

GUIDE FOR AUTHORS

Introduction

Types of paper

Matter and Radiation at Extremes (MRE) publishes papers that meet the following criteria:

- being within the scope of MRE,
- containing significant new research contributions of the highest intellectual caliber,
- providing strong evidence for the conclusions,

given that the papers have not been submitted, copyrighted, nor accepted for publication elsewhere. Also, clarity of presentation is a major criterion for acceptance.

Article types and requirements

The journal publishes **Regular Articles**, **Review Articles** and **Letters**. There is no maximum word limit for these three types of papers, provided that the papers present significant new research contributions clearly, properly and concisely. However, review articles are required to be no less than 10 pages excluding the references and appendix, and are accepted for review after prior consultation with the Editor-in-Chief.

Before You Begin

Ethics in Publishing

For information on Ethics in Publishing and Ethical guidelines for journal publication see <http://www.elsevier.com/publishingethics> and <http://www.elsevier.com/ethicalguidelines>.

Conflict of interest

All authors are requested to disclose any actual or potential conflict of interest including any financial, personal or other relationships with other people or organizations within three years of beginning the submitted work that could inappropriately influence, or be perceived to influence, their work. See also <http://www.elsevier.com/conflictsofinterest>.

Submission declaration

Submission of an article implies that the work described has not been published previously (except in the form of an abstract or as part of a published lecture or academic thesis), that it is not under consideration for publication elsewhere, that its publication is approved by all authors and tacitly or explicitly by the responsible authorities where the work was carried out, and that, if accepted, it will not be published elsewhere including electronically in the same form, in English or in any other language, without the written consent of the copyright-holder.

Changes to authorship

This policy concerns the addition, deletion, or rearrangement of author names in the authorship of accepted manuscripts:

Before the accepted manuscript is published in an online issue: Requests to add or remove an author, or to rearrange the author names, must be sent to the Journal Manager from the corresponding author of the accepted manuscript and must include: (a) the reason the name should be added or removed, or the author names rearranged and (b) written confirmation (e-mail, fax, letter) from all authors that they agree with the addition, removal or rearrangement. In the case of addition or removal of authors, this includes confirmation from the author being added or removed. Requests that are not sent by the corresponding author will be forwarded by the Journal Manager to the corresponding author, who must follow the procedure as described above. Note that: (1) Journal Managers will inform the Journal Editors of any such requests and (2) publication of the accepted manuscript in an online issue is suspended until authorship has been agreed.

After the accepted manuscript is published in an online issue: Any requests to add, delete, or rearrange author names in an article published in an online issue will follow the same policies as noted above and result in a corrigendum.

Copyright

Upon acceptance of an article, authors will be asked to complete a 'Journal Publishing Agreement'. Acceptance of the agreement will ensure the widest possible dissemination of information. An e-mail will be sent to the corresponding author confirming receipt of the manuscript together with a 'Journal Publishing Agreement' form or a link to the online version of this agreement.

Permission of the society is required for resale or distribution outside the institution and for all other derivative works, including compilations and translations (please consult mre@caep.cn). If excerpts from other copyrighted works are included, the author(s) must obtain written permission from the copyright owners and credit the source(s) in the article.

Open access

Every peer-reviewed research article appearing in this journal will be published open access. This means that the article is universally and freely accessible via the internet in perpetuity, in an easily readable format immediately after publication.

All articles will be published under the following license: Creative Commons Attribution-NonCommercial-NoDerivs (CC BY-NC-ND). For non-commercial purposes, this license lets others distribute and copy the article, and to include in a collective work (such as an anthology), as long as they credit the author(s) and provided they do not alter or modify the article.

The author does not have any publication charges for open access for the first two years.

Role of the funding source

You are requested to identify who provided financial support for the conduct of the research and/or preparation of the article and to briefly describe the role of the sponsor(s), if any, in study design; in the collection, analysis and interpretation

of data; in the writing of the report; and in the decision to submit the paper for publication. If the funding source(s) had no such involvement then this should be stated. Please see <http://www.elsevier.com/funding>.

