the Public Utilities Commission,

Building, 230 Ridgecrest Byld.

Ridgecrest area.

gives notice.

### The Rocketeer

Official Weekly Publication U 5. Naval Ordnance lest Station na Lake, California Captain Charles Blenman, Jr., USN

> "1." 'T " Bibby Public Information Office Jack G Broward

Richard Grueneberg Sudd Gott

Frederick L. Richards Special Assignments DEADLINES

Saturday. Thursday before First Friday-..... Tues., 4:30 p.m

The Rocketeer receives Armed Forces Press Service material All are official U. S. Navy shotas unless otherwise Identified Printed weekly with appropriated funds in compliance with NavExos P-35, Revised July 1950. Office Unitarian Fellowship (Parish Hall) - 50 King St., Bidg. 00929. Phones - "1354, 71655, 72082



Morning Service-11a.m. Sunday School-11 a.m.

Protestants (All Faith Chapel) Morning Worship-8:30 and 11 a.m. Sunday School-9:30 a.m., Groves and Richmond elementary schools.

Roman Catholic (All Faith Chapel) Holy Mass-7, 9:30 a.m., and 12:30, 5:30

6 a.m. Monday through Friday, 8:30 a.m. Confessions-8 to 8:25 a.m., 6 to 8:30 p.m.

Tues., 11:30 a.m. NOTS Hebrew Services (East Wing All Faith

Every first and third Friday, 8:15 p.m. Sabbath School every Saturday morning. Fellowship Meeting - Sundays, 7:30 p.m.

Sunday School - 9:30 a.m.

'DESERT PHILOSOPHER'

Death Valley Calls Again

By "POP" LOFINCK

Death Valley again.

In this cold spell you may not feel like getting out to picnic anywhere

But picnicking and camping is good for you any time. So - Now is the time to explore Death Valley. Or if you

get a good start, you can't do it in one weekend. It's a big place. The monument covers nearly 3000 square miles-almost three times bigger than Rhode Island. A third bigger than Delaware. One hundred and 40 miles long-four to 16 miles wide. Over 500 square miles are below sea level. Badwater is 282 feet below sea level. Telescope Peak is 11,331 feet above that low point.

#### SUGGESTED ROUTE FOR QUICK TRIP

It's like going to a geology school. As an opener-if you're short of time-you can go out past Trona-and over the nose of the Slate Range-up Wild Rose Canyon-past the Sand Dunes and Mosiac Canyon-past Stove Pipe Wells to the Visitor's Center Natural History Museum and Art Gallery. Then you know where you want to go next.

The best approach to your Death Valley exploration from China Lake-if you have time (well, take time!)-Proceed out Highway 6 to Olancha-turn northeast across the south end of Owen's Lake-(all paved) to Highway 190-turn right on 190. You go up to 5,000 feet, get a panorama of Panamint Valley, pass Panamint Springs, cross Panamint Valley down to 1,500 feet elevation up Towns Pass (5,000 feet again)-look back at a grand panorama of the Argus Range. Relax at Stove Pipe Wells a bit. Pretty soon you're below sea level. Go to Visitor's Center first.

The Museum is open daily. On the hour, a 20-minute illustrated program is given in the auditorium. Illustrated talks are given nightly. Of course you're going to stay over Saturday night

SOME FOR TENTING, SOME TRAILERITES The Furnace Creek Campground is adjacent to the Visitor's

Center—open to tenters only. Texas Spring, a mile away, is open for trailerites and tenters. They have similar facilities-water, a few tables and camp stoves. Fire wood may be purchased at Furnace Creek

Or you can rent a trailer or there are good cabins near the Ranch-or you can go to the super elite-Furnace Creek Inn, and dance.

Death Valley is a vast geological museum. You will be glad you went and wonder why you didn't go sooner and often. The anthropologist said positive evidence had been uncovered of human habitation 20,000 years ago.

Last year in Texas human camps were uncovered that were MORE THAN 37,000 years old.

The age has been positively verified by four different Carbon 14 tests, and a new type of test. INDIANS CLAIM MIGRATION WAS REVERSED

In bull sessions with my Indian friends they have informed me that the white man's theory of human history was wrong -that the Indians did not cross Bering Straits on the ice from Siberia to populate North America—that it was the reverse. That the human race started in North America and migrated east to Egypt and Asia.

It would be a good joke on anthropologists if at some time in the future the Indians' theory were proven to be right!

A word of warning-take a coat. The desert may be balmy in mid-day, but when the sun sets the heat dissipates fast and

#### **December Housing Assignments** Priority Hiral Date

Level

of Employee

Assigned

	Type	Reacticu	Assigned	
	Hill Duplex (2)	MC	6/1/63	
9	Panamint (3)	CA	12/9/62	
r	Juniper (3)	MF	11/16/63	
	MOQ (3)	CC	4/11/45	
	Hill Duplex (3)	CB	5/4/57	
	Wasp Circle Duplex (3)		6/18/58	
	Panamint (4)	MC	12*1*54	
	Joshua (4)	MG	11/16/60	
	Yucca (4)	CD	7/2/62	
	Yucca (4)	MH	5/16/61	
	Wherry (2)	SH	12/1/63	
	Wherry (3)	MH	11/16/63	
5	Wherry (4)	MH	5/16/61	
5	Old Duplex (2)	SH	12/1/63	
)	Normac Duplex (2)	NONE		
£	Old Duplex (LBP) (2)	CF	5/14/62	
	Old Duplex (3)	NONE		
5	Normac Duplex (3)	CC	2/4/59	
	Normae (2)		1/9/47	
1	Apartment (2)	CJ	11/20/50	
,	Hawthorne (2)	MI	4/4/63	
	Letourneau (2)	CI	11/23/62	
	Normac (3)	CI	9/2/58	
	Hawthorne (3)		7/7/55	
	Apartment (3)		11/10/63	
1	Motel (0)	SG	8/23/63	
	Apartment (0)	SG	8/23/63	
	Old Duplex (1)	CI	1/14/46	
l	Normac (1)	CK	8/27/63	
-	Apartment (0) Old Duplex (1) Normac (1) Hawthorne (1)	CK	8/27/63	
	Motel (1)	CC	3/10/49	
	Apartment (1)	CF	12/17/51	

# 'Sailor' Seeks All-Navy Honors

210-pound heavyweight contender for All-Navy boxing honors, heads for San Diego this weekend and a series of elimination matches that will lead to the All-Navy tournament scheduled this

A veteran of 70 Navy bouts and holder of a string of titles that includes ring competition in All-Navy matches since 1960, "Sailor" is attached to the Supply Department here at China Lake.

It was during his workouts at the San Francisco Cow Palace in 1960 that Casimir met Cassius Clay, who went on to win Olympic honors. "CAN'T BEAT LISTON"

"He's a good fighter and will eventually become a much better fighter. But, he will not beat Sonny Liston," claims "Sailor," who adds that Clay hasn't the punch-power to beat Liston in the championship match next month in Miami. Holder of heavyweight division titles in Ha-

waii in 1962 and 1963, Casimir also won 11th and 14th Naval District titles and was All-Navy champion in 1961. He captured the Western Pacific Service title that year also and was an All Service semi-final-

ist in 1962. Contrary to the public's demand for an end to boxing following the ring deaths of several men in recent years, Vern, a New Orleans native who went into ring combat in 1956, feels that,

WIFE HAS HER SAY How does the Navyman's wife, Catherine, feel about this?

"properly supervised, there's no greater sport."

"Like most women, she'd prefer me taking

IWV Jr. Ski Club Sets

The Indian Wells Valley Ju-

nior Ski Club will meet Monday

evening at 7:15 in Room 31,

Wing "L", at Burroughs High

School, according to club direc-

On the agenda will be the dis-

cussion of plans for a ski trip to

Mammoth for the junior mem-

Professional ski instruction

**Basketball Standings** 

(As of January 10)

**Basketball Schedule** 

Tuesday, Jan. 21

Thursday, Jan. 23

Won

Lost

6:00 p.m.

7:30 p.m.

6:00 p.m.

7:30 p.m.

movies will also be shown.

**Meeting For Monday** 

tor Paul Driver.

NOTS

Aero Science

Seaman Guard

ADO vs. VX-5

NAF vs. NOTS

AOD vs. NAF

Seaman Guard vs.

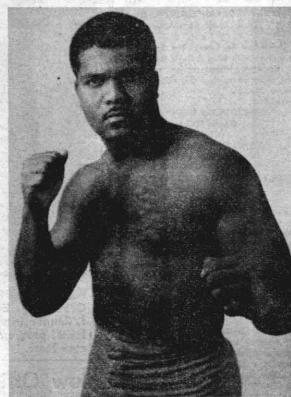
Aero Science ....

VX-5

NAF

AOD

"But, I truly love the competition involved ing each bout."



VERN 'SAILOR' CASIMIR

in boxing. Navy fighters wear protective headgear, are examined before each fight and are under the constant supervision of officials dur-

Tells What He Thinks of Cassius Clay

USED OLD GOLF COURSE AS RANGE

JOE STONE

Right about then a fellow named Lt. Doss, USN, came along and he and Joe were able to get hold of the old Satellite golf course area to use as an archery range. Together, they formed what is now the China Lake Bowmen organization, for which John Loper, who is currently one of the best competitors in the country, wrote the constitution. The China Lake Bowmen, of course, both men an women, have since become one of THE clubs to contend with at a meet. They have brought home practically every cup on the circuit and, when not doing that, they bring in the seconds and thirds.

