SUGGESTIONS TO AUTHORS OF REVIEW ARTICLES

GENERAL STATEMENT

Articles for *Chemical Reviews* are to be authoritative, critical, and comprehensive reviews of recent research—both theoretical and applied—in the various fields of chemistry. Mere compilations of data, patent searches, or historical recitation of events are not suitable. The subject should be carefully selected and the scope defined in order to provide unity of thought and logical arrangement of ideas. In general, the subject should *not* have been reviewed during the previous eight to ten years in a journal, monograph, or textbook.

The readers of *Chemical Reviews* are teachers, students (undergraduate and graduate), practicing chemists, research chemists, and scientists in fields closely related to chemistry. In writing the article the author should assume that these readers are competently trained in fundamentals but that they have no extended knowledge of the specialized field.

PRELIMINARY SURVEY AND APPROVAL OF ARTICLES

An effort is made to arrange a publication schedule about a year in advance. Hence, the Editor will gratefully accept suggestions for timely reviews and will discuss with prospective authors the suitability of their manuscripts.

In order to assist the Editor in evaluating a subject suggested for *Chemical Reviews*, authors are requested to send to the Editor-in-Chief:

- (a) A one- or two-page topical outline.
- (b) The last date of a previous review in that field.
- (c) An estimate of the number of references (i.e., 50, 100, 200).
- (d) An estimate of the number of typewritten pages (25, 50, 100, etc.).
- (e) A tentative date when the author could submit the manuscript (3, 6, 9, or 12 months).

This material will be examined by the Editor with advice from the referees and Editorial Board. After the subject is approved, the author will be notified and should then proceed with the writing of the review. He will have the assurance that the article will be accepted, providing of course that he does a good job of writing. Uninvited manuscripts will be referred to the Editorial Board but can be published only if they accord with the advance publication schedule.

PREPARATION OF THE MANUSCRIPT

A prospective author should examine previous issues of *Chemical Reviews* and read one of the review articles—if one has appeared—in the same general field as that in which he proposes to write. All articles should have:

Title Introduction

Author's name The body of the review

Name of institution References

Table of contents

Introduction

This should be about one or two pages long and should state precisely the scope and limitations of the review and the years covered. The nomenclature (organic or inorganic) or notation system used should be clearly and specifically stated. The names and numbering systems used by *Chemical Abstracts* in the recent indices as well as common or trivial names should be given. The names used in the article should be consistent and unambiguous. In general, the official *Chemical Abstracts* names are preferred. It is the author's responsibility to select the proper nomenclature before the main body of the review is written.

The review article

The material should be clearly and logically arranged, with main divisions and subdivisions. It should be organized according to the reactions or theories involved and usually *not* according to *purely* historical sequence. Some historical developments should be given in proper subdivisions, but in general the entire article should not be chronological.

Where a considerable number of compounds are made by one general reaction, these are conveniently summarized in suitable tables with reference numbers. Do not give physical constants but do mention yields. In physicochemical articles the notation and meaning of symbols should be specifically defined at some suitable point. Carefully selected tables of data and graphs may be used to illustrate theories, equations, and laws. Number the tables and graphs consecutively and refer to these in the text by number: i.e., "Figure 5"; "Table 2"; and not "the following figure"; "the above table," etc.

Authors should write clearly and concisely. Avoid repetition. The material should be treated objectively and critically—avoiding personalities and polemics—because the fundamental purpose of a review is to advance the science of chemistry.

In the text when referring to data reported by a number of coauthors, it is courteous to give *all* the names on the paper or else to omit all of them (preferable). For example:

Preferred:

"The heat of hydrogenation of styrene to ethylcyclohexane was found to be -77.8 kcal. per mole (164)."

Undesirable:

"Dolliver, Gresham, Kistiakowsky, and Vaughn (164) studied the hydrogenation of styrene and found that complete reduction to ethylcyclohexane involved a heat of hydrogenation amounting to -77.8 kcal. per mole."

Try to avoid expressions such as "Dolliver et al." or "Kistiakowsky and coworkers." The example cited above also illustrates the importance of simple construction and elimination of long, complicated, wordy sentences.

Scan your manuscript for "idle words" and delete them. Various introductory phrases which are quite natural in speech should not be used. For example: "It will be recalled that...."; "It is obvious that....," are redundant.

Try to avoid the use of personal pronouns: I, we, you, he, she, they. Recasting

the sentence without pronouns usually makes for clear precise statements and avoids ambiguity in antecedents. Except in very special citations do *not* use direct quotations. State the author's data, theories, and conclusions fairly, but avoid selecting a phrase, sentence, or paragraph out of its setting in the context of the whole article.

The references

The references must be arranged alphabetically according to the names of the authors and also chronologically when there are several references under the same name(s). The official Chemical Abstracts abbreviations for the names of the journals should be used and the volume, page number, and year should be given. If a reference is to an obscure or generally unavailable journal, the Chemical Abstracts reference should be given in addition to the original. For books give the author(s), title, the publisher's name and address, and the year of publication. Citations of patents should include the author's name (or the name of the company if no individual is named as the patentee), the patent number, and a reference to Chemical Abstracts, Chemisches Zentralblatt, Friedländer, or other source.

Give all the authors' names and their initials and use a separate number for each reference. Do not use "ibid."

