

HOW *THERMOCHIMICA ACTA* BEGAN: SOME RECOLLECTIONS

W.W. WENDLANDT

Department of Chemistry, University of Houston, Houston, TX 77004 (U.S.A.)

(Received 2 March 1981)

ABSTRACT

The early history of *Thermochimica Acta* is described by the Editor-in-Chief. The journal was first proposed in 1968 while the first issue was published in 1970. The journal has grown from one volume in 1970 to eight volumes in 1980.

It is with great pleasure that I welcome the publication of the 50th Anniversary Edition of *Thermochimica Acta* to celebrate the publication of Vol. 50. Little did I, or the original members of the Editorial Board, envision the premier status that *Thermochimica Acta* would someday become in the field of thermal analysis and calorimetry. The Journal has grown from the original one volume to eight volumes per year in 1980. In this 10-year interval, the number of published pages has increased from some 500 to 3130 pages. Among the topics covered in the articles, almost every technique in thermal analysis and calorimetry has been employed with applications to practically all of the areas of science and technology. The countries of origin of the manuscripts have included all countries in which thermal analysis and calorimetry are practiced, with the exception of the Republic of China.

I thought that it would be appropriate at this time to describe briefly the beginning of *Thermochimica Acta*. It is a simple story but one that should be recorded here on the occasion of this 50th Anniversary Edition.

Ever since my research activities began in thermal analysis in the early 1950s, I had envisioned a journal devoted exclusively to publications in thermal analysis and calorimetry. During this early period, thermal analysis papers appeared in almost all of the major chemical, geological, ceramic, and other scientific journals, making a literature search very difficult and time-consuming. Consequently, many early investigators were unaware of previous work in the field, which resulted in duplication of effort in certain research areas. A journal in thermal analysis and calorimetry would perhaps prevent this duplication and enable workers in the field to publish their investigations in an exclusive journal.

In a letter dated 16 February 1968, I proposed to Mr. P. Bergmans, then President of the Elsevier Scientific Publishing Co., that a new journal entitled *Thermochimica Acta* be published. This journal would contain papers concerned with original investigations in "thermochemistry and chemical thermodynamics." It would include static and dynamic calorimetry of all

types, high temperature chemical thermodynamic studies, and all of the thermal analysis techniques. The areas of science covered would be all of the branches of chemistry, metallurgy, geological sciences, ceramics and so on. Four types of article were to be published: full-length technical articles, notes, review articles, and book reviews. An immediate reply was received from Mr. Bergmans in a letter dated 19 February 1968, followed by a letter from Dr. W. Gaade on 13 March 1968, who indicated that he would investigate the matter further. The latter letter stated that Elsevier was definitely interested in publishing the Journal, but that their decision would have to be based on the opinions of scientists who were experts in the field.

After 4 months of investigation, a reply was received on 10 July 1968, with the results of the expert opinions from 19 scientists. Of these replies, 53% were positive, 21% were negative, 16% did not know, and 11% were positive if abstracts were included in each issue. With these results Elsevier consented to publish *Thermochimica Acta* and I agreed, of course, to become the Editor-in-Chief and to form an Editorial Board of distinguished scientists.

To create the Editorial Board, I sent Dr. Gaade a list of 26 names of which, according to his reply of 19 March 1969, 18 accepted. Thus, these 18 people who accepted became the first Editorial Board for the Journal. This first Editorial Board consisted of the following members: E.M. Barrall, G. Beech, J. Chiu, B.R. Currell, H. Dichtl, A.P. Gray, M. Harmelin, T.R. Ingraham, R.M. Izatt, P.O. Lumme, G.M. Lukaszewski, H.G. McAdie, T. Ozawa, G. Pannetier, L. Reich, R.N. Rogers, S. Seki, J. Sestak, E. Sturm, G.A. Vaughan, H.G. Wiedemann, and R.C. Wilhoit. Of the original members, 15 are still on the Editorial Board.

The Editorial Board was requested to solicit manuscripts for the first issue of *Thermochimica Acta*. One of the Board members volunteered to send one of his own manuscripts that was ready for publication. A starting date of January 1970 was proposed in my letter of 28 March 1969 to Dr. Gaade.