RIM

SHOTS

By BILL VALENTEEN

find him working with as many as 80 to 100 kids.

water sports, there wasn't much else to

do. Joe turned to archery as a hobby at

first. But then became interested in the

sport as a form of concentration and indi-

He transferred to the Long Beach Ship-

yard right after the war and that's where

he first began to teach children. When

he came to China Lake, he began similar

activity in conjunction with Dr. Farley

est the teenagers showed in the sport, he

gave Joe "carte blanche" to use the foot-

he could have all the equipment he

ball field area for a range and told him

When Dr. Farley saw how much inter-

down at the old Burroughs high school.

Last week, you saw a picture of six kids who won a Chicago

Joe worked weekends helping the kids, as he does every

style shoot out on the archery range. According to Joe Stone,

it didn't "just happen." These kids put a lot of hard work and

practice into being able to shoot good enough to take home

weekend with other kids, to help them develop their confidence

and style. During the summer time, if you happen to be pass-

ing 54-B Rowe St., here on the station, you might very well

World War II when he was employed at a shipyard at Pearl

Harbor. Those days, in Hawaii, if you didn't particularly enjoy

Joe's interest in archery dates back to the beginning of

Joe has his own "hobby" shop for archery. He will sell you the raw materials and teach how to make your own arrows, quivers and bows. And, by the way, Joe can give you a very good discount on all kinds of "store bought" equipment for which he has many fine outlets.

HELPS RETARDED AND HANDICAPPED

Another interesting thing about Joe Stone's archery range is that special classes are conducted on it for children who are mentally retarded and also those that are physically handicapped. The teachers hail this activity as being among the best types of therapy for these kids.

The father of five girls and one boy himself, Joe says he would be very happy to have any children between the ages of 9 through 15 come to his place on the weekends and use the range. He says he will be happy to work with them as long as they are willing to help themselves a bit.

Joe is the person who signs off the tests for the Boy Scout merit badge in the sport, and he really puts the boys to a stiff

HOPES FOR INDOOR RANGE, AUTOMATIC TARGETS

Joe's dream, as far as further bow activity on the station concerned, is to see archery lanes put in operation with automatic targets. This would be an indoor range, similar to a bowling alley operation, with people setting up leagues, shootoffs, and just generally having a good time.

It occurs to me, if the station had the space, that this would be another ideal way to add to the coffers of the Em ployees' Service Organization, which currently operates many of the service facilities on the station. (In addition to those that are part of the Navy Exchange complex.)

Well, archery didn't make it to the Olympic games this year, but it certainly is big around the Indian Wells Valley, especially Joe Stone's house.

Keep smilin', Sport! See you next week!



PRETTY PICTURE—An imagof foresome tourney. Gift cerinative photographer's "snap" tificates will be prizes. judgment pays off handsomely in this study of glamour made at Cypress Gardens, Fla. Lovely Florence Imber soaks up the sun while perched on a rock near the shore. Cy- place with low net score of 60 - 1100 Guipis ossou pue Gui

tourist attractions in Florida.

#### Golfers Tee Off In President's Tourney Tomorrow

At least a dozen foursomes are 2.Only two teams defeated nasecond annual President's Tour- son. Who were they? nament at China Lake Golf 3. Who was the last fighter to

Course. The event honoring Capt. B. titles during his career? L. McCreery who is now serving 4. One American League pitchthree-hits-and-a-miss, best ball sons. Who was he?

A buffet will be served following play.

In other recent matches, Equa -ihizh bns and Green and Wichia and Warren Murbach took first press Gardens is one of many in a string Scotch foursome tour- - Jung and 'buitoous joisid build nament.

# QUIZ

AIM SPOILED-Good defensive play by a NOTS man spoils

aim of an AOD player during Tuesday night's cage action in

which NOTS downed AOD 79 to 44. Tuesday night's game

between NAF and Seaman Guard was cancelled.

1. What events are included in the modern pentathlon?

scheduled to tee off tomorrow tional collegiate basketball chammorning to participate in the pion Loyola of Chicago last sea-

hold welter and middleweight

his second consecutive term as er led his league in earned-runpresident of the club, will be a average for nine different sea-

> (Answers to Quiz) 4. Lefty Grove. 3. Carmen Basilio.

1. Cross-country run, swim-



SWIM MEET ANNOUNCER HONORED-Denny Lyons, who has announced the IWV Swim Meets for the past seven years, is presented a desk set by Carol Chatterton and Frank Knemeyer, president of the IWV Swim Team Board. Lyons is leaving the area to enter business at San Mateo.

and a U. S. Flag from Capt. G. H. Lowe at

retirement ceremony held at the Long Beach

Pasadena

Serghison.

Lowe, Officer in Charge, NOTS

During his tour at NOTS he

served as the assistant Sea Op-

erations Officer in Long Beach.

He was relieved by CWO-3 R. F.

Wilcox and his wife plan to

Also honored at the ceremony

retire on a ranch in Arkansas.

were Lt.(jg) James E. McDole

who received a commendation

for services rendered as NOTS

Diving Officer in Long Beach,

and George A. Knox, QMC, who

received a U.S. Flag upon his re-

tirement after 30 years of naval

The annual meeting of the

This annual meeting offers

sion of any matter of interest

Specific items to be covered

are: Declaration of the dividend

# Fund Drive Tour Of Duty At Kick-OffSet NOTS Completed

Getting underway at NOTS Pasadena next Friday, Jan. 24, is the Federal Service Joint Cru- ciates at NOTS, preparatory to sade and National Health Agen- leaving for his new assignment cies Fund Drive. The campaign at Norfolk, Va., where he will be will continue through Feb. 12. | Engineering Officer aboard an

Norman S. McDonald, who bridge (APA-228). heads the Annex campaign will be assisted by Robert Larson. on Feb. 15, 1962, from previous Dick Frederick will serve as duty aboard the USS Delaware Publicity Chairman and Doug (ARS 23). He has been in the Shaw will assume duties as military service for 17½ years,

#### Briefing for Keymen

selected keymen at 1000 on Jan. land in 1945. 21, in the Building 7 Conference from the two agencies will provide information for the drives, and present films. Also the keymen's kits will be distributed.

keyman in your division will contact you for your contribution. Open your hearts and your purse. The station goal is 100%.

"To all of you who have the welfare, security and a happiness of your fellow men at heart, I would like to make this appeal for our four international agencies of the Federal Service Joint Crusade - The American-Korean Foundation, CARE, Radio Free Europe and Project HOPE," says Secretary of the Treasury Douglas Dillon, National Chairman of the Joint Crusade Campaign.

"Each of these agencies, through the work which it carries on overseas, helps in its own way to relieve sickness, poverty, hunger and oppression, which are so much a part of the daily lives of many who are our friends across the seas."



GRADUATION - Upon completing the 12-week course in Fundamentals of Supervision, Dr. Gautschi (left, front) and students assemble for group photo. Members of the class are Barbara Leisge, Ellen Cotterman, Deanna Bingham, Thelma Calopedis, Elayne Colson, Evelyn Eckard, Isaac Lindsay, Donn Parrish, Gordon Stuart, Edward Thomas, Robert Boyls, Franklin Eltz, Ramon Oja, Royford George, Jack Kindred, Arnold Livingstone, Robert Gottfredson, Robert Marimon, Robert Thurman, Edward Kimura, Roy Kartzmark, Kenneth Fishel, Alice Anderson, Eric Swanson, Lester Petersen, Willard Clark, David Hultberg, Douglas Shaw, Karl Scharping, Jack Sayre, William Shealy, Gerrit DeVries, John Young, and John Busik.

-Photo by Art Block.

### NOTS Pasadena Feted at a luncheon vesterday.

Lt.(jg) Joseph A. Kennedy bade farewell to his friends and assoattack transport, the USS Rock-

Lt. Kennedy reported to NOTS having joined the Navy in Los Angeles in July 1946, after leav-There will be a briefing of all ing his native state of Rhode Is-

During his tour at NOTS he Room. At this time, speakers has served as Sea Operations Officer with duty at the Long Beach Facility.

His wife, Sandra, and their two children - Mary 7 and Jos-Beginning next Friday, the eph 5, will accompany him to Norfolk where the family will establish residence.



LT.(jg) J. A. KENNEDY

### Long-Time Employees Completes 30 Years A full dress inspection and retirement ceremony was hold re-Accept New Positions cently for CWO-4 Earl E. Wilcox upon completion of 30 years of continuous naval service. Wilcox was presented with an in-Two familiar faces leave the NOTS scene this week: Allen scribed model polaris missile

UPON COMPLETION of 30 years continuous

Naval service, CWO-4 Earl E. Wilcox (left)

receives an inscribed Polaris missile model

K. Billmeyer, General Engineer in the Systems Branch of Under- and U. S. Flag. This presentawater Ordnance Department, and Glenn R. Carley, Consultant tion, and a speech honoring Mr. on Advanced Systems Planning Wilcox was made by Capt. G. H.

Billmeyer is transferring to NASA at Aerojet, Azusa, where he will be associated with the SNAP-8 Program.

in ASW in the Torpedo Develop-

nent Division, UOD.

A long time NOTS employee, Billmeyer came up from the Cal-Tech days and has had continuous service here except for a seven month period with the University of California, Los Aneles, at the Sandia Laboratory n New Mexico, in 1948.

