

See discussions, stats, and author profiles for this publication at: <https://www.researchgate.net/publication/231235918>

Synthesis and Characterization of Soluble Iron Oxide–Dendrimer Composites

ARTICLE *in* CHEMISTRY OF MATERIALS · MAY 2001

Impact Factor: 8.35 · DOI: 10.1021/cm010125i

CITATIONS

134

READS

12

6 AUTHORS, INCLUDING:



Jeff Bulte

Johns Hopkins University

319 PUBLICATIONS **14,778** CITATIONS

SEE PROFILE



Kannan Vivekanandan

Roche

11 PUBLICATIONS **313** CITATIONS

SEE PROFILE



Trevor Douglas

Indiana University Bloomington

230 PUBLICATIONS **9,636** CITATIONS

SEE PROFILE

Preparation of Manuscripts

(Revised May 2015)

Contents (*click on the topic*)

Submission of Manuscripts – ORCID | **Manuscript Preparation** – Communications – Articles, Reviews, and Perspectives – Journal Publishing Agreement – Conflict of Interest Disclosure – Funding Sources – Professional Ethics – Author List – Assistance with English Language Editing – Illustrations – References – Reference Format – Text – Tables | **Table of Contents/Abstract Graphic** | **Guidelines for Reporting the Properties of Devices** | **Crystal Structure Reports** – Crystal Structure Studies – Crystallographic Data – Powder Diffraction Data – Corrections | **Supporting Information** | **Journal Cover Illustrations** – General Requirements | **Proofs, On-line Publication, and Reprints** – Patent Activities and Intellectual Property Issues – Just Accepted Manuscripts – Galley Proofs – ASAP Publication – Citing by DOI – ACS Policies for E-prints and Reprints – *ACS AuthorChoice* Open Access

Submission of Manuscripts

All manuscripts are to be submitted electronically via the ACS Paragon Plus Environment (<http://paragonplus.acs.org/login>). Complete instructions and an overview of the electronic online (web) submission process are available through the secure ACS Paragon Plus Web site. Authors must also submit all revisions of manuscripts via the ACS Paragon Plus Environment. The web submission site employs state-of-the-art security mechanisms to ensure that all electronically submitted papers are secure. These same security mechanisms are also utilized throughout the peer-review process, permitting access only to editors and reviewers who are assigned to a particular paper.

A manuscript template is available for several word processing packages at the journal's homepage (<http://pubs.acs.org/page/cmatex/submission/authors.html>). Complete instructions for submittal of manuscripts and supporting information, including the platforms and word processing packages supported, are available on the general submission site (<http://paragonplus.acs.org>).

ORCID

All authors are encouraged to register for an ORCID iD, a unique researcher identifier. With this standard identifier, you can create a profile of your research activities to distinguish yourself from other researchers with similar names and make it easier for your colleagues to find your publications. Learn more at <http://www.orcid.org>.

Authors and reviewers can add their ORCID iD to, or register for an ORCID iD from, their account in ACS Paragon Plus. Submitting authors have the option to provide existing ORCID iDs for coauthors during submission, but they cannot create new ORCID iDs for coauthors.

Manuscript Preparation

Communications

Authors who submit Communications are required to use one of the word-processing templates. Use of the template will ensure proper formatting and will facilitate the placement of graphics in the manuscript. It will allow authors and editors to accurately estimate the length of Communications at submission and will eliminate delay of shortening to the four page limit at the page proof stage.

Articles, Reviews, and Perspectives

The following order of presentation is preferred in an Article, Review, and Perspective:

- Title page
- Abstract
- Introduction
- Experimental Section
- Results
- Discussion (these last two sections may be separate or combined, depending on the clarity and conciseness of presentation)
- Conclusions
- Acknowledgement (if needed)
- Supporting Information description (if needed)
- References
- Table of Contents/Abstract graphic
- Biographies (Perspectives only)

Schemes, tables and figures, with their captions, should be inserted as close as possible to their first reference in the text to facilitate review of the manuscript. The Article or Communication word-processing template available on the journal website will facilitate the embedding of Tables and Figures, and either of these templates can be used for submission of Reviews and Perspectives.

