

2000 ECS Annual Report

Ready for the Next Century

The year 2000 has come and gone without inflicting the Y2K doom and disaster that many prognosticators had predicted. For the Society, the last year of the old century was a stellar one, and a year in which a great deal was accomplished to prepare us for the next century.

A New Look

One of the highlights of the year was the Society's formal adoption of an official acronym and tagline to identify The Electrochemical Society, Inc. At the spring meeting in Toronto, the Board of Directors voted to adopt the Society's new look, which you see pictured here. Over the past year, we have integrated the new logo and acronym in our publications, brochures, and on our website. While "ECS" has been the *de facto* acronym for a long time, the process of formalizing it was a significant step toward raising the awareness and influence of the Society in the areas of solid-state as well as electrochemical science and technology.



*the society for solid-state
and electrochemical science
and technology*

A New Look for a New Century—The Board of Directors voted to formally adopt the use of the acronym "ECS" to identify The Electrochemical Society.

Journals Leap Ahead

In keeping with the theme of major accomplishment and preparation for the next century, the Society journals underwent some significant changes. Over the past year, ECS has laid the groundwork to broaden and increase the dissemination and accessibility of our technical journals. While ECS members have been able to access the online journals since mid-1998 (when *Letters* was launched), online access to institutional subscribers was offered for the first time.

In order for non-profit, society-based journals to survive and continue to deliver the highest-quality products, they must form synergistic relationships with peer organizations. We have established an arrangement with the American Institute of Physics (AIP) for the composition and distribution of the *Journal of The Electrochemical Society (Journal)* and *Electrochemical and Solid-State Letters (Letters)* through AIP's Online Journals Publishing Service (OJPS) platform. ECS journals can be accessed from both the ECS web site (<http://www.electrochem.org/>) and these additional online locations:

Journal of The Electrochemical Society at: <http://ojps.aip.org/JES/>
Electrochemical and Solid-State Letters at: <http://ojps.aip.org/ESL/>

The arrangements with AIP debuted with the first 2001 issues, and represent a fantastic opportunity to improve the value of the *Journal* and *Letters* and ultimately increase their circulation. The new production system provides greater functionality for searching and cross-referencing with other technical publications in our ever-expanding universe. Teaming with AIP enables the ECS journals to take advantage of the latest in electronic publishing, while remaining independent, non-profit publications of ECS, with the ECS Editorial Board retaining full editorial and style control.

These changes could not have come at a better time. Manuscript submissions to the *Journal* and *Letters* were at an all-time high in 2000, and an additional Associate Editor

was added to the Editorial Board to handle the increased load. While the number of manuscript submissions increased, publication lagtime decreased for both journals.

Under the continued leadership of Editor Paul A. Kohl, of the Georgia Institute of Technology, the impact factors for the ECS journals reached an all-time high. The Institute of Scientific Information's Science Citation Index ranked the *Journal* and *Letters* number 1 and number 2, respectively, as the two top publications in the field of electrochemistry.

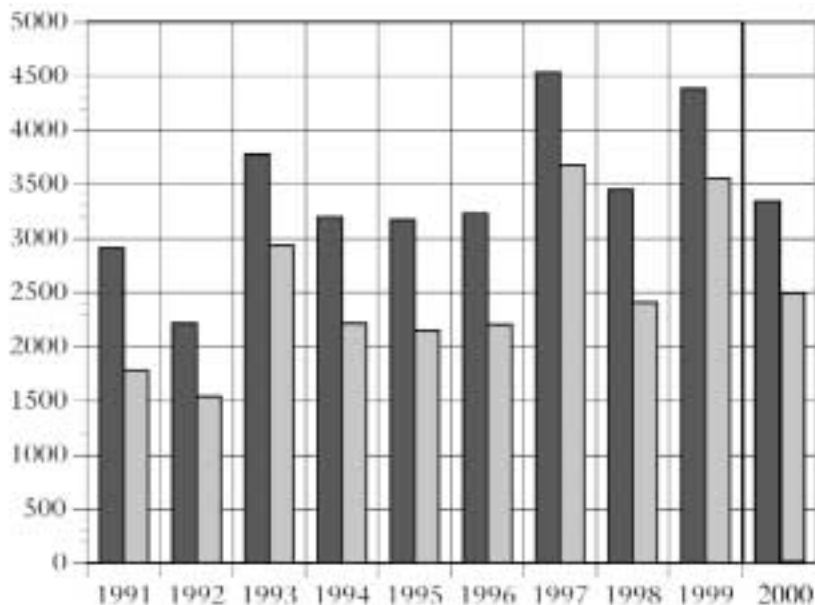
The Society added three new monographs to its list: "Uhlig's Corrosion Handbook, 2nd edition," edited by R. Winston Revie; "Modern Electroplating, 4th edition," edited by M. Paunovic and M. Schlesinger; and "Atmospheric Corrosion," edited by T. Graedel and C. Leygraf. These were sponsored by the Society and published by John A. Wiley & Sons; all volumes have already shown exceptional sales in their first year.



Long-Awaited Society Monographs—ECS welcomed three new titles to the list of Society sponsored monographs. All books were published by John A. Wiley & Sons and have already made the best-seller lists!

Meetings Program Grow Globally

ECS has continued to use technology to produce successful meetings, and the semiannual meetings in 2000 were outstanding. Attendance at both the spring and fall meetings was excellent, and 99% of all abstract submissions for these meetings were submitted electronically. The spring 2000 meeting



ECS Meetings—Paper submission and attendance. (■ Attendance and ■ Papers)

Table I. ECS Membership Statistics

(As of October 1, 2000)

ECS Membership by Class

Category	1996	1997	1998	1999	2000	2000/1999 % Change
Active	4,952	5,148	5,327	5,183	5523	6.6
Member Reps	93	83	76	75	79	5.3
Life	58	58	59	56	57	1.8
Emeritus	203	220	222	233	240	3.0
Honorary	28	27	27	20	26	-3.7
Subtotal Active in Good Standing	5,334	5,536	5,711	5,574	5925	6.3
Delinquent	662	642	680	874	710	-18.8
Total Active on Record	5,996	6,178	6,391	6,448	6635	2.9
Students	865	887	860	838	960	14.6
Delinquent	218	256	283	265	250	-5.7
Total Students	1,083	1,143	1,143	1,103	1210	9.7
Total Individual Members	7,079	7,321	7,534	7,551	7845	3.9

ECS Membership by Sections

Section	1996	1997	1998	1999	2000	2000/1999 % Change
Canadian	194	248	219	212	250	17.9
Chicago	210	183	172	183	178	-2.7
Cincinnati	40	46	66	59	60	1.7
Cleveland	111	112	114	105	111	5.7
Detroit	98	91	90	98	92	-6.1
European	813	891	1,076	985	1093	11.0
Georgia	157	162	160	147	142	-3.4
Israel		30	42	37	41	10.8
Japan	514	575	602	597	681	14.1
Korea			145	167	219	31.1
Metropolitan New York	401	381	356	340	362	6.5
Midland	18	20	22	21	21	0.0
National Capital	194	192	215	218	230	5.5
New England	323	337	327	356	346	-2.8
Pacific Northwest	109	100	97	125	115	-8.0
Philadelphia	172	159	136	140	143	2.1
Pittsburgh	90	86	86	87	100	14.9
San Francisco (ES&T)	138	153	160	156	157	0.6
San Francisco (SS&T)	362	347	337	286	280	-2.1
South Texas	192	209	188	173	177	2.3
Southern Wisconsin	62	56	54	51	52	2.0
Twin Cities	98	98	102	105	106	1.0
Non-Section	1,903	1,947	1,805	1,764	1,929	9.4
Subtotal All classes (current)	6,199	6,423	6,571	6,412	6885	7.4
Delinquents (Active and Student)	880	898	963	1,139	960	-15.7
Total	7,079	7,321	7,534	7,551	7845	3.9

was held in Toronto, Ontario, Canada, with over 1,600 attendees choosing from 1,310 papers in 34 symposia. The Plenary Lecture for the meeting was Stevan Harnard, well known for his provocative views on the future of scientific refereed journals.

The fall meeting, held in Phoenix, Arizona, hosted over 1,600 attendees for 1,181 papers in 31 symposia. The Plenary Lecture, was given by Nobel Laureate Carl Djerassi, who discussed his attempt to narrow the ever-widening gulf between the scientific community and other sub-cultures of contemporary society.