Carley has accepted a position with the Office of Program Appraisal, a part of the staff of he Secretary of the Navy.

During his 18 years at NOTS China Lake and Pasadena, the last 12 years at Pasadena, Car- He first entered federal service Annual Credit ing a number of summer studies. 1942-1945.



GLENN R. CARLEY

ley has received several com- in Philadelphia with the Naval Union Meeting mendations for work done dur- Air Experimental Station from

#### NOTS Pasadena Employees Fed-Station Personnel eral Credit Union will be held at 12 noon, Tuesday, Jan. 21, in the Large Conference Room, Complete Course announced. the best opportunity for discus-

Thirty-four Pasadena Annex personnel recently completed to Credit Union members. a twelve-week course in Fundamentals of Supervision, conducted by ex-NOTS employee, Dr. T. F. Gautschi.

Sponsored by the Supervisory Development Sub-Committee of a program. Bearing this out were rectors and the Credit Commitstudent with the basic concepts | Good communication between | Traffic Tips For

tire 12-week sessions. He also a smoother working relationship. check traffic carefully and be caliber of the students.

worthwhile sessions, the stu-Propulsion Laboratory as Assist-Remember, it is extra difficult dents wholeheartedly agreed on ant Project Manager for the Sur- to judge the speed of an apthe benefits derived from such veyor Project.

the Employee Development some of the answers of particultee members, and reports on the Committee, the course emphasizes the non-regulatory aspects with the property aspects of the non-regulatory aspects.

The Employee Development are interest to a test question, what do you feel is the most regulatory aspects.

Refreshments will be served. sizes the non-regulatory aspects significant thing you learned from this course?"

and literature in the field of management and employees was Night Pedestrians supervision and management. | an important factor to many of Dr. Gautschi, who has conduct the students. The reasons for 1. If a sidewalk is available ted the course on several previous occasions, stated he was tions and the employee's contri- 2. When crossing the street particularly pleased with the low bution to the overall program after dark, cross with the traffic absenteeism throughout the en- was also cited as a necessity for signal. If there is no signal,

commented on the exceptional Dr. Gautschi was employed by sure you can step all the way NOTS from 1950-1961. He is across without having to stop in Voicing high regard for the presently associated with Jet the middle to let traffic pass. proaching car at night.

### Fall at Whitney Portals His many friends and associates at China Lake and in Ridgecrest mourned the passing of Frederick C. Scheberies, Test De-

Fred Scheberies Dies In

Friday, January 17, 1964

partment mechanical engineer and member of the China Lake Mountain Search and Rescue

Group who fell to his death last Saturday during a practice climb of the frozen water falls at Whitney Portals near Lone Pine.

Scheberies, 27, apparently lost his foothold and hurtled an estimated 300 feet to the base of the falls, according to other members of the group who witnessed the tragedy. A total of 14 had taken part in the exer-

They rushed to his side and administered first aid prior to the arrival of a doctor from Lone Pine. But a coroner's investigation determined later, Scheberies' injuries were too severe for survival. He was the first fatality of the group since it was formed in 1958.

A graduate of CalPoly with an aeronautical engineering de- To Elect Thursday gree, Scheberies came to NOTS under the Junior Professional Training Program in March of 1959. On completion of that program he was assigned to the Test Department. Prior to his death he was employed in the Design and Development Branch of the Range Division.

unteered to bring it over to the Jan. 21, in the East Wing. opposite bank, and then crossed | Chaplain Robert C. Fenning coverable the frozen stream. While return- will install the newly elected ing, he paused before reaching officers. Lorraine McClung will tential scientific values," McCulward that he fell.

Capt. Frederic A. Chenault, parents, Mr. and Mrs. Frederick

(Open) beginning at 6:30.

FREDERICK SCHEBERIES

Test Department Engineer

Who Fell To His Death

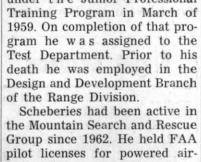
Former NOTS XO

**Visiting Station** 

Missile Range, too.

NOTS Executive Officer from K. Scheberies of 45 Leamont August, 1955, to June of 1958, Court, Oakland, Calif. Funeral is aboard the Station today and services, followed by interment, will be here through the week- were held in Oakland last Tues-

manding officer of the Naval served as pallbearers. Ordnance Missile Test Facility | Memorial Services were conat White Sands, New Mexico, is ducted here vesterday at the All scheduled to visit the Pacific Faith Chapel by Chaplain Robert



craft, gliders and seaplanes, was a member of the China Lake Soaring Club and was a second lieutenant in the Civil Air Patrol. As such he participated in many aerial search and rescue operations. Scheberies also Women's Guild To was a member of the local Gun Club and the Desert Dancers, Install Officers

Scheberies is survived by his lenges the Church."

He will be greeted by his Station employees Dr. William many friends here this evening S. McEwan, Jimmie Craig, Char- Wednesday, Jan. 22. at a no-host cocktail party at the les Drew, James Nichols, Gor- Outdoor Shop - Closed all day Commissioned Officers Mess don Heeke, and Irwin Koff, fel- Thursday, Jan. 23. low members with Scheberies in Capt. Chenault, currently com- the China Lake Soaring Club

C. Fenning.

# A Poignant Letter From 'Overactive Conscience'

(Last April, The Rocketeer published an unsigned letter from a former NOTS employee who admitted stealing "a few items" while working here. The writer asked forgiveness and enclosed \$10 "in payment." Now, the following letter has

"Having been connected with the China Lake Naval Ordnance Test Station many years ago, and now nearing the end of life, any wrongs we may have done or think we may have done, bothers our conscience. We want to make restitution for any possible wrongdoings done in this life, now, as we want to live Christ-like and want forgiveness of any and all wrong-(signed)

OVERACTIVE CONSCIENCE

"Enc. \$60.00." (Note: The \$60 enclosed in this latest letter—as was the \$10 in the April, 1963 letter — has been credited to the account for offsetting losses sustained through misappropriation of gov-



DISCUSSION-Ron Dettling (left) and Fred Zarlingo holding early concept discuss with (I-r) Don Nyberg, Lee Horgan, and Bob Spear,

features they can incorporate in hovering stage, aerodynamic structure, and controls for the Hovering Rocket System.

# United Fund Set

United Fund board of directors is scheduled for the UF's annual meeting next Thursday, Jan. 23, in the East Wing of All Faith Don Moore, Code, 404, will be hovering stage, assisted by Lee Chapel, starting at 7:30 p.m.

The meeting is open to all contributors to the valley-wide wel- lough stated that the dimensions aerodynamics and structure; fare organization, and President of the elliptical payload would Robert Spear will have the con-Bob Forrester urges all member be approximately 48 inches long trols development. Manny Turse agencies to have a representa- and 32 inches in diameter.

Other business will be the

a member of the rescue group Protestant Congregation of the the Hovering Rocket System. Its by Harold Nuffer, and Lowell who was above Scheberies at the All Faith Chapel will hold its dimensions are approximately Paulsen. Portals, another member had first quarterly meeting of the 103 inches long and 40 inches in Ground support and test operasked for a rope. Scheberies vol- new year at 7:30 p.m., Tuesday, diameter.

the bank. It was shortly after- give the introduction to the new lough said. study, "The Changing City Chal-

### Closed For Inventory

Navy Exchange activities will be closed for semi-annual inventory as follows:

Retail Store — Closed all day

### Propulsion Dept. Gets Nomination and election of members to serve on the IWV Hovering Rocket Job (Continued from Page 1) | conceptual design phase will be

available for consultation.

Second Stage

The second stage, or hovering group presentation of committee re- platform, approximately 19-feet ports covering the past year's long and 3 feet in diameter, will

#### additional components. First Stage

"The vehicle has many po-

man-made phenomena of both Department. space and earth origin, which surable in any other manner," he elaborated.

be under cognizance of John Supply Department. Bush and David Fenneman.

Design Group Those working on the vehicle ices.

ministrative end of the Program. Ronald Dettling handling the Horgan and Don Nyberg; Fred Program manager Foy McCul- Zarlingo will be responsible for of the Engineering Department has been detailed to assist the

#### Guidance Group

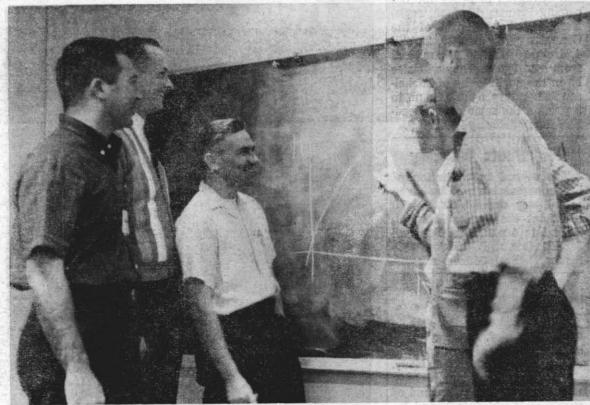
Ben Glatt will be in charge of hold the guidance package and the development of guidance system. Vern Wheeler, Tom Nickell and William Nolan will At present, plans call for us- be responsible for the command ing the second stage of the guidance. Responsible for the Army's Pershing missile as the autopilot will be Weapons De-According to James Nichols, The Women's Guild of the first stage, or booster stage, for velopment's Earl Roby assisted

ations will be handled by Dale The HRS's payload is to be re- Randle assisted by Don Grasing of the Test Department.