Language and language services

Please write your text in good English (American or British usage is accepted, but not a mixture of these). Authors who require information about language editing and copyediting services pre- and post-submission please visit <http://webshop.elsevier.com/languageediting> or our customer support site at <http://support.elsevier.com> for more information.

Submission

Please currently submit your article via mre@caep.cn (email titled "manuscript for MRE") and the Elsevier Journal Submission Systems (EVISE) will be available soon for manuscripts to be submitted totally online.

Once the roll-out of EVISE has been completed, use the following guidelines to prepare your article. Via the homepage of this journal (www.journals.elsevier.com/matter-and-radiation-at-extremes) you will be guided stepwise through the creation and uploading of the various files. The system automatically converts source files to a single Adobe Acrobat PDF version of the article, which is used in the peer-review process. Please note that even though manuscript source files are converted to PDF at submission for the review process, these source files are needed for further processing after acceptance. All correspondence, including notification of the Editor's decision and requests for revision, takes place by e-mail and via the author's homepage, removing the need for a hard-copy paper trail. If you are unable to provide an electronic version, please contact the editorial office prior to submission (e-mail: mre@caep.cn)

Additional Information

Tables and figures may be presented with captions within the main body of the manuscript; if so, figures should additionally be uploaded as high resolution files.

Preparation

Use of wordprocessing software

It is important that the file be saved in the native format of the wordprocessor used. The text should be in single-column format. Keep the layout of the text as simple as possible. Most formatting codes will be removed and replaced on processing the article. In particular, do not use the wordprocessor's options to justify text or to hyphenate words. However, do use bold face, italics, subscripts, superscripts etc. When preparing tables, if you are using a table grid, use only one grid for each individual table and not a grid for each row. If no grid is used, use tabs, not spaces, to align columns. The electronic text should be prepared in a way very similar to that of conventional manuscripts (see also the Guide to Publishing with Elsevier: <http://www.elsevier.com/guidepublication>). Note that source files of figures, tables and text graphics will

be required whether or not you embed your figures in the text. See also the section on Electronic illustrations.

To avoid unnecessary errors you are strongly advised to use the "spell-check" and "grammar-check" functions of your wordprocessor.

LaTeX

If the LaTeX file is suitable, proofs will be produced without rekeying the text. The article should preferably be written using Elsevier's document class "elsarticle", or alternatively any of the other recognized classes and formats supported in Elsevier's electronic submissions system, for further information see <http://www.elsevier.com/wps/find/authorsview.authors/latex-ees-supported>.

The Elsevier "elsarticle" LaTeX style file package (including detailed instructions for LaTeX preparation) can be obtained from the Quickguide: <http://www.elsevier.com/latex>. It consists of the file: `elsarticle.cls`, complete user documentation for the class file, bibliographic style files in various styles, and template files for a quick start.

Article structure

Subdivision - numbered sections

Divide your article into clearly defined and numbered sections. Subsections should be numbered 1.1 (then 1.1.1, 1.1.2, ...), 1.2, etc. (the abstract is not included in section numbering). Use this numbering also for internal cross-referencing: do not just refer to "the text". Any subsection may be given a brief heading. Each heading should appear on its own separate line.

Introduction

State the objectives of the work and provide an adequate background, avoiding a detailed literature survey or a summary of the results.

Material and methods

Provide sufficient detail to allow the work to be reproduced. Methods already published should be indicated by a reference: only relevant modifications should be described.

Theory/calculation

A Theory section should extend, not repeat, the background to the article already dealt with in the Introduction and lay the foundation for further work. In contrast, a Calculation section represents a practical development from a theoretical basis.

Results

Results should be clear and concise.

Discussion

This should explore the significance of the results of the work, not repeat them. A combined Results and Discussion section is often appropriate. Avoid extensive citations and discussion of published literature.

Conclusions

The main conclusions of the study may be presented in a short Conclusions section, which may stand alone or form a subsection of a Discussion or Results and Discussion section.