Pages must be numbered consecutively, beginning with the title page and ending with the figures. Figures, tables, charts, and schemes should be numbered with Arabic numerals.

Journal Publishing Agreement

A properly completed and signed Journal Publishing Agreement must be submitted for each manuscript. ACS Paragon Plus provides an electronic version of the Agreement that will be available on the **My Authoring Activity** tab of the Corresponding Author's Home page once the manuscript has been assigned to an Editor. A PDF version of the Agreement is also available, but **Authors are strongly encouraged to use the electronic Journal Publishing Agreement.** If the PDF version is used, **all pages of the signed PDF Agreement must be submitted.** If the Corresponding Author cannot or should not complete either the electronic or PDF version for any reason, another Author should complete and sign the PDF version of the form. Forms and complete instructions are available at <http://pubs.acs.org/page/copyright/journals/index.html>.

Conflict of Interest Disclosure

A statement describing any financial conflicts of interest or lack thereof is published with each manuscript. During the submission process, the corresponding author must provide this statement on behalf of all authors of the manuscript. The statement should describe all potential sources of bias, including affiliations, funding sources, and financial or management relationships, that may constitute conflicts of interest (please see the [ACS Ethical Guidelines](#)). The statement will be published in the final article. If no conflict of interest is declared, the following statement will be published in the article: “The authors declare no competing financial interest.”

Funding Sources

When submitting a manuscript to the Journal via ACS Paragon Plus, the submitting author is asked to identify the funding sources for the work presented in the manuscript. Identifying funding sources is optional during submission of an original manuscript. Funding source information is required when a revised manuscript is submitted.

Professional Ethics

In publishing only original research, ACS is committed to deterring plagiarism, including self-plagiarism. ACS Publications uses CrossCheck's iThenticate software to screen submitted manuscripts for similarity to published material. Note that your manuscript may be screened during the submission process. Further information about plagiarism can be found in Part B of the [Ethical Guidelines to Publication of Chemical Research](#).

Author List

During manuscript submission, the submitting author must provide contact information (full name, email address, institutional affiliation and mailing address) for all of the co-authors. Because all of the author names are automatically imported into the electronic Journal Publishing Agreement, the names must be entered into ACS Paragon Plus in the same sequence as they appear on the first page of the manuscript. (Note that co-authors are not required to register in ACS Paragon Plus.) The author who submits the manuscript for publication accepts the responsibility of notifying all co-authors that the manuscript is being submitted. Deletion of an author after the manuscript has been submitted requires a confirming letter to the Editor-in-Chief from the author whose name is being deleted. For more information on ethical responsibilities of authors, see the [Ethical Guidelines to Publication of Chemical Research](#).

Assistance with English Language Editing

Authors may want to have their manuscripts edited professionally before submission to improve clarity. The ACS ChemWorx English Editing Service can assist you in improving and polishing the language in your manuscript. You can learn more about the services offered, at <http://es.acschemworx.acs.org>.

Illustrations

Illustrations should be inserted into the manuscript following the Web instructions for manuscript preparation.

Quality. The quality of the graphics in the journal depends on the quality of the originals provided by the author. Figures cannot be modified or enhanced by the journal production staff.

To facilitate the publication process, please submit manuscript graphics using the following guidelines:

- The preferred submission procedure is to embed graphic files in a Word document. It may help to print the manuscript on a laser printer to ensure all artwork is clear and legible.
- Additional acceptable file formats are: TIFF, PDF, EPS (vector artwork) or CDX (ChemDraw file). If submitting individual graphic files in addition to them being embedded in a Word document, ensure the files are named based on graphic function (i.e. Scheme 1, Figure 2, Chart 3), not the scientific name. Labeling of all figure parts should be present and the parts should be assembled into a single graphic.

EPS files: Ensure that all fonts are converted to outlines or embedded in the graphic file. The document settings should be in RGB mode. **NOTE:** *While EPS files are accepted, the vector-based graphics will be rasterized for production.* Please see below for TIFF file production resolