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L-R: Bryce DeWitt, Spencer Weart, Steve Weinberg, Winnie Schild, William Muehlberger, and Cecile DeWitt.



L-R: Bruce J. Hunt, Austin Gleeson, Roy F. Schwitters, and Alison Beck.

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*Very special thanks to Fred Bucy for making the Texas trip happen. Those who attended his luncheon were Narayan Bhat, Malcolm Brachman, Robert Doering, Edward Esposito, Karen Johnson, Jack Kilby, and William Skinner.*

## Friends in Texas

Spencer Weart was recently invited to give luncheon presentations in Houston, Dallas, and Austin, telling Friends of the Center and others about our activities. The first stop was in Houston, where Neal Lane, now Senior Fellow at the James A. Baker III Institute for Public Policy at Rice University, introduced Spencer by remarking on the need to keep the public informed about science issues and to encourage physics education. Fred Bucy, the retired President of Texas Instruments, hosted the lunch in Dallas, where he commented on the need to set straight the record of physics in our time. Our last lunch was in Austin, where a group of physicists, historians, and archivists from the University of Texas discussed the problems of preserving historical materials.



L-R: Manik Talwani, Barry F. Dunning, and Spencer Weart.

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*Lloyd S. Swenson*



L-R: Neal Lane and Thomas R. William.



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# FRIENDS OF THE CENTER FOR HISTORY OF PHYSICS

## Leading the Way

Since its inception in 1965 the Center for History of Physics has been a leader in preserving the history of the scientific work of our times. The Center is the first and most widely recognized institution dedicated to saving the history of a scientific discipline. Its mission is broad, embracing an alliance of fields ranging from geophysics to astronomy and extending, like the science itself, internationally.

The Center has shown its leadership by providing advice and assistance to other archives worldwide. An example is the Grants-to-Archives program which provides support to institutions archiving the papers of scientists from their own institutions and localities. In the 1990s the Center, recognizing that funds for processing collections were static or dwindling even while the number of scientists reaching retirement age or dying was rapidly increasing, set up its small matching grants program to encourage organizations to process their papers. The immediate goal is to assure that important correspondence, notebooks and other records languishing in storage in disorder are physically preserved and made fully accessible to scholars. Meanwhile the program attracts additional matching funds to this neglected sector and encourages archives to take in more papers.

The Center is also well-known for its recommendations and guidelines on ways to preserve the histories of the federal science labs and great multi-institutional collaborations. These guidelines are backed up by extensive research and consultation on preserving these highly significant records, which have largely been neglected by traditional archival programs.

Not surprisingly, the Center attracts other leaders who give support and guidance to ensure its long-term viability. We thank the many Friends of the Center who have provided financial support in 2000. Their names are listed in this edition of the *Newsletter*, and are posted on our Web site. If you want to become a Friend of the Center, you can use the Web site or the form below to contact us.

We also applaud the many who have contributed to our active Friends-in-Deed program by donating books, photographs, and other source materials, or by volunteering time and effort in conducting oral interviews or archiving and preserving records. A list of these Friends-in-Deed and an acknowledgment of the tremendous help provided by Steven Brush and Per and Eleanor Dahl are featured in this issue of the *Newsletter*. The form below can also be used to offer help.

Our Legacy Circle is comprised of people who have made a commitment to the preservation of the history of physics and allied sciences by a planned gift. Planned giving, which can begin at any time in your life, is a way to support the Center while realizing other financial goals such as your own financial security, assurance of retirement income for a family member, an increased retirement income of your own, a reduction in capital gains taxes, and a lower taxable basis of your estate. Contact the Center using the form below if you wish to find out more.

Please let us know how and when we can contact you to become a Friend of the Center, volunteer to become a Friend-in-Deed, or explore options provided through planned giving.

### *Leaving a lasting legacy.*

#### **PLEASE CONTACT ME REGARDING THE FOLLOWING:**

- \_\_\_\_\_ I wish to make a pledge of support in 2001 to the Center.
- \_\_\_\_\_ I want to donate books, photographs, and other source materials to the Center.
- \_\_\_\_\_ I have expertise and time to give in assisting the Center's programs.
- \_\_\_\_\_ I wish to become part of the Legacy Circle with a planned gift.