In 2000, ECS also sponsored the 10th International Meeting on Lithium Batteries (IMLB X), which was a very successful topical meeting held in Lake Como, Italy. Although we were affiliated with the previous IMLB meetings, the Lake Como meeting represented the first time that ECS had full operational responsibility.

These “satellite” meetings are increasingly becoming part of ECS programs, and two more have already been scheduled. In 2001, ECS will sponsor the 1st International Semiconductor Technology Conference (ISTC 2001), to be held in Shanghai, China; and the following year, ECS will sponsor IMLB 11 in Monterey, California.

Increased Member Activity

For the seventh straight year, there was no increase in membership dues, and the Society saw a 3.9% increase in membership, up to a record 7,845 members (see Table I).

Increased membership activity was much in evidence as the Society welcomed a new Local Section in Brazil and the very first student chapter. The Board of Directors approved the new Section’s Bylaws at the ECS fall meeting in Phoenix, and they immediately launched into a program of activities. The first ECS student chapter was formed at the University of Central Florida (U.S.), under the auspices of the Georgia Local Section. Like their Local Section counter-part, the student chapter plans to hold major meetings each year, inviting speakers from industry and academia. The members also plan to visit local high schools, to foster excitement and encourage participation in ECS fields.

Financial Strength Enables Strong Programs

The financial position of the Society continues to be strong, with 2000 showing a budget surplus of \$266,908 in the General Operating Fund. The Society's Finance Committee, Financial Policy Advisory Committee, and the Board of Directors outline a responsible yet growth-oriented course of action for ECS's budgeting and investments.

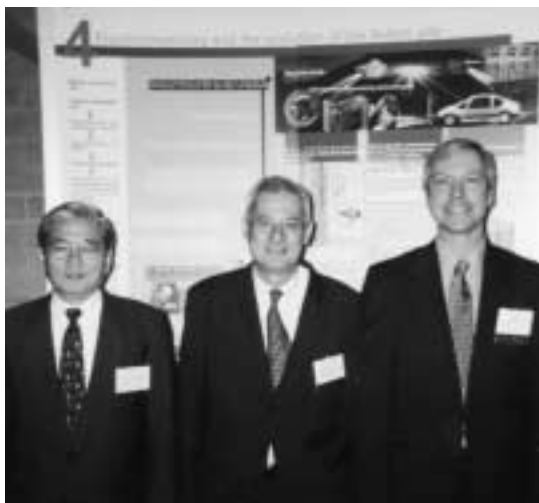
The Society has thrived under strong volunteer leadership, coupled with the management of Roque Calvo, ECS's Executive Director, who celebrated 20 years with the Society in 2000. He joined the staff in 1980 and became the Executive Director in 1991, only the fourth in the Society's long history. Calvo has led the Society through many new initiatives and steady growth in membership and all program areas.

The programs and activities of the Divisions, Groups, and Local Sections also generate revenue that is used to award student memberships and travel grants, which in turn make for strong symposia, meeting attendance, and proceedings volumes.

This strong financial position enables the Society to continue to meet member needs. ECS, and the Divisions/Groups and Local Sections, provided \$37,950 in cash prizes to numerous award recipients. Additionally, the Society Summer Fellowships provided \$27,000 to students to pursue their work during the summer months. One of the Society's strongest commitments has been to a strong travel grant program, and in 2000, this program provided \$113,000 in funds.

Challenges and Opportunities for All Societies

ECS programs and services continue to grow in scope and value, and this annual report reflects our progress over the past year. The steps we have taken in 2000, and in prior years, have prepared ECS for the challenges and opportunities awaiting all professional societies in the next century. ■



International Meeting on Lithium Batteries X—The organizing chairman were (from left to right) Zempachi Ogumi, Bruno Scrosati, and Frank McLarnon. Missing from the photo is Peter G. Bruce. Although ECS has been affiliated with this meeting in the past, IMLB X was the first time ECS had full operational responsibility.

Two Decades of Service—ECS Executive Director ROQUE CALVO celebrated 20 years with the Society in 2000. He is shown here (at right) with LARRY FAULKNER (center), President of The University of Texas at Austin, and with ECS 2000-2001 President CARLTON M. OSBURN. Faulkner had served on the search and selection committee, and was ECS President in 1991-1992, when Calvo became Executive Director.