Documentation for the program will be in the hands of Bob Weakly and Ray Reed of "Its missions could include di- the Engineering Department rect observation of natural and and L. J. Runchey of the Test

Reports will be edited by Al might not be observable or mea- Jacobson and TID's Jim Parry. Assistance in procurement for

the program will be provided by Vehicle mission analysis will Kirk Dyer of NOTS Pasadena Gordon Whiting and Alma Koch will provide support serv-



BLACKBOARD WORKOUT - Pondering the ramifications of trajectory, booster separation, autopilot, and command guidance for

the Hovering Rocket System (I-r) are Earle Roby, Dale Randle, Ben Glatt, John Bush, and Lowell Paulsen.

#### ComNavAirPac Notice Warns of Insurance Waiver

A ComNavAirPac notice urges all personnel who were on active duty between April 25, 1951 and Jan. 1, 1957—and who carried U.S. Government or National Service Life Insurance—to be positive that they have cancelled in writing any waiver of payment of premium for the policy.

"Otherwise, if death occurs during active duty while the waiver is still effective, surviving dependents will receive only the low Veterans Administration death compensation at rates effective prior to 1957 instead of the much higher dependency and indemnity compensation," the notice emphasizes.

"In a recent case, the widow of an officer who died on active duty with the waiver of premium still in effect, receives only \$70 per month from the Veterans Administration instead of \$227 per month which would have been payable as dependency and indemnity compensa-



CWO WILLIAM D. BOWEN reports to the Naval Air Facility as Power Plants Officer from duty aboard the USS Hornet (CVS-12) as Aviation Fuels Officer. Prior to his Hornet assignment he served as Aviation Fuels Officer at NAS Miramar and aboard the USS Kearsarge (CVS-33). A native of Trenton, N. J., he entered the Navy in 1942.

#### Registrars to Aid **Voters For Primary**

For the convenience of voters who wish to get their registration affidavits in order for the coming Primary Election, registrars will be in front of the Commissary on Jan. 20, 22 and 4, from 10 a.m. to 1 p.m. and from 4 to 6 p.m. They will also be in the north lobby of Michelson Laboratory from 11 a.m. to 2 p.m. on the same dates. Deadline for registering is April 9.

#### 'Flu' Shots Tuesday

The second immunization of influenza vaccine will be given to military dependents, age 6 to 12, at the Station Hospital, from 1 to 4 p.m. next Tuesday, Jan. 21, Cdr. R. B. Speaker (MC) Senior Medical Officer, reports.

### NOTS Impact . .

(Continued from Page 1) mander-in-Chief, and we fulfilled our mission of research and development of the U. S. Navy.

"These accomplishments have added greatly to the arsenal of the Free World forces, and acknowledgment of our efforts on the national level have been gratifying."



ROCKETEER

PHOTOGRAPHIC TABLES were turned on Thomas L. Presson, PH3 (left) and Walter E. Hamler, PH2, last Friday when they shipped over for six more years. LCdr. L. B. Schults swore them in in his first dual reenlistment

ceremony. Both Hamler and Presson will be assigned to Class B Photo School at Pensacola, Fla., under the STAR Program. Taking a picture of the picture-takers is Lee Mascarello,

# New Ney Award Rules Announced For 1964

THE NAVY RELIEF CONTINGENCY FUND grew consider-

ably this week after sizeable checks were presented to Chap-

lain Robert C. Fenning by Mrs. T. S. Kent (left), representing

announced new rules for the August 1964. 1964 Ney Memorial Awards | Another change in the 1964

two outstanding afloat messes of the nominated mess. His evarather than one. Ship messes | Juation report will be made difeeding 300 or less will compete rectly to the Ney Committee for the newly-established Best when it meets in Washington in Small Mess Afloat Award and May 1964 to select the finalists. ships feeding over 300 will compete for the Best Large Mess Afloat Award.

The award for the outstanding ashore mess will remain un-

As in the past, the 1964 Ney trict. The "best-of-command" Awards Program will be sponsored by the Food Service Executives Association, which will present the outstanding mess awards to the winners at the (NAVNEWS)

WASHINGTON — The Bureau Association's national convenof Supplies and Accounts has tion in Portland, Oregon, in

Program honoring the Navy's Ney competition rules will afoutstanding ship and shore en- fect the general messes chosen listed men's messes. The 1964 as outstanding in their respecrules feature the first major tive type command or naval dischange to the program since trict. As each command or disthe all-Navy food service com- trict nominates its top mess, a petition was initiated seven | Field Food Service Team Officer representing the Ney Award In the 1964 Ney contest award, Evaluation Committee will be plaques will be presented to detailed to a one-day inspection

According to the Bureau of Supplies and Accounts, many type commanders and commandants requested that an on-site evaluation be made independent of the type command or dissemi-finalists may expect to be visited by the Ney Committee's representative in April 1964.

# Flight Surgeon



LT. JAMES E. STANDEFER reports from residency in internal medicine at the University of Vermont to relieve Lt. S. L. Tope Jr. as Flight Surgeon at VX-5. He is a grad- Leroy Jackson, Community Reuate of Harvard College and Cornell Medical College.



the Medical and Dental Dept. wives, and by Mrs. H. N. O'Connor, representing wives of officers who are serving with Air Development Squadron Five.

### **Drennan Gets** Contract For BurroughsWork

Friday, January 17, 1964

The new classroom addition and study hall at Burroughs High School will be constructed by general contractor William A. Drennan of Bakersfield on his bid of \$331,900.

The contract was awarded Drennan by the board of trustees of the Kern County Union High School and Junior College Districts. His bid was the lowest of three received, the board

The work is to be completed in 240 calendar days and includes construction of six standard classrooms, two language rooms, a mechanical drawing and related work rooms, enlarging the library and building a new study hall. There will also be rest rooms and a project storage room in the contract.

Funds are provided through the \$6,930,000 bond issue approved by the voters last May. Plans and specifications for the work were prepared by the Bakersfield architectural firm of Thomas and Leydenfrost, AIA.

#### R. S. Tucker Speaks At ASPA Luncheon

Robert S. Tucker, former director of defense research and engineering in the Department of Defense, will be the ASPA speaker at the noon luncheon meeting scheduled next Tuesday, Jan. 21, in the Executive Dining Room of the Commissioned Officers Mess.

It will be a "sit-down" luncheon with chicken-fried steak at \$1.50 a plate, according to the ASPA News.

Tucker, currently associated with the Northrop Co. in Los Angeles, will speak on "Two Recent DOD Developments in Regard to Research and Development."

### McBride Park . . .

in November (Continued from Page 1) Council: Arnold Yukelson, Kern

Memorial Society; Harold Pierce, China Lake School District; on the PTA's yearly work. Chaplain Robert Fenning, Station Chapel; Dick Hartnett and

# Capt. Hough Stresses Serviceman Is Due Individual Recognition Safety Branch to make sure they keep their windshields clean to help offset the extreme "Each serviceman is an indi- ing of the IWV Navy League glare of the sun during morn-

vidual with the normal drives, Council at The Hideaway Mon- ing and evening hours. frustrations, ambitions, needs day evening. and wants of any person in so- Guest speaker for the occa- lowing three recent accidents ciety. And above all he wishes sion in which the local Navy on Station which apparently recognition as an individual," League salutes Naval officers of were caused by the glare on Capt. Jack W. Hough, Command- the area, the veteran naval avi- pitted and unclean windshields. ing Officer of the Naval Air Fa- ator noted that the cutback in In one mishap on Mt. Springs

CAPT. JACK W. HOUGH

... Navy League Speaker

Act Again for PTA

"Big business tends to think caped injury. of employees in numbers rather A Security Police officer sufservicemen does not lose his area. identity and becomes a mere cog And in a third accident, at stressed.

#### Give Recognition

"We must give our men rec- ed" one driver. ognition — the same recognition | The Traffic Safety Branch we strive for ourselves - for a also announces that four-way job well done," the Captain em- boulevard stop signs-and apphasized. "I've encouraged the proach warnings are being men of NAF to complete or aug- installed at Lauritsen and Richment their education and above mond Rds. Motorists, particuall to take pride in themselves, larly those who drive to and the unit, and the Navy."

borne out in that over 400 of this. Due to the sun's position, the 600 men at the Naval Air this has become a hazard area. Facility will be taking examina- An officer directing traffic there February

#### Can Do Much to Assist

local Navy League can do much shields clean. to assist us in maintaining the morale and esprit de corps of servicemen in your community 'Guys and Dolls' To by recognizing him as an individual," Hough told the audi- For Korean GI Bill

A special performance of "These men are anxious to be "Guys and Dolls' will be given accepted in the community. tomorrow to raise funds for the They attest to that by their sup-China Lake Elementary Schools port of your community charity drives, benefits, etc.

The hit musical, produced by "Plus the fact that many end the Desert Division of Bakers- their careers here and become field College, played to capa- permanent residents of your city audiences when it opened community.'

#### Valued Citizens

Nick Kleinschmidt, Ways and In conclusion, Capt. Hough Means chairman for the PTA, said, "Meet them halfway and said proceeds would go to carry they will become your most valued citizens, and you will have The performance is to be held achieved also the basic goals of at Murray School, he said. Tick- your fine organization - the ets are \$1, and curtain time is recognition of our greatest asset - the individual Navy man."