Appendices

If there is more than one appendix, they should be identified as A, B, etc. Formulae and equations in appendices should be given separate numbering: Eq. (A.1), Eq. (A.2), etc.; in a subsequent appendix, Eq. (B.1) and so on. Similarly for tables and figures: Table A.1; Fig. A.1, etc.

Essential title page information

- **Title.** Concise and informative. Titles are often used in information-retrieval systems. Avoid abbreviations and formulae where possible. Avoid beginning with an article or a preposition. Words “new” or “novel” should be avoided in the title or the text for legal reasons. Titles may be edited by the publisher to facilitate computer search.
- **Author names and affiliations.** Author names should be given in full and consistent form to facilitate indexing, with first and middle names or initials followed by surname. Where the family name may be ambiguous (e.g., a double name), please indicate this clearly. Present the authors’ affiliation addresses (where the actual work was done) below the names. Indicate all affiliations with a lower-case superscript letter immediately after the author’s name and in front of the appropriate address. Provide the full postal address of each affiliation, including the country name, and, if available, the e-mail address of each author.
- **Corresponding author.** Clearly indicate who will handle correspondence at all stages of refereeing and publication, also post-publication. Ensure that telephone and fax numbers (with country and area code) are provided in addition to the e-mail address and the complete postal address. Contact details must be kept up to date by the corresponding author.
- **Present/permanent address.** If an author has moved since the work described in the article was done, or was visiting at the time, a “Present address” (or “Permanent address”) may be indicated as a footnote to that author’s name. The address at which the author actually did the work must be retained as the main, affiliation address. Superscript Arabic numerals are used for such footnotes.

Abstract

A concise and factual abstract is required. The abstract should be no longer than 250 words usually, and state briefly the purpose of the research, the principal results and major conclusions. An abstract is often presented separately from the article, so it must be able to stand alone. For this reason, References should be avoided, but if essential, then cite the author(s) and year(s). Also, non-standard or uncommon abbreviations should be avoided, but if essential they must be defined at their first mention in the abstract itself.

Keywords

Immediately after the abstract, provide 4~6 keywords, avoiding general and plural terms and multiple concepts (avoid, for example, ‘and’, ‘of’). Be sparing with abbreviations: only abbreviations firmly established in the field may be eligible. These keywords will be used for indexing purposes.

PACS Codes

PACS codes should be provided to help with indexing. This set of codes was formulated by the American Institute of Physics (AIP) to identify fields and sub-fields of physics. PACS is a hierarchical partitioning of the whole spectrum of subject matter in physics, astronomy, and related sciences. PACS codes are available on MRE’s web page and AIP’s main PACS website. Each manuscript must be given 2-4 PACS codes below the abstract and the principal index code should be placed first.

Abbreviations

Define abbreviations that are not standard in this field in a footnote to be placed on the first page of the article. Such abbreviations that are unavoidable in the abstract must be defined at their first mention there, as well as in the footnote. Ensure consistency of abbreviations throughout the article.

Acknowledgements

Collate acknowledgements in a separate section at the end of the article before the references and do not, therefore, include them on the title page, as a footnote to the title or otherwise. List here those individuals who provided help during the research (e.g., providing language help, writing assistance or proof reading the article, etc.).

Typically, standard acknowledgments include financial support and technical assistance, and may include dedications, memorials, and awards. Please identify all appropriate funding sources by name and contract number in the last paragraph and leave a blank line space with the previous paragraph such as “This work was supported by US National Science Foundation (No. ACI 1339893), the Knowledge Innovation Program of the Chinese Academy of Sciences (No. Y1V2013L11), and the National Natural Science Foundation of China (Nos. 11374357 and 11104041)”. To indicate the author, use initials. For example, “B.A. wishes to thank A. Loudon for technical assistance. C.A. wishes to thank Any town University for use of their equipment.”

Nomenclature and units

Follow internationally accepted rules and conventions: use the international system of units (SI). If other quantities are mentioned, give their equivalent in SI. Authors wishing to present a table of nomenclature should do so on the second page of their manuscript.