2000 Award Winners

Edward G. Acheson Award	Larry Faulkner
Vittorio de Nora Award.....	Dennis R. Turner
Henry B. Linford Award	Glenn Stoner
ECS Fellows	Cammy Abernathy, K. M. Abraham, John C. Angus, W. Ronald Fawcett, David S. Ginley, Yasuhiko Ito, Howard Huff, Robert F. Savinell, Roger Staehle, Charles W. Struck, and Sergio Trasatti
Battery Division Research Award	John B. Bates
Battery Division Technology Award	Huk Y. Cheh
Dielectric Science & Technology Division	
Thomas D. Callinan Award.....	Krishna Saraswat
Electrodeposition Division Research Award	Hideo Honma
Electronics Division Award	Sung Nee (George) Chu
Organic & Biological Electrochemistry Division	
Manual M. Baizer Award	Jacques Simonet and James Utley
Sensor Division Outstanding Achievement Award	Antonio J. Ricco
Gwendolyn B. Wood Local Section	
Excellence Award	New England Local Section

TABLE III. ECS Consolidated Balance Sheet

(Years Ended December 31, 2000 and 1999)

Assets		
	2000	1999
Current Assets:		
Cash	\$147,077	\$99,939
Accounts Receivable	164,488	130,916
Inventories	3,284	17,158
Prepaid expenses, deposits, and other assets	165,841	157,714
Mortgage note receivable (note 2)	470,935	0
Investments (note 3):		
Marketable Securities	7,059,140	6,724,871
Real Estate	1,437,733	1,437,733
Land	350,608	381,377
Buildings	253,327	402,210
 Total Assets	 \$10,052,433	 \$9,351,918
Liabilities and Net Assets		
	2000	1999
Current Liabilities:		
Accounts payable and accrued expenses	\$82,443	\$142,423
Deferred revenue	1,047,400	1,056,177
Security deposits	26,785	27,047
Deferred compensation	70,371	79,804
 Total Liabilities	 1,226,999	 1,305,451
Net Assets:		
Unrestricted:		
General operating	634,445	1,159,758
Investment in land and buildings	603,935	783,587
Custodial	6,418,293	4,963,391
Designated	323,721	318,621
Designated Earnings	76,673	62,560
Local Sections	111,977	101,255
 Total Unrestricted	 8,169,044	 7,389,172
Temporarily restricted	286,190	287,095
Permanently restricted	370,200	370,200
 Total Net Assets	 8,825,434	 8,046,467
 Total Liabilities & Net Assets	 \$10,052,433	 \$9,351,918

Notes to Financial Statements

1—Summary of Significant Accounting Policies

The consolidated financial statements include the accounts of The Electrochemical Society, Inc. and its Divisions, Groups and Local Sections, and its wholly-owned subsidiary, ECS Holdings LLC. All intercompany balances and transactions have been eliminated in consolidation.

These consolidated financial statements, which are presented on the accrual basis of accounting, have been prepared to focus on The Electrochemical Society, Inc. and subsidiary (the Society) as a whole and to present balances and transactions according to the existence or absence of donor-imposed restrictions. Accordingly, net assets and changes therein are classified as follows: Unrestricted net assets—net assets not subject to donor-imposed stipulations; Temporarily restricted net assets—net assets subject to donor-imposed stipulations that will be met by actions of the Society and/or by the passage of time; Permanently restricted net assets—net assets subject to donor-imposed stipulations that they be maintained permanently by the Society. Generally, the donors permit the Society to use all or part of the income earned on related investments for general or specific purposes.

2—Mortgage Note Receivable

On February 18, 2000, the Society sold the land and building that it had previously occupied as its corporate headquarters. Net proceeds on the sale of the property was \$110,142. The net carrying value of the land and buildings as of the date of sale was \$172,986. A gain of \$424,656 was recognized on this transaction.

In addition, as part of the sale agreement, the Society entered into a mortgage note receivable in the amount of \$487,500. The terms of the agreement require monthly payments of \$4,192, including interest at 8.375% beginning February 2000. The remaining principal balance plus any accrued interest become due and payable on March 31, 2006 the maturity date of the agreement. As part of the agreement, the Society holds a first lien on the mortgaged property.