Name: \_\_\_\_\_

Address: \_\_\_\_\_

Phone: \_\_\_\_\_

\_\_\_\_\_

E-mail: \_\_\_\_\_

\_\_\_\_\_

Mail to: Center for History of Physics  
One Physics Ellipse  
College Park, MD 20740

Or Call: 301-209-3006 and ask for  
Natalie Quets, Development  
Or E-mail: [nquets@aip.org](mailto:nquets@aip.org)

*Becoming a part of a group who are doing what needs to be done.*

*Supporting something that I believe in.*

*The fine feeling of accomplishment.*

### Three Special Types of Donations to the Center

1. **Create an endowment.** You can do this now with a gift of cash or stock, or later with an estate gift. Your fund will produce income every year to help the Center for History of Physics carry out long-term programs.

2. **Leave a bequest.** Designate an amount or a percentage of your estate to the Center's Endowment Fund. Such timeless gifts will help the Center's work for many years to come.

3. **Give obsolete insurance.** You may no longer need the protection of a life insurance policy and can transfer the ownership to the Center, thereby helping the Center while providing yourself with an income tax charitable deduction right now.

Contact AIP's Development Office at 301-209-3006 or [nquets@aip.org](mailto:nquets@aip.org) for more information.

### Proposed Internal Revenue Code Regulations Will Improve Flexibility in the Use of Individual Retirement Accounts

Many scientists approaching their septuagenarian years view distributions from IRAs as a welcome addition to their retirement income. However, for those who have designated spouses, children, and other dependents, the old rules regulating the disbursements of these accounts were complex. As physicists seem to age more slowly than the average population that forms the basis of actuary tables, some have worried that their longer life expectancies are not accounted for in the calculations for minimum mandatory distributions, thus requiring them to draw out more and adding to their taxable income base.

The Treasury Department has issued several proposed regulations that provide a much simpler and more flexible method to allocate mandatory distributions that become functional after age 70½ and (hopefully much later) on the death of the account owner. These simplifications have the effect of reducing the required minimum distributions for the vast majority of account owners and their beneficiaries. This is good news for those who have done well in managing their finances, as a lower minimum distribution may reduce their overall taxable income.

With the proposed regulations, a simple, uniform table (titled the Uniform Distribution Period) can be used by all account owners to determine the minimum distribution required during their lifetime. The minimum distributions are based solely on the account owner's age and their account balance as of the end of the prior year, which IRA trustees report annually to IRA owners. (There is a special exception: if the account owner has a spouse who is more than 10 years younger, the actual joint life expectancy of the account owner and spouse may be used instead of the Uniform

Distribution Period.) This change can lengthen the lifetime distribution period for most account owners and their beneficiaries. In fact, the new proposed regulations would lengthen that period more for many individuals than would an update of the tables to reflect recent increases in longevity.

Because the new table used to calculate the required minimum distribution is based on the account owner's age, account owners would not need to determine their beneficiary by the required beginning date of their mandatory distributions since the beneficiary's life expectancy is irrelevant to the lifetime distributions of the account owner. This new flexibility in calculating distributions also allows the account owner to change designated beneficiaries after the required beginning date without increasing their required minimum distribution. The beneficiary must be determined no later than December 31 of the year after the year of the account owner's death. The beneficiary may be changed after the account owner's death, for example when charities are cashed out early before the distributions to other designated beneficiaries begins, thus no longer affecting their distribution period.

Most likely many account owners will name their surviving spouse as the beneficiary. Sometimes it makes more sense to name others who are much younger, such as grandchildren, as beneficiaries. The proposed regulations allow that the age of the oldest beneficiary be used in calculating the payout. In this case, the age of the oldest grandchild would be used (instead of the age of the account owner when they die), thus allowing for disbursement of smaller amounts over a longer distribution period.

An odd situation may arise if the beneficiary is older than the account owner. Minimum mandatory distributions would then have to be made based on the elder beneficiary's age, resulting in a much more rapid payout than if based on the account owner's life. As a planning strategy, one can name a charity as a co-beneficiary so that the payments could be extended over a longer time frame.