Math formulae

Math formulae should be aligned to bring out their structure, and numbered consecutively in round brackets on the right-hand side of the page. Notation. Notation must be legible, clear, compact, and consistent with standard usage. In general, acronyms should be defined at first use. Variables and Vectors. Set single-letter variables in italics (Eg. *M*). Set vectors in boldface and italic (Eg. *m*). Functions, derivative “d,” abbreviations, and multi-letter identifiers should be set in roman (plain) type (Eg. α , \cos , $\int \dots dx$). Fences. For simple

bracketing the usual order of parentheses and brackets is $\{ [(([()]))] \}$. Bit and Byte. The standard abbreviations for bit and byte are b and B, respectively. To avoid confusion, these units should be spelled out in most cases (1 bit, 20 GB). Display equations should be broken and aligned for two-column display unless spanning across two columns is essential. Equations should be centered with equation numbers set flush right. For Math Type, use the Format Equations feature to format all equations as Times + Symbol 10. Note: There must be a blank line space above and below each displayed equation. Some examples are:

$$x = \frac{-b \pm \sqrt{b^2 - 4ac}}{2a} \quad (1)$$

$$I_D(\theta) = \frac{a}{2} + \sum_{n=1}^2 (\cos 2n\theta + \sin 2n\theta) \quad (2)$$

Artwork

Electronic artwork

General points

- Make sure you use uniform lettering and sizing of your original artwork.
- Save text in illustrations as “graphics” or enclose the font.
- Only use the following fonts in your illustrations: Arial, Courier, Times, Symbol.
- Number the illustrations according to their sequence in the text.
- Use a logical naming convention for your artwork files.
- Provide captions to illustrations separately.
- Produce images near to the desired size of the printed version.
- Submit each figure as a separate file.

A detailed guide on electronic artwork is available on our website: <http://www.elsevier.com/artworkinstructions>

You are urged to visit this site; some excerpts from the detailed information are given here.

Formats

Regardless of the application used, when your electronic artwork is finalised, please “save as” or convert the images to one of the following formats (note the resolution requirements for line drawings, halftones, and line/halftone combinations given below):

EPS: Vector drawings. Embed the font or save the text as “graphics”.

TIFF: color or grayscale photographs (halftones): always use a minimum of 300 dpi.

TIFF: Bitmapped line drawings: use a minimum of 1000 dpi.

TIFF: Combinations bitmapped line/half-tone (color or grayscale): a minimum of 500 dpi is required.

If your electronic artwork is created in a Microsoft Office application (Word, PowerPoint, Excel) then please supply “as is”.

Please do not:

- Supply files that are optimised for screen use (like GIF, BMP, PICT, WPG); the resolution is too low;
- Supply files that are too low in resolution;
- Submit graphics that are disproportionately large for the content.

Color artwork

Please make sure that artwork files are in an acceptable format (TIFF, EPS or MS Office files) and with the correct resolution. If, together with your accepted article, you submit usable color figures then Elsevier will ensure, at no additional charge, that these figures will appear in color on the Web (e.g., ScienceDirect and other sites) regardless of whether or not these illustrations are reproduced in color in the printed version.

An example follows:

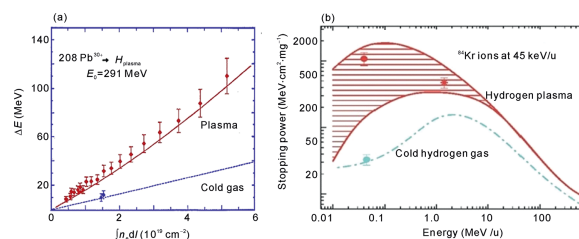


Fig.1 Calculated total transmittance with different wedged angles as a function of wavelength and thickness of substrate

Figure captions

Ensure that each illustration has a caption. Supply captions separately, not attached to the figure. A caption should comprise a brief title (not on the figure itself) and a description of the illustration. Keep text in the illustrations themselves to a minimum but explain all symbols and abbreviations used.