3—Investments

Investments are carried at fair value and are generally held until maturity. Investments in real estate are carried at cost.

Investment income and realized and unrealized net gains on investments of permanently restricted net assets are reported as follows:

- as increases in temporarily restricted net assets if the terms of the gift impose restrictions on the use of the income and/or net gains;
- as increases in unrestricted net assets in all other cases.

Investments, other than real estate, are stated at fair value, as determined by quoted market prices provided by investment managers, and consist of the following as of December 31, 2000:

Short-term investments	902,942
Stock Mutual Funds	2,766,301
Certificates of deposits	1,821,410
U.S. Government Agency obligations	1,534
Corporate bonds	1,533,203
Corporate stocks	163
Accrued interest receivable	33,587
Real Estate (ECS Holdings LLC)	1,437,733
Total	\$8,496,873

4—ECS Holdings LLC

ECS Holdings LLC leases office space to various tenants under operating lease arrangements expiring through 2009. (Rental Income under the aforementioned leases totaled \$322,311 for the year ended December 31, 2000.)

5—Independent Accounting Firm

The Society engaged the services of the independent accounting firm, KPMG LLP, to conduct the 2000 annual audit. In the opinion of KPMG LLP, the Society's financial statements present fairly, in all material respects, the financial position of The Electrochemical Society, Inc. and subsidiary as of December 31, 2000 and 1999, and the changes in their net assets and their cash flows for the years then ended in conformity with generally accepted accounting principles.

ECS Staff (as of May 1, 2001)

Roque J. CalvoExecutive Director
 Barbara J. BaggottECS Affiliates Coordinator
 Melissa A. Berkenkopf.....Customer Service Representative
 Artie Ann BerryPublications Assistant
 Brian P. BosakInformation Systems
 Administrator
 Elizabeth Brennfleck.....Director of Meetings and Exhibits
 Karen ChmielewskiCustomer Service Representative
 Anne ClementsonPublications Assistant
 Paul CooperJournals Production Manager
 Erin GrauAssistant Director of Meetings
 and Exhibits

Andrea L. GuenzelPublications Clerk
 Susan M. LiggettSenior Customer Service
 Representative
 Patricia T. LorynskiPublications Clerk
 Terry McCloughan.....Books Program Coordinator
 Troy M. MillerDirector of Development
 Ellen S. PopkinPublications Production
 Coordinator
 Carolyn R. PylypiakDirector of Finance
 Ellen M. TianoDirector of Membership
 and Administration
 Mary E. YessDirector of Publications

TABLE II. Consolidated Statements of Activities

(Years ended December 31, 2000 and 1999)

	2000			1999		
	Unrestricted Funds	Restricted Funds	Total Funds	Unrestricted Funds	Restricted Funds	Total Funds
Revenues:						
Publications	\$1,950,808	0	1,950,808	\$1,928,365	0	\$1,928,365
Membership	623,527	0	623,527	595,405	0	595,405
Society meetings and activities	1,176,307	0	1,176,307	941,621	0	941,621
Interest and dividend income	285,933	37,297	323,230	290,350	36,389	326,739
Net realized gain on sales of investments	0	0	0	322,498	0	322,498
Contributions and grants	126,068	0	126,068	76,078	0	76,078
Rental income	322,311	0	322,311	343,515	0	343,515
Other revenues	90,019	0	90,019	53,666	0	53,666
Total Revenues	4,574,973	37,297	4,612,270	4,551,498	36,389	4,587,887
Net assets released from restrictions for awards	38,202	(38,202)	0	19,983	(19,983)	0
Total Revenues and Other Support	4,613,175	(905)	4,612,270	4,571,481	16,406	4,587,887
Expenses:						
Program Services:						
Publications	1,753,086	0	1,753,086	1,795,047	0	1,795,047
Membership	107,732	0	107,732	116,252	0	116,252
Society meetings and activities	914,151	0	914,151	734,318	0	734,318
Awards, fellowships, and grants	241,333	0	241,333	260,076	0	260,076
Total Program Services	3,016,302	0	3,016,302	2,905,693	0	2,905,693
Supporting Services:						
General and Administrative	755,460	0	755,460	647,244	0	647,244
Rental Operations	236,146	0	236,146	371,501	0	371,501
Total Expenses	4,007,908	0	4,007,908	3,924,438	0	3,924,438
Increase (decrease) in net assets from operations	605,267	(905)	604,362	647,043	16,406	663,449
Nonoperating gain (loss):						
Gain on sale of land and building (note 2)	424,656	0	424,656	0	0	0
Net appreciation (depreciation) on investments	(250,051)	0	(250,051)	(327,338)	0	(327,338)
Increase (decrease) in net assets	779,872	(905)	778,967	319,705	16,406	336,111
Net assets as of beginning of year	7,389,172	657,295	8,046,467	7,069,467	640,889	7,710,356
Net assets as of end of year	\$8,169,044	656,390	8,825,434	\$7,389,172	657,295	8,046,467