#### Urge Motorists to Clean Windshields, Offset Sun Glare

China Lake motorists were urged this week by the Traffic clean to help offset the extreme

The warning was issued fol-

cility, told an audience of over "manning levels" of command Canyon Road, the driver of a 100 attending the dinner meet- makes it necessary for com- Jeep failed to see a turn in the manding officers to get the best road and ran off the embankeffort from the men they com- ment. The vehicle overturned, but fortunately the driver es-

> than individuals — and the Navy fered a sprained shoulder when is big business. Therefore, we his vehicle was struck by anmust make an effort that the other car in the Warehouse

in the machine," Capt. Hough the intersection of Blandy and Knox, two cars collided late in the afternoon as the sun "blind-

from the Pilot Plant area, are Capt. Hough's philosophy is urged to make special note of tions for advancement in rate in narrowly escaped injury several times because drivers didn't see

"I believe that you in the Remember, keep those wind

# Deadline Is Near

Washington (AFPS) - Qualified veterans of the Korean Conflict have one year left to take advantage of the educational program under the Korean GI

#### The deadline for the program is Jan. 31, 1965.

Eligible war orphans have no deadline except their own age. They may begin school at any time as long as they are between 18 and 3 years of age. In certain circumstances it is possible to begin before 18 and continue



COL. A. R. CHEEK, USA, commanding officer of the Armor and Desert Training Center, Fort Irwin, Calif., is welcomed aboard by NAF Executive Officer Cdr. D. W. Knight prior to tour of Station last week. Col. Cheek was briefed on several NOTS projects including SHRIKE, FREE FALL, WALLEYE.

#### New Plane and Bus Schedule

CHINA LAKE - INYOKERN - INTERNATIONAL AIRPORT - PASADENA

Plane Schedule-Pacific Air Lines (TR's or Tickets Required) Morning Flight (Daily) Evening Flight (Daily) Flight No. Flight No. 481 Lv. Inyokern ..... 6:10 a.m. 482 Lv. LAX Int'l .... 9:10 p.m. 481 Arr. LAX Int'l .. 7:04 a.m. 482 Arr. Inyokern ....10:19 p.m.

Airport Shuttle Bus Schedule - China Lake Area

A shuttle bus will provide passenger transportation to and from Harvey Field, Inyokern, and China Lake daily except Saturday, Sunday, and holidays. Leaving China Lake, shuttle bus stops will be made as follows:

China Lake to Harvey Field Harvey Field to China Lake P.M. A.M. BOQ- Sta. Adm. Mich. Mich. Adm. Sta. COM A Rest. Bldg. Lab. Lab. Bldg. Rest. (Club) Lv.....5:00 5:02 5:05 5:06 Arr....10:58 11:00 11:02 11:04 ...... 5:35 Leave Harvey Field .......... 10:25

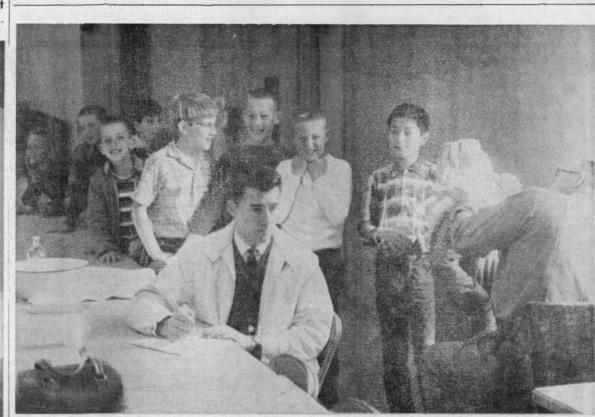
Week-end travelers departing from Harvey Field should make prior arrangements for transportation through the Travel Branch, Code 8517, Ext. 71378, China Lake.

The airport shuttle bus from LAX to Pasadena and return has been discontinued. Travelers use limousine or taxi for transportation

For further information, call Travel Branch, Ext. 71378, China Lake, or Ext. 633, Pasadena.



20-YEAR PIN was awarded Mary Sidewand, lab technician, recently by Cdr. R. B. Speaker (MC), Senior Medical Officer. Witnessing presentation was P. R. Cuykendall, industrial hygienist and Mrs. Sidewand's supervisor.



Arr. Harvey Field .

OUNCE OF PREVENTION could be the pound of cure for China Lake elementary pupils at Richmond school who this week got dental checks by Dr. Earl E. Karner (right). School's PTA member, Mrs. J. E. Kleine, conducted "at cost" toothbrush sale, while school

nurse, Mrs. Cornelius Richey, aided with dental checks. Fourth grade teacher Dale Hughes foreground) helped with records. Dental checks at other schools were conducted on subsequent days.

# JOURNEYMAN AND TECHNICIAN **DEVELOPMENT CLASSES**

NATURE OF THE PROGRAM. These courses are designed to make a variety of development opportunities available to artisans and technicians in a range of skill areas. The NOTS courses listed contain a suggestion for suitable participants. These suggestio is do not arbitrarily limit the kind of participant accepted. Each supervisor should determine, with his employees, the courses most needed for each individual's development. Burroughs Evening High School and Bakersfield Jr. College Evening Division offer many courses that should prove helpful to Journeymen and Technicians.

**REGISTRATION.** Registration for this semester starts immediately and continues through 10 Feb 1964. To enroll, sen done completed NOTS Course Enrollment and/or Tuition Refund Certification 11ND NOTS 12410/28 (1-63) to Code 654. Enrollees will be notified of their enrollment status prior to the beginning of classes.

#### DESCRIPTION OF COURSES AND SCHEDULES Basic Industrial Metallurgy and Heat Treating, Alu-

minums (20 hours) Thursdays, 1400-1600, 6 Feb - 9 April

Coordinator: R. Fredric Ladda, Apprentice Machinist Instructor

Suggested for: Journeyman and Technicians in the Machinist, Sheetmetal, and Welding areas Location: Training Building

Provides the participants with knowledge of the basic structure and chermical/physical properties of aluminums currently in use on the Station and of the effect of stresses and strains on machined and welded components.

Industrial Metallurgy and Heat Treating, Steels (20) hours, or more if required) 1400-1600, 10 March - 26 May

Coordinator: R. Fredric Ladda, Apprentice Machinist Instructor

Suggested for: Journeyman machinists, sheetmetal workers, and welders

Location: Training Building Provides the participants with knowledge of the basic structure and chemical/physical properties of steels currently in use on the Station and of the effect of stresses and strains on machines and welded components.

Electronic Schematics (20 hours) Thursdays, 1400-1600, 20 Feb - 23 April

Instructor

Suggested for: Electronic mechanics and helpers and draftsmen connected with electronic

Location: Training Building

Covers the reading and drawing of electronic schematics and block diagrams. Discusses the symbols and wiring diagrams used for tubes. resistors, capacitors and other electronic equipment. Makes application of block diagrams to electronic drawing.

Electrical Control Circuitry (24 hours) Wednesday, 1400-1600, 4 March - 13 May

Coordinator: J. D. Whitfield, Apprentice Electrical Instructor

Suggested for: Journeyman and helpers, electricians and electrician linemen Location: Training Building

Explains and discusses the application of magnetics and relays for interlocking automatically controlled machines and processes. Designing, by the student, of control wiring and devices involved in electrical circuitry.

Color Blending (10 hours) - Schedule to be announced. Coordinator: J. D. Whitfield, Apprentice Electrical Instructor

Suggested for: Journeyman and helper painters Location: Training Building

Covers colors and color blending for paint matching and repair work. Discusses the basic colors and the color spectrum in relation to paint shading and blending.

Coordinator: J. D. Whitfield, Apprentice Electrical Slide Rule (8-20 hours approx.) Individually arranged, Programmed Text (take home study course) Coordinator: Employee Development Division, Code 6543

> The emphasis of this course is on understanding the slide rule rather than merely performing operations with certain scales. Develops principles behind the most commonly used scales. Elementary knowledge of simple arithmetic, algebra, and plane geometry is necessary.

Introduction to Electronics (10-20 hours approx.) Individually arranged, Programmed Text (take home study course)

Coordinator: Employee Development Division Code 6543

Provides the student with a useful understanding of basic fundamentals of electronics. This course is recommended as a prelude to advanced study.

# COURSE SCHEDULE Spring 1964

- UNIVERSITY OF CALIFORNIA AT LOS ANGELES
- SCIENCE AND ENGINEERING DAY CLASSES

Friday, January 17, 1964

- SUPERVISOR AND EXECUTIVE DEVELOPMENT CLASSES
- JOURNEYMAN AND TECHNICIAN DEVELOPMENT CLASSES
- CLERICAL DEVELOPMENT CLASSES
- BAKERSFIELD COLLEGE, EVENING DIVISION
- BURROUGHS EVENING HIGH SCHOOL

#### PREFACE

This Course Schedule provides detailed information about the classes open to NOTS employees at China Lake for this Spring 1964 to supervisors and employees to discuss development plans and semester. Additional copies of this Course Schedule and Career Planning Manual may be obtained from Department Offices or your De- nel Management Advisors in identifying training needs so that appartment's Personnel Management Advisor.

The growth and development of employees is an important part of the success of NOTS. We recommend that you use this Course Schedule, together with the Career Planning Manual revised in August 1963, in planning individual employee development pro-

Departmental Personnel Management Advisors are available courses. Departments are also encouraged to work with their Personpropriate courses may be developed to meet those needs.