The proposed regulations help account owners who wish to name charities as beneficiaries because **it becomes much more easy to name a charity as a beneficiary** of part or all of a person's retirement account without accelerating distributions over the lifetime or after death of the owner. The minimum distributions are the same, regardless of whether a charity is named. At the end of the calendar year of the account owner's death, the charity may be paid their share of the account, and the remaining non-charitable beneficiaries will have greater flexibility on their distributions that can be named afterwards. This strategy permits the charity to benefit from part of the IRA without disrupting other beneficiaries.

The White House issued a hold on these and other proposed regulations, but it seems unlikely that the proposals will be seriously delayed or revoked. Of course, as in all planned giving and investment decisions, you should seek consultation from your financial planner, tax advisor, or IRA representative.

### Volunteer Friends Make a Big Difference

Some of the most appreciated Friends of the History Center donate not only money but many hours of their time, helping out with preservation of endangered collections of papers, interviews, photographs and much more. But nobody has given more generously than the compilers of our annual bibliography of books, published in this *Newsletter* each Fall.



The bibliography was initiated in 1994 by **Stephen G. Brush**, a professor in history of science at the University of Maryland. A noted educator and scholar, he has written many works in the history of science, most recently a three-volume survey of the history of modern planetary physics and (with Gerald Holton) a historically-based textbook, *Physics, the Human Adventure: From Copernicus to Einstein and Beyond*. As a neighbor to the Niels Bohr Library, Steve has given invaluable advice on our book collection and has helped the staff in many other ways.

Recognizing the need for a listing of recently published books, Steve volunteered to compile one for us—a huge labor that he carried out for five years with only minor assistance from the Library staff. It is his hope, and ours, that the bibliographies can help readers to recommend books for purchase by their institutions' libraries (or buy for themselves), stimulating sales of scholarly works in our field.

In 1999 the torch was passed to **Per and Eleanor Dahl**, who most generously agreed to continue this laborious but highly useful task.

Retired after a distinguished career in accelerator design at Brookhaven National Laboratory, Per has turned to history of science, writing a series of books with Eleanor's help. The most recent are *Flash of the Cathode Rays: a History of J.J. Thomson's Electron* and *Heavy Water and the Wartime Race for Nuclear Energy*. Active world travelers, the Dahls are shown here standing by a monument honoring the 11 saboteurs who destroyed the heavy-water facility used by the World War II German atomic program at the Vermork Electrolysis Plant of Norsk Hydro, Norway. The monument stands close to the edge of the gorge which the members of the Gunnerside Commando team climbed.



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### Celebrating an Achievement by Preserving the Past

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Allan R. Sandage, the first recipient of the Peter Gruber Foundation Cosmology Prize in 2000 (shared with Jim Peebles), is celebrating this recognition of his achievement by donating the full value of his \$150,000 cash prize to the Center for History of Physics' Endowment Fund. We at the American Institute of Physics extend hearty congratulations and a very big thank you to Dr. Sandage for his generosity and foresight in helping us preserve our past.



The Peter Gruber Foundation established the Cosmology Prize as the first major award dedicated to cosmology. The prize will be given annually to an outstanding astronomer, cosmologist, physicist, mathematician, or philosopher of science, honoring those who have contributed to fundamental ad-

vances in the field of cosmology. This prestigious award will help to acknowledge and encourage exploration in cosmology and improve our understanding of the universe.

Allan Sandage, Staff Astronomer Emeritus at the Observatories of the Carnegie Institution of Washington, was awarded this prize for his achievements in observational cosmology. Mainly using the 200-inch telescope on Mount Palomar, he has tackled the task of charting the expansion of the universe. In his tireless pursuit of the Hubble Constant and related problems he has achieved major findings in stellar evolution, dating of the ages of stars and the universe, quasars, galaxy classification, formation and evolution, pulsating variable stars, and methods of correcting for observational selection bias.

Additional information on the prize may be found at the Peter Gruber Foundation's Web site at <http://www.petergruberfoundation.org>.