ECS Affiliates

Academic Press	Ernest B. Yeager Center for Electrochemical Science	Marketch International	Sandia National Labs
AD Instruments Pty., Ltd.	E-TEK, Inc.	Matsushita Battery Industrial Company, Ltd.	Schumacher
Advance Research Chemicals, Inc.	EV Group	Max-Planck-Institut für Festkörperforschung	Scribner Associates, Inc.
AICHe	Evans Analytical Group	Maxtek, Inc.	Semiconbay.com
Arbin Instruments	Eveready Battery Company, Inc.	Medtronic Inc.	Sensor Products, Inc.
ASM International	Faraday Technology, Inc.	Mine Safety Appliances Company	Shiple Company
Atotech USA, Inc.	FMC Corporation, Chemical Process Tech	Mitsubishi Electric Corp.	Siemens Aktiengesellschaft
Ballard Power Systems, Inc.	Fujitsu Limited	MKS Instruments	Solartron Analytical
Bede Scientific Inc.	Gamry Instruments	Molecular Green Technology	Spectracorp
Bioanalytical Systems, Inc. (BAS)	General Electric Corp. R&D	Molecular Imaging	Sumitomo Metal Industries, Ltd.
Brinkmann Instruments, Inc.	General Motors Research Labs	Nacional de Grafite LTDA	Superior Graphite Co.
C&D Technologies, Inc.	Giner, Inc.	NBT GmbH	TDK Corp., R&D Center
Canon, Inc.	Radiometer Analytical	NEC Corporation Central Research Labs	Technic Inc.
Center for Tribology	Honeywell, Inc.	Nortel Networks	Three M Company
Comsat Laboratories	IBM Corporation	Occidental Chemical Corp.	Timcal AG Graphite und Tech.
Comsol, Inc.	ICI Chemicals & Polymers Ltd.	Olin ChlorAlkali Products Division	Tokuyama Corp.
CSIRO Minerals	Institution of Electrical Engineers	Onstream B.V.	Toshiba R & D Center
Cypress Systems, Inc.	International Fuel Cells	Osram Sylvania, Inc.	Toyota Central Research & Development Lab
Daiso Co., Ltd.	International Lead Zinc Research Org., Inc.	PCI Chemicals Canada, Inc.	Trace Detect
de Nora Technology	Japan Storage Battery Company, Ltd.	PerkinElmer Instruments-PAR	Ultra-Group Inc.
Elettrochimiche S.p.A.	Johnson Controls, Inc.	Permelec Electrode Ltd.	C. Uyemura & Co. Ltd.
Digital Instruments	Kerr-McGee Chemical, LLC	Philips Research, Inc.	Vacuum Atmospheres Company
Dow Chemical Company	Kluwer Academic	Pine Instruments	Vacuum Engineering & Materials Company, Inc.
Du Pont Company	Koslow Scientific	PPG Industries, Inc.	Valence Technology
Duracell	Lam Research	Precious Plate Incorporated	Wacker Siltronic AG
Dynaload, Division of TDI	Leclanche SA	Quallion, LLC	Wilson Greatbatch Ltd.
ECO Energy Conversion	Lucent Technologies	Radiant Technologies, Inc.	Yuasa Corporation
Elchema	Lynntech, Inc.	Rayovac Corp	
ElectroChem., Inc.	Maccor, Inc.	Royal Society of Chemistry	
Electrosynthesis Co., Inc.		Saft Research & Development Center	
Elsevier Science			
Eltech Systems Corp.			
Engigzer Power Systems			