Tables

Number tables consecutively in accordance with their appearance in the text. Place footnotes to tables below the table body and indicate them with superscript lowercase letters. Avoid vertical rules. Be sparing in the use of tables and ensure that the data presented in tables do not duplicate results described elsewhere in the article.

The table title, which should be brief, goes above the table. Note that tables are usually typeset, not scanned (tables cannot be electronically reduced in size). An example follows:

Tab.1 Marx discharge voltage and current and deposited energy in mix gas vs. mix gas pressure when Marx charge voltage is 81 kV

P (kPa)	U_D (kV)	I_m (kA)	E_1 (kJ)
100	511	84	3.04
150	512	83	3.12
200	511	85	3.24
250	508	83	3.27

References

Citation in text

Please ensure that every reference cited in the text is also present in the reference list (and vice versa). Any references cited in the abstract must be given in full. Unpublished results and personal communications are not recommended in the reference list, but may be mentioned in the text. If these references are included in the reference list they should follow the standard reference style of the journal and should include a substitution of the publication date with either “Unpublished results” or “Personal communication” Citation of a reference as “in press” implies that the item has been accepted for publication.

Web references

As a minimum, the full URL should be given and the date when the reference was last accessed. Any further information, if known (DOI, author names, dates, reference to a source publication, etc.), should also be given. Web references can be listed separately (e.g., after the reference list) under a different heading if desired, or can be included in the reference list.

References in a special issue

Please ensure that the words ‘this issue’ are added to any references in the list (and any citations in the text) to other articles in the same Special Issue.

Reference management software

This journal has standard templates available in key reference management packages EndNote (<http://www.endnote.com/support/enstyles.asp>) and Reference Manager (<http://refman.com/support/rmstyles.asp>). Using plug-ins to wordprocessing packages, authors only need to select the appropriate journal template when preparing their article and the list of references and citations to these will be formatted according to the journal style which is described below.

Reference style

Text: Indicate references by number(s) in square brackets in line with the text. The actual authors can be referred to, but the reference number(s) must always be given.

Examples: “ ... of high power laser (such as the National Ignition Facility[3] and OMEGA[4,5]) and pulsed power technology (such as the Z machine[6-8])... ”

List: Number the references (numbers in square brackets) in the list in the order in which they appear in the text. All authors should be included in the reference list, but when the number of authors is more than five, list the first five authors and represent the rest by et al. Authors should be listed initials of given names first, and followed by surnames.

Examples:

Journal citations: Include authors, article’s full title, volume number, page number, and publication year:

[1] C. Wirth, O. Schmidt, T. Schreiber, I. Tsybin, T. Schreiber, et al., High average power spectral beam combining of four fiber amplifiers to 8.2 kW, *Opt. Lett.* 36, 3118-3120 (2011).

[2] Xun Ma, Jianjun Deng, Hongwei Liu, Jianqiang Yuan, Jinfeng Liu, et al., Development of all-solid-state flash x-ray generator with photoconductive semiconductor switches, *Review of Scientific Instruments*, 85, 093307 (2014).

[3] Wenkang Zou, Lin Chen, Dagang Liu, Le Zhang, Laqun Liu, et al., Investigation on high inductive helical supported magnetically insulated transmission line on a 10-stage linear transformer driver system, *Phys. Rev. ST Accel. Beams* 15, 110401(2012)

Books: List authors and editors. Must include publisher, city and year of publication, and the page numbers (unless the entire book is being cited).

[4] R. J. Hunter, *Zeta Potential in Colloid Science* (Academic, New York, 1981) p.120.

Conference proceedings: Include the list of authors, the title of the proceedings, the city and year of the conference, and the page numbers. Include the full list of editors, if they are given.

[5] P.Madasamy, T. Loftus, A.Thomas, P. Jones, E.Honea, et al., Comparison of spectral beam combining approaches for high power fiber laser systems, *Proc. SPIE* 695207 (2008).

Internet links

[6] A.G.Ramm, H.Wang, J.Ye, Invisible obstacles, <http://www.arxiv.org/abs/math-ph/0608034> (June 1, 2011).