> RAYMOND A. HARRISON Head, Personnel Department

# CLERICAL DEVELOPMENT CLASSES

NATURE OF THE PROGRAM. Courses are provided in areas where needs exist for detailed procedures such as reports control, correspondence, etc., and in areas where a basic understanding of the use of data or systems is helpful such as an introduction to computer programming and statistics. In addition to this program, the Bakersfield Junior College and the Burroughs Evening High School offer a variety of courses which may be of interest such as typing and accounting.

**REGISTRATION.** Registration for this Spring semester starts immediately and continues through 7 February 1964. Send ONE completed NOTS Course Enrollment and/or Tuition Refund Certification Form 11ND NOTS 12410/28 (1-63) to Code 654. Enrollees are considered accepted and should report to the designated place at the scheduled time unless other-

DESCRIPTION OF COURSES AND SCHEDULES Clerical workshops in travel, timekeeping, supply and

correspondence procedures will be given this semester on an as-needed basis. If you are interested, submit an enrollment form for each class you desire. When enrollment is sufficient to form a class, you will be notified.

Clerical Workshop on the Technical Library (2 hours) 0800-1000 Thursday

Four sessions scheduled: #1 - 28 February Each session is limited #2 — 6 March to 10 enrollees. #3 - 13 March

#4 - 20 March

Code 751 Location: Technical Library, Michelson Lab

This seminar is designed to familiarize clerical personnel with the operation, resources and procedures of the Technical Library. Such things as how to use library lists, how to use the card catalogue, how to order books and periodicals, how to use the library reference materials, how charge records are maintained, how classified material is handled, etc. will be discussed. Discussion will be held after the tour of the Library.

Coordinator: C. J. Kruse, Head, Library Division,

Communications-Naval Messages (2 hrs.) 0800-1000, Wednesday, 26 February

Coordinator: LTJG H. L. Brundridge, Communication Officer, Code 854 Location: Training Building

Covers operating procedures and general information about Navy messages-when to use, how to prepare, forms to use, definitions, security, precedence, etc.

Forms Management (2 hours) 0930-1130, Wednesday, 11 March

Coordinator: Hazel Coleman, Forms Management Representative, Code 174 Location: Training Building.

Suggested for: Form originators at all levels and line supervisors who use forms

Highlights techniques for making forms do the form drafts prepared by originators, printing and processing savings, and preparing for faster finishing work by technicians.

Reports Management (2 hours) 0930-1130, Wednesday, 4 March

Coordinator: Jeanette Hoagland, Management Technician, Code 174 Location: Training Building

Suggested for: All levels responsible for reports Reduction of effort in making reports; application of the pyramid summary and exception reporting; elimination of unnecessary and negative reporting; how to achieve more useful, complete, and simple reporting; levels reporting workload.

Punctuation (4-6 hours) Programmed Instruction: AutoTutor, individually arranged

Coordinator: Employee Development Division, Code 6543

Location: Training Building

A quick review and refresher course in basic punctuation.

Improving Your Writing (6-12 hours) Programmed Instruction: Auto Tutor, individually ar-

Coordinator: Employee Development Division,

This course improves grammar such as subjectverb agreement, reference of pronouns, etc. and is recommended to follow the punctuation course. Other courses, such as Personnel Forms, can be made best job possible; achieving better quality of available through your Department's Personnel Management Advisor on the basis of need.

# U.C.L.A. SCHEDULE OF CLASSES

REGISTRATION. Registration will be held 0800-1200, able in the Education Office. The last day for be offered toward the satisfaction of the unit requirepayable by check or money order at the time of each course.

GRADUATE STUDENTS IN ENGINEERING. The Department of Engineering, UCLA, requires all graduate students to complete 6 units of course work every semester until they have fulfilled the unit requirements for the M.S. Any student who completes less than 6 units is obliged to withdraw from the University, and must reapply for readmission if he wishes to continue at a later date. Leaves of absence and in-absentia status are difficult to obtain.

COUNSELING. UCLA advisors will be available soon after the beginning of the semester in the Education Office. Students are requested to contact the UCLA registrar in the Education Office for appointments.

FUND ELIGIBILITY. If an employee's supervisor DENT WILL BE ADMITTED TO THE LAB CLASScertifies that the training is relevant to his present or projected work assignment, the employee may do OF INTENT TO REGISTER IS RECEIVED IN THE one of the following: (1) If carrying 6 or more units, request permission via his departmental channels to use official time to study not to exceed 6 hours per week for 15 weeks; (2) If carrying 6 or more units and authorized to use 3 or less hours of official time to study for one 3-unit course, submit one copy of NOTS Course Enrollment and/or Tuition Refund Certification 11ND NOTS 12410/28 prior to the first class meeting to establish tuition refund eligibility for a second 3-unit course; or (3) Submit one copy of same form to establish tuition refund eligibility for each course prior to the first class

REFUNDS. Refunds will be made under the following conditions if tuition refund eligibility has been established: (1) Successful completion (a grade of "C" or higher) of a course; (2) Withdrawals prior to the second meeting of class and presenting admission form to the Education Office; or (3) Withdrawals after second meeting and before fourth meetingtuition refund minus \$5 will be made by the Uni-

graduate students to drop courses without penalty prerequisites. of failure is 20 April 1964. Petition forms are avail- (\*) Starred courses may, by subsequent petition,

Mon-Fri, 3-14 February in the Education Office, Room extension students to audit a course (no credit) is ments for the master's degree up to a maximum of 1004, Michelson Laboratory. Registration fees are the first meeting after the midterm. The instructor 9 units. will request each student to indicate his desired registration. The amount of the fee is listed after status on the mid-term grade report. Graduate students who have dropped a course and extension students who are auditing a course may continue to attend class without the obligation of submitting homework or taking examinations.

> TEXTBOOKS. Each student is responsible for purchasing his textbooks. Order blanks are available in the Education Office. It is recommended that books be ordered early to insure receipt prior to the beginning of classes.

ACCESS TO MICHELSON LABORATORY. Students who do not have access to the Lab should register on or before 6 February so that they may be cleared for admittance to classrooms before the semester begins. Students unable to complete registration by 6 February should notify the Education Office giving USE OF OFFICIAL TIME AND/OR TUITION RE- of the courses to be taken. NO UNCLEARED STU-ROOMS UNLESS HIS REGISTRATION OR NOTICE EDUCATION OFFICE BY 6 FEBRUARY 1964.

> PREREQUISITES. The titles of courses listed as prerequisites for the various courses in the Extension and Graduate Program are as follows:

Engineering 103A, Elementary Fluid Mechanics Engineering 108B, Strength of Materials Engineering 115B, Active Electronic Circuits Engineering 136A, Introduction to Control Systems

Mathematics 110AB, Advanced Engineering Math-Mathematics 110C, Advanced Engineering Math-

Mathematics 119A, Differential Equations Mathematics 224A, Complex Analysis

Physics 105, Analytical Mechanics Physics 107, Electrical Theory and Measurements

### EXTENSION PROGRAM

EXTENSION PROGRAM. Courses listed on the follow-WITHDRAWALS AND AUDITING. The last day for ing pages are open to all students who satisfy the

\*Engineering XL 115C Active Electronic Circuits II (3) \$45.00 Instructor: R. G. S. Sewell, M.A., Physicist, Weapons

Mon-Wed, 4:30-6 p.m., M.L. Rm. 1001 (30 meetings,

10 Feb-20 May) Prerequisite: Engineering 115B

Texts: Seely, Electron-Tube Circuits, 2nd Edition, (McGraw-Hill)

Pettit, Electronic Amplifier Circuits Theory & Design, 1961, (McGraw-Hill) Large-signal and nonlinear situations. Graphical

and analytical methods for analysis and design. Introduction to switching-mode operation, Design considerations.

\*Engineering XL 121A, Engineering Aerodynamics (3) \$45.00

Instructor: R. W. Van Aken, M.S., Hd. Aerothermodynamics Branch, Weapons Development De-

Tues-Thurs, 6:30-8 p.m., M.L. Rm, 20108, (30 meetings, 11 Feb-21 May) Prerequisites: Engineering 103A and Mathematics

110AB or 110C Text: Kuethe & Schetzer, Foundations of Aero-

dynamics (Wiley). A course in the fundamentals of aerodynamics dealing with the basic aspects of compressible and incompressible fluid dynamics; theory of potential flow, airfoils, and finite wings; lifting surfaces in supersonic flow.

\*Engineering XL 136C, Sampled Data Control Systems Theory (3) \$45.00

Instructor: M. C. Creusere, M.S., Head, Armament Control Systems Branch, Aviation Ordnance Department

Mon-Wed, 4:30-6 p.m., M.L. Rm. 1011 (30 meetings, 10 Feb-20 May)

Prerequisite: Engineering 136A

Text: Tou, Digital & Sampled Data Control Systems, (McGraw-Hill)

Analysis and synthesis of control systems with sampled functions of time as system variables; techniques for synthesis of sampled data control systems to meet required specifications; behavior of sampled data system between sampling instants, multirate sampled data systems.

# BAKERSFIELD COLLEGE CLASSES The Bakersfield College Evening Division, China for NOTS employees interested in evening class op-

Lake, offers a variety of courses in the physical portunities. sciences, mathematics, business administration and

You may register for the Bakersfield courses clerical fields. Many of these courses are appropriate on 21, 23, and 24 January 1964 (8:00 a.m.-5:00 p.m.)

in the east wing of the Burroughs High School Library. Copies of the BCED Spring Schedule are available at the College, Technical Library, Station Library, Training Building, and the Education Office. The Spring semester begins 27 January 1964.