The first manuscript, which was received from K. Moedritzer and R.E. Miller of the Monsanto Company on 4 June, 1969, was entitled "Thermal

TABLE 1

Thermochemica Acta: pages published

Year	No. of pages
1970	589
1971	1033
1972	1028
1973	1058
1974	1396
1975	1376
1976	1596
1977	1599
1978	2439
1979	2714
1980	3130

decomposition of phosphine complexes of nickel(II) dihalides". Since this first manuscript, the publisher has processed almost 2500 manuscripts for publication in *Thermochimica Acta*. Many more than this have, of course,

TABLE 2

Miscellaneous statistics for vols. 1-8, 1970-1974

Classification	No.	Percent
I. Type of paper		
(a) Article	370	89
(b) Note	45	11
II. Languages		
(a) English	379	91
(b) French	23	6
(c) German	13	3
III. Country of origin (senior authors)		
(a) U.S.A.	236	57
(b) Gt. Britain	34	8
(c) India	13	3
(d) Canada	21	5
(e) Japan	7	2
(f) W. Germany	15	4
(g) E. Germany	3	1
(h) France	24	6
(i) Yugoslavia	4	1
(j) Netherlands	5	1
(k) Australia	5	1
(l) Italy	10	2
(m) Poland	1	1
(n) Hungary	5	1
(o) Egypt	2	1
(p) Czechoslovakia	13	3
(q) Belgium	1	1
(r) U.S.S.R.		
(s) Norway	1	1
(t) Finland	1	1
(u) South Africa	1	1
(v) Switzerland	7	2
(w) Romania	1	1
(x) Iraq	1	1
(y) Israel	1	1
IV. Technique employed		
(a) TG, DTG	113	23
(b) DTA, DSC	179	36
(c) Miscellaneous thermal analysis techniques	72	14
(d) Calorimetry		
(i) Solution	55	11
(ii) Other	10	2
(e) Theoretical	16	3
(f) Thermodynamics	8	2
(g) Reaction kinetics	24	5
(h) Miscellaneous techniques	25	5

been received by the Editorial Office but for various reasons, not all have been accepted for publication.

At long last, Dr. Gaade informed me in his letter of 29 April 1970, that the first issue of *Thermochimica Acta* had come off the printing presses. It seemed that everything had worked against the time schedule of a January 1970 publication date; the worst of which was a postal strike in Belgium, the country in which the journal was printed. The first issue contained 110 pages and consisted of papers by (senior authors only) R.N. Rogers, W.W. Wendlandt, H.G. McAdie, S.D. Norem, T.R. Ingraham, M.R. Smith, P. Desai, L. Reich, J. Chao, K. Moedritzer and G. Beech.

The success of the new Journal was saddened by the news from Dr. Marc Atkins that Dr. Graade had died, following surgery, on 10 October 1970. He would have been very pleased to see the results of his foresight and decisions of 1968–1969.

A few statistics on *Thermochimica Acta* should perhaps be included at this point. The first, in Table 1, is the number of pages for each year of publication since 1970. As can be seen, the Journal has grown from about 500 pages in 1970 to more than three thousand in 1980. Secondly, the results of a survey completed in 1974 for volumes 1–8 are given in Table 2. Most of the papers were published in the English language, with the U.S.A. being the origin of 57% of all of the authors. This had decreased from 77% in Vol. 1 and it would be much less than this in 1980, the date of this writing. Thirdly, a survey of techniques employed in papers published in Vols. 24–29 of *Thermochimica Acta* is given in Table 3. These have recently been published elsewhere [1]. As can be seen, about 53% of the papers involved the techniques of TG, DTA and DSC. Only 8.7% were concerned with various types of calorimetry.

In conclusion, I would like to personally thank all of the members of the Editorial Board, the authors of the 2500 published manuscripts, and the

TABLE 3

Techniques used in *Thermochemica Acta*; Vols. 24–29, 1970–1979

Technique	Percentage of papers
TG ^a	29.1
DTA	16.7
DSC	6.8
DTG	6.2
X-Ray (high temperature)	4.6
MS (MTA)	2.8
Electrical properties	2.2
EGD—EGA	1.9
TMA (dilatometry)	1.9
Derivatography	1.0
Miscellaneous TA	18.5
Calorimetry, all types	8.7
Total number of papers in survey	220

^a Includes isothermal mode.

Elsevier Publishing Company, for their contributions to making *Thermochimica Acta* the journal that it is today. Without their help, we would not be publishing this 50th Anniversary Edition.

REFERENCES

- 1 W.W. Wendlandt, *Thermochim. Acta*, 36 (1980) 393.