Patent: Include the author, the title, patent number, Patent approval date.

[7] I.W.Smith, K.O.H. Michael, Wide-angle beam steering system, U.S. patent 7215472(8 May 2008).

Thesis/dissertation: Include the author, school, and year, and the title.

[8] Zhifu Cai, Cluter infrared background suppression technology based on adaptive estimation, Ph.D. thesis, Harbin Engineering University, Harbin, 2005

Submission checklist

The following list will be useful during the final checking of an article prior to sending it to the journal for review. Please consult this Guide for Authors for further details of any item.

Ensure that the following items are present:

One Author designated as corresponding Author:

- E-mail address
- Full postal address
- Telephone and fax numbers

All necessary files have been uploaded

- Keywords
- All figure captions
- All tables (including title, description, footnotes)

Further considerations

- Manuscript has been “spellchecked” and “grammar-checked”
- References are in the correct format for this journal
- All references mentioned in the Reference list are cited in the text, and vice versa

- Permission has been obtained for use of copyrighted material from other sources (including the Web)
- Color figures are clearly marked as being intended for color reproduction on the Web (free of charge) and in print or to be reproduced in color on the Web (free of charge) and in black-and-white in print
- If only color on the Web is required, black and white versions of the figures are also supplied for printing purposes

For any further information please visit our customer support site at <http://support.elsevier.com>.

After Acceptance

Use of the Digital Object Identifier

The Digital Object Identifier (DOI) may be used to cite and link to electronic documents. The DOI consists of a unique alphanumeric character string which is assigned to a document by the publisher upon the initial electronic publication. The assigned DOI never changes. Therefore, it is an ideal medium for citing a document, particularly 'Articles in press' because they have not yet received their full bibliographic information. The correct format for citing a DOI is shown as follows (example taken from a document in the journal *Physics Letters B*): doi:10.1016/j.physletb.2010.09.059

When you use the DOI to create URL hyperlinks to documents on the web, they are guaranteed never to change.

Proofs

One set of page proofs (as PDF files) will be sent by e-mail to the corresponding author (if we do not have an e-mail address then paper proofs will be sent by post) or, a link will be provided in the e-mail so that authors can download the files themselves. Elsevier now provides authors with PDF proofs which can be annotated; for this you will need to download Adobe Reader version 7 (or higher) available free from <http://get.adobe.com/reader>. Instructions on how to annotate PDF files will accompany the proofs (also given online). The exact system requirements are given at the Adobe site: <http://www.adobe.com/products/reader/systemreqs>.

If you do not wish to use the PDF annotations function, you may list the corrections (including replies to the Query Form) and return them to Elsevier in an e-mail. Please list your corrections quoting line number. If, for any reason, this is not possible, then mark the corrections and any other comments (including replies to the Query Form) on a printout of your proof and return by fax, or scan the pages and e-mail, or by post. Please use this proof only for checking the typesetting, editing, completeness and correctness of the text, tables and figures. Significant changes to the article as accepted for publication will only be considered at this stage with permission from the Editor. We will do everything possible to get your article published quickly and accurately – please let us have all your corrections within 48 hours. It is important to ensure that all corrections are sent back to us in one communication: please check carefully before replying, as inclusion of any subsequent corrections cannot be guaranteed. Proofreading is solely your responsibility. Note that Elsevier may proceed with the publication of your article if no response is received.

Offprints

The corresponding author, at no cost, will be provided with a PDF file of the article via e-mail. For an extra charge, paper offprints can be ordered via the offprint order form which is sent once the article is accepted for publication. The PDF file is a watermarked version of the published article and includes a cover sheet with the journal cover image and a disclaimer outlining the terms and conditions of use.

More information about article offprint is available here: <http://webshop.elsevier.com/>

Author Inquiries

You can track your submitted article at <http://www.elsevier.com/track-submission>. You can track your accepted article at <http://www.elsevier.com/trackarticle>. You are also welcome to contact Customer Support via <http://support.elsevier.com>.