# **BURROUGHS EVENING CLASSES**

riety of courses, including some that are directly relat-

You may register for these courses during the the High School and other public places such as ed to the development of on-the-job skills of NOTS week of 20-24 January 1964 (noon-7:00 p.m.) in the the Station Library. The Spring semester begins employees such as sheetmetal layout, electronics, type- Music Wing of the Burroughs High School. Copies 27 January 1964.

The Burroughs Evening High School offers a va- writing, mechanical drawing and blueprint reading. of the Burroughs Spring Schedule are available at

#### \*Engineering XL 163A, Elasticity and Plasticity

(3) \$45.00 Instructor: W. J. Werback, M.S.E., Head, Structural Mechanics Br., Weapons Development De-

Mon-Wed, 4:30-6 p.m., M.L. Rm, 20108 (30 meetings, 10 Feb-20 May)

Prerequisities: Engr. 108B, Math 110AB or 110C Text: Wang, Applied Elasticity, (McGraw-Hill)

Three dimensional stress and strain. Criteria for prediction of mechanical failure. Differential equations in three dimensions; analytical, numerical, and experimental solutions of plane state and torsion problems. (Stress function, iteration, strain gages, photoelasticity.) Homogeneous plastic flow, fast fracture, elastic tensile instability.

#### \*Mathematics XL 111B, Introduction to Higher Algebra (3) \$45.00

Instructor: E. A. Fay, Ph.D., Mathematician, Research Department

Tues-Thurs, 4:30-6 p.m., M.L. Rm. 1011 (30 meetings, 11 Feb-21 May)

Prerequisite: Mathematics 111A

Text: Birkhoff & MacLane, A Survey of Modern Algebra, (Macmillan)

Rings and ideals, linear algebras, field extensions, algebraic numbers.

#### \*Mathematics XL 135, Numerical Mathematical Analvsis (3) \$45.00

Instructor: A. A. Fojt, M.A., Physicist, Weapons Develp. Dept. Tues-Thurs, 6:30-8 p.m., M.L. Rm, 1015 (30 meet-

ings, 11 Feb-21 May) Prerequisite: Mathematics 119A or consent of the

instructor Text: Henrici, Elementary Numerical Analysis, 1962, (Wiley)

Computation with numbers of fixed precisionaccuracy, round off, checking. Choice and use of tables. Applications involving approximations with polynomials-finite differences, interpolation, extrapolation, numerical differentiation and integration. Computation with continued fractions. Numerical approximation to solutions of equations.

#### \*Physics XL 110, Electricity and Magnetism (3) \$45.00 Instructor: G. J. Plain, Ph.D., Assoc. Dept. Head, Research Dept.

Tues-Thur, 4:30-6 p.m., M.L. Rm. 20108 (30 meetings, 11 Feb-21 May) Prerequisites: Physics 105 and 107, or consent of

the instructor Text: Reitz & Milford, Foundations of Electro-Magnetic Theory, (Addison-Wesley)

A survey of field theory, to include systems of charge and of linear circuits, simple dielectric and magnetic media, and the formulation of Maxwell's equations.

#### \*Physics XL 115, Elementary Quantum Mechanics (3) \$45.00

Instructor: R. H. Knipe, Ph.D., Physicist, Research Department

Mon-Wed, 4:30-6 p.m., M.L. Rm. 1000, (30 meetings, 10 Feb-20 May) Prerequisites: Physics 105, Math 110AB or

equivalent Text: Merzbacher, Quantum Mechanics, 1961, (Wiley)

The classical background, basic ideas and methods of quantum mechanics.

#### **GRADUATE PROGRAM**

The 100 series courses listed below are open to all students who have graduate status at UCLA. Courses in the 200 series are generally open only to graduate students who have rectified all gradepoint deficiencies.

Engineering 115C Active Electronic Circuits II Same as Engineering XL 115C. See above.

Engineering 121A, Engineering Aerodynamics Same as Engineering XL 121A. See above.

Engineering 136C, Sampled Data Control Systems

Same as Engineering XL 136C. See above. Engineering 163A, Elasticity and Plasticity Same as Engineering XL 163A. See above.

Engineering 281A, Analytical Methods of Engineering (3) \$45.00

Instructor: R. B. Leipnik, Ph.D., Mathematician, Research Dept.

Tues-Thurs, 4:30-6 p.m., M.L. Rm. 1001 (30 meetings, 11 Feb-21 May) Prerequisite: Engineering 182A or consent of the

instructor Texts: Friedman, Principles & Techniques of Applied Mathematics, (Wiley)

Webster, Partial Differential Equations, Magnus & Oberhettinger, Special Functions

of Mathematical Physics, 1949, (Chelsea) Application of mathematical methods to engineering problems; basic problems in the fields of fluid dynamics, heat conduction, and electromagnetic theory will be discussed.

Engineering 299-S Research in Engineering (1) \$20.00 Instructor, time, and place to be arranged.

Investigation of advanced technical problems.

Engineering 299-T, Research in Engineering (4) \$65.00 Instructor, time, and place to be arranged. Thesis work for the Master's degree. For students who have completed course work.

Mathematics 111B, Introduction to Higher Algebra Same as Mathematics XL 111B. See above.

Mathematics 224B, Complex Analysis (3) \$45.00 Instructor: R. E. Smithson, Ph.D., Mathematician,

Research Dept. Mon-Wed, 4:30-6 p.m., M.L. Rm. 1015 (30 meetings, 10 Feb-20 May)

Prerequisite: Mathematics 224A

Text: Hille, Analytic Function Theory, Vol. II, (Ginn & Co.)

Taylor and Laurent series, Mittag-Leffler and Weierstrass theorems, normal families, Poieson's formula, Harnack's principle, Jensen's formula, subharmonic functions, canonical mappings, analytic continuation, the monodromy theorem, and algebraic functions.

#### Mathematics 260, A Continuation of Quantitative Theory of Communications (3) \$45.00

Instructors: C. B. Tompkins, Ph.D., Professor of Mathematics and Director of the Computing Facility, UCLA; and Mathematician, Communications Research Division Institute for Defense Analyses, Princeton, N. J. R. B. Leipnik, Ph.D., Mathematician, Research Dept.

Fri. (Tompkins) 7:30-9 p.m. and Wed. (Leipnik) 4:30-6 p.m. (30 meetings, 12 Feb-22 May) Fri., M.L. Rm. 1011 - Wed., To be announced Prerequisite: Completion of the first semester or

consent of instructor Text: To be announced.

A continuation of quantitative theory of communications. Topics will be chosen from the following list: Stability theory of ordinary differential equations. Stable differential operators as representations of passive networks. Design of filters through Chebyshev approximation (Culler's theory). Neuron models and superficial aspects of neuron communications. Stochastic survival and I. J. Good's model of regeneration of signals. Communications between men and computers. Expansion of material on modulation. Statistical methods of distinguishing sampled populations.

NOTE: A 3 unit course, Revolutionary Guerrilla Warfare, is planned. The Education Office will issue a notice with pertinent information as soon as approval from UCLA is received.

# SCIENCE & ENGINEERING DAY CLASSES

NATURE OF PROGRAM. These courses complement the Station's academic program of evening classes. The courses apply basic scientific and engineering knowledge and techniques to the special problems of weapons research, development, test, use, and production. The official time devoted to attendance classes regularly. CONFIDENTIAL CLEARANCE IS and homework preparation will not exceed 4 hours REQUIRED. per week for any student. A grade of "O" (outstanding), "S" (satisfactory), or "U" (unsatisfactory) is assigned to participants completing these courses.

**REGISTRATION.** Registration begins immediately and closes on 10 February 1964. To enroll, submit one completed NOTS Course Enrollment and/or Tuition Refund Certification 11ND NOTS 12410/28 (1-63) to the Education Office, Code 6541, Room 1004, Michelson Laboratory.

It is possible that some of these classes will not receive sufficient enrollment to warrant holding the class, so you are requested to indicate a second choice on your enrollment form. Enrollees will be notified by the Education Office of their enrollment status in advance of the beginning of the classes.

WITHDRAWALS. An employee who wishes to withdraw from a course must submit an In-Service With- S & E 10A: Technical Report Writing, 8 meetings drawal Request, 11ND NOTS 2930 to the instructor via his supervisor.

AUTHORIZATION CRITERIA. No employee is authorized to participate in more than 16 weeks of

courses (one 16 weeks course or two 8 weeks courses) with an S & E designation in any one semester. Supervisors should consider the relation of course content to the actual or prospective work assignments of the employee. Enrollees are expected to attend

#### SCHEDULE

S & E 3: Jet Propulsion, 16 meetings (32 hours) Mondays: 0800-1000, M. L. Conference Room A, Begins 17 Feb 1964

Instructor: Clinton L. Spindler, Engineer, Propulsion Applied Research Group, Propulsion Development Department

Study of flow through rocket nozzles. Combustion chamber and grain proportions for solid propellant rocket motors. Combustion chamber propellant supply, and injection system for liquid rocket motors. Instability in liquid rocket motors. Heat transfer and cooling problems in rockets. Operating principles of ramjets and gas turbines. Design problems on solid, liquid, and air breath-

#### (16 hours)

Wednesday: 0800-1000, M. L. Conference Room A, Begins 22 Apr 1964

Instructor: W. S. Spafford, Supervisory Editor, Technical Information Department

Designed primarily for scientists and engineers who need help in organizing and presenting in written form, including illustrations, the results of their work. Not an English composition course. Some basic elements of good reporting are included with the accent on application of these elements to technical prose. Practice in abstracting and other brief forms of writing.