In deciding on the proper alphabetical order, use the first *capitalized* letter of the last name and then the alphabetical sequence of succeeding letters. Compound names with a prefix such as de, du, la, von, etc. are arranged according to the first capitalized part. Some examples in proper sequence are:

Under B	$Under\ L$	$Under\ M$
du Barry	Lake	Mabry
Becker	${f LaMer}$	${f MacBride}$
von Behring	Lancey	Macginnis
de Bell	von Link	McFerson
		\mathbf{Mellor}

If the article is short (3 or 4 pages) give the first page of the article in the reference. If the article is long (over 5 pages) refer to the page on which the reader will find the data mentioned in the text.

Illustrative references:

- (1) Angeli, A.: Atti accad. Lincei 19, I, 793 (1910).
- (2) Angeli, A.: Atti accad. Lincei 23, I, 557 (1914).
- (3) Angeli, A., and Alessandri, L.: Atti accad. Lincei 20, I, 170 (1911).
- (4) Angeli, A., and Valori, B.: Atti accad. Lincei 22, I, 132 (1913).
- (5) Hochwalt, C. A.: U. S. patent 2,390,368; Chem. Abstracts 40, 1878 (1946).
- (6) Jensen, K. A.: Dansk. Tid. Farm. <u>16</u>, 1-10 (1942); Chem. Abstracts <u>37</u>, 4375 (1943).
- (7) Meyer, V., and Jacobson, P.: Lehrbuch der organischen Chemie, Vol. 2, Part 3, p. 521. Walter de Gruyter and Co., Berlin and Leipzig (1923).
- (8) Perkin, W. H.: J. Chem. Soc. <u>32</u>, 663 (1877).

- (9) Robinson, A., and Waters, W. A.: J. Chem. Soc. 1948, 1574.
- (10) Société pour l'industrie chimique à Bale: French patent 830,125 (July 21, 1938); Chem. Abstracts 33, 1416 (1939).
- (11) Sommelet, P., and Marszak, N.: French patent 787,655; Chem. Zentr. 1936, I, 3217.

Illustrations or figures

Illustrative material is of two types: pen and ink drawings, which are reproduced by the line engraving process, and photographs, which are reproduced by the halftone process.

All drawings should be made with India ink on tracing paper, white paper, or blue-lined coordinate paper. The lettering of the numerals and legends at the sides and bottoms of graphs, as well as of any numerals or words appearing on the graph itself, should be large enough to be seen clearly when the drawing is reduced. Most figures can be advantageously drawn for a reduction of from 50 to 75 per cent, i.e., a drawing measuring 6 by 8 in. may be reduced to one measuring 3 by 4 in. or even 1.5 by 2 in.

Photographs should be in the form of clear black-and-white prints on glossy paper. Care should be taken to see that they cannot be bent or folded in handling. Paper clips should not be attached to them, since all imperfections in the original copy are reproduced.

Typing

Manuscripts should be typed double-spaced on white bond paper, 8.5 x 11 inches, on one side of the paper only. Number the pages consecutively in the upper right-hand corner.

Formulas and equations should be separated from the text by a space. Linear formulas may be typed; more complex structures should be neatly and accurately drawn with pen and black ink. Do not crowd the formulas. Be sure that your copy is clear, unambiguous, and easily legible. Remember that the manuscript which you prepare is to be used by the printer, and usually a monotype operator who is not a chemist.

After the section of references please arrange:

Pages of footnotes: These should be typed on separate pages and numbered independently of the references. In the text, the footnote numbers are to be small superscripts.

Pages of figure legends, one legend for each figure; reference to each figure by number should be included in the text.

Pages of tables, each table having a number and a heading or title; reference to each table by number should be included in the text.

Always have carbon copies typed and keep the carbons in your file.

SUGGESTED PROCEDURE

The problem of writing the review and arranging the references without errors may be solved in a number of ways. One of the writing techniques which in-

volves the minimum amount of labor and which eliminates reference errors utilizes the following steps:

- Complete the literature survey, recording the material in any fashion you happen to prefer: punched cards, index cards, notebook, or paper sheets. Then decide on the main divisions and subdivisions for the review.
- 2. In the first hand-written draft of the review, insert the references throughout the article (separated by double horizontal lines) at the specific points to which each reference applies. Write each reference as a separate line and use no numbers. Rearrange the pages, assembling the topics under the proper headings and subheadings and being careful to move the references with the discussion.
- 3. This draft is then typed double-spaced, making two copies. These two typed copies have the references still intermingled with the text but separated from the text by lines which run clear across the paper. Corrections and revisions may now be made on these copies. Read the discussion given above concerning the writing of the review. Rewrite and polish the article, retyping any pages with the interlined references.

It is a good idea to put the whole article away for a week and then reread it critically. Ask one of your friends to read it and to mark questionable places.

This is the stage at which you may do any last-minute literature work. You can add references easily now. You can rearrange divisions and subdivisions of the text with the accompanying references.

If there are large numbers of changes and additions it is best to retype the manuscript, again making two copies.

- 4. The carbon copy from Step 3 above is used to prepare the bibliography. The references are cut apart from the text with shears and the strips arranged alphabetically according to the authors' names and clipped or pasted to sheets of paper. Duplicate references are deleted. The alphabetized list is then numbered sequentially. This list is then retyped, making two copies and showing the proper number before each reference.
- 5. The proper reference numbers are now written in on the revised typed copy prepared in Step 3. This copy still has the authors' names and references in the text; hence they are easily located by referring to the alphabetical list. Reference numbers are always placed in parentheses and on the same line as the text in Chemical Reviews. After inserting the reference numbers, cross out the references on this copy, and retype it with the reference numbers but without the references, again making two copies. The original of this plus the retyped alphabetized reference list should be sent to the Editor. Keep the carbon copy and the original hand-written copy until you have checked the galley proof of your article. The proof should be checked against this original copy to eliminate errors.