S & E 11: Aeromechanics, 16 meetings (32 hours) Tuesdays: 0800-1000, M. L. Conference Room A, Begins 18 Feb 1964

Instructor: Leonard T. Jagiello, Engineer, Propulsion Development Department The dynamics of missile flight, including aeroelasticity, structures, heat transfer, flutter.

#### S & E 13: Chemistry of Ordnance Materials, 8 meetings (16 hours)

Thursdays: 0800-1000, M. L. Conference Room B, Begins 23 Apr 1964

Instructor: C. J. Thelen, Physical Sciences Administrator, Propellants Division, ropulsion Development Department

Preparation, chemical nature, an reactions of materials used in the propulsio: 1 terminal effects of weapons; black pow r. explosives, pyrotechnics; solid and liquid rock propellants, and smoke-reducing agents. Chemical nature of plastics, rubbers, and other non-motallic materials important in ordnance research an velopment.

S & E 15: Production and Value Engineering, 16 S & E 27: Electronic Warfare, 8 meetings (16 hours) meetings (32 hours)

Thursdays: 0800-1000, M. L. Conference Room A, Begins 20 Feb 1964

Friday, January 17, 1964

Instructor: John Holden, Supervisory Engineer, **Engineering Department** 

Fundamentals of production engineering. Evolution of the production model; setting ground rules; materials; material forms; tolerances; manufacturing methods; value engineering; shop costs; quality control; end-product drawings; documentation; and other activities.

#### S & E 20: Tech nical Presentations, 16 meetings, (32 hours)

'Thursdays: 0800-1000, Strand Steel 1, Begins 20 Feb 1964

Instructors: A. B. Christman, E. E. Kirkbride, Presentations Division; D. T. McAllister, Consultant; Technical Information Department

Lectures, group discussions, and workshops cover the basic techniques of planning and developing different types of presentations. Primarily of a technical nature. Two different workshops provide an opportunity to improve speech delivery or to develop a presentation related to the person's work. Recommended for project or administrative personnel who would like to do a better job of presenting their ideas and

Wednesdays: 0800-1000, M. L. Conference Room A, Begins 19 Feb 1964

Coordinator: W. K. Webster, Physicist, Special Projects Group, Weapons Development Depart-

SECRET Clearance Required; GS-11 or above or consent of Coordinator

Familiarize project leaders on the state-of-the-art in radar: disseminate information on advances in Electronic Warfare in the last 5 to 10 years; Help in understanding the level of effort, field of work, and capability of NOTS personnel in Electronic Warfare. The course will encompass the following: General radar concepts, additions or advanced considerations of the radar range equation including application to CW and pulse compression. Advancements in transmitters and peak powers, antennas, receiving and transmitting, receivers, principles of jamming and deception, counter-counter measure courses, and future developments.

NOTE: PLEASE REMEMBER TO INDICATE A SECOND CHOICE ON YOUR ENROLLMENT FORM 11ND NOTS 12410/28 for all S & E DAY CLASSES.

PROGRAMMED INSTRUCTION COURSES. In addition to the above Science & Engineering Courses the following Programmed Instruction Courses may be of interest to scientists and engineers. These programmed instruction courses are individually scheduled and interested personnel should submit their enrollment form 11ND NOTS 12410/28 (1-63) to Code 6543 in the Training Building.

Computer Programming, (30-50 hours)

What computers can do, how to talk to them, how to get data out of them, etc. Neither electrical circuitry or internal functioning of computers is covered. Part I-Introduction to Programming; Part II-Programming Techniques; Part III-Advanced Techniques; Part IV-Business and Science Applications, FORTRAN language.

COMPUTER Mathematics, (8-20 hours)

Provides an understanding of the octal and binary number systems used in electronic computers to perform math computations.

Advanced Slide Rule: The Log Log Scales, (12-13 hours)

Designed for engineers, technicians and teachers. Program designed specifically for the Log Log Duplex Trig and the Log Log Duplex Decitrig slide rules. How to compute any power of any positive base. How to evaluate an unknown exponent or unknown in the exponent given the values of a positive base and a positive power etc.

# SUPERVISOR AND EXECUTIVE **DEVELOPMENT CLASSES**

NATURE OF THE PROGRAM. The courses are designed to provide development opportunities for NOTS supervisors, executives, and potential supevisors so that they may perform their current jobs with greater expertise and to prepare for new and more challenging assignments.

REGISTRATION. Registration starts immediately and ends 10 February 1964. To enroll, submit ONE completed NOTS Course Enrollment and/or Tuition Refund Certification 11ND NOTS 12410/28 (1-63) to Code 654. The suggested levels of participation for some courses are noted but the final decision about nominations of any person to any course is the responsibility of the person's department. Nominees approved will be notified where courses are to be held prior to the beginning of class.

#### DESCRIPTION OF COURSES AND SCHEDULES: Leadership Lab for R & D Supervisors in the Federal Government-3rd Annual, (32 hours) 17-20 June 1964

Coordinator: Employee Development Division, Code 654

Limited to: GS-12 and above concerned with R & D Location; Rieber Hall, UCLA Campus

Seminar is co-sponsored by UCLA and the Interlaboratory Committee on Personnel Administration, Navy Laboratories in California. Intense lecture-theory and small group experiences to give the R&D manager a better picture of himself as a creative individual and to develop awareness of his impact on other creative persons who work with him.

Problem Solving Workshop (32 hours) 20-23 April 1964 Coordinator: Employee Development Division, Code 654

Suggested for: Supervisors or executives within the same organization or in the same prob-

Location: Off Station, probably Kernville

This workshop takes place in a retreat type atmosphere using the services of Dr. George Lehner. Provides an opportunity for concentrated work on devising means of increasing the effectiveness of the work group. The workshop will resemble a sensitivity training laboratory in that the consultant will help establish a climate in which communications problems can be discussed freely and openly. Departments or working groups interested should contact their Personnel Management Advisor. Optimum number of participants is 12-15.

Procurement Management for Technical Personnel (40 hours) 0800-1600 Mon-Fri. MT No. 433, 6-10 April, MT No. 434,

13-17 April Coordinator: Employee Development Division, Code 654 Suggested for: Research and Engineering person-

nel involved in negotiation and contracting process. Provides a broad understanding of the Navy pro-

curement process. Emphasizes those parts of the process which directly involve engineering and technical personnel. Research and development case studies will be discussed and analyzed by the Harbridge House Corp.

Classification and Wage Administration (12 hours) 1300-1500, Thursday 9 April - 14 May Coordinator: William Blinkhorn, Head, Classifica-

tion Division, Code 65 Suggested for: Supervisory or potential supervisory personnel

Information, policy and procedures in position classification and wage administration. Responsibility of the Station, Bureau, and Civil Service Commission in the overall process. Responsibbility of the supervisor. Discusses the Classification Act of 1949 as amended governing graded positions and Public Law 1028 of 1956 governing the fixing of Navy wages for ungraded positions. Includes wage surveys, area wage survey committees, etc.

Personnel Employment Actions (12 hours) 0930-1130 Thurs. 13 Feb-19 Mar

Coordinator: Joseph Doucette, Head, Employment Division, Code 65

Suggested for: Supervisory and potential supervisory personnel

Station procedures in recruitment, examinations, reassignments, transfers, interviewing techniques and regulations requiring action by the supervisor. Equal Opportunities Program in-

Management for First-Line Supervisors (12 hours) Weds. 1300-1500, 13 May-17 June

Coordinator: Hal Harney, Head, Maintenance Control Division, Code 70 Suggested for: Supervisory personnel

Aspects of first-line supervision such as manpower scheduling, equipment utilization, budgeting for material, the daily rate of expenditure, labor reporting, statutory limitations and budgeting, funds, and preparation of job orders.

Work Simplification (32 hours) 0800-1000, Tuesdays 17 March-30 June

Coordinator: Bard Monson, Head, Management Analysis Division, Code 17 Suggested for: All levels

Work simplification, with emphasis on engineering and scientific applications. Includes charting, graphing, layout, and the application of integrated data processing methods to local operations.

Computer Programming (30-50 hours) Programmed Instruction, individually scheduled

Coordinator: Employee Development Division, Code 6543, Ext. 72648 What computers can do, how to talk to them,

> how to get data out, etc. Students may take any or all parts of the pro-

Part I-Introduction to Programming, Computer Arithmetic Part II—Programming Techniques

Part III—Advanced Techniques

Part IV—Business and Science Application FORTRAN Language

Introduction to Computer Mathematics (8-20 hours) Programmed Instruction, individually scheduled

Coordinator: Employee Development Division, Code 6543, Ext. 72648 Provides understanding of the octal and binary

number systems used in electronic computers to

Executive Practices (4 hours) Programmed Instruc-

perform computations.

tion, individually scheduled Coordinator: Employee Development Division, Code 6543, Ext. 72648

Good executive practices. Provides a good comparison between what you do and what is described as the "right way."

Other courses, such as Fundamentals of Supervision, The Supervisor and Employee Groups, and the Supervisor and the Equal Employment Opportunities Program, can be made available through your Department's Personnel Management Advisor on the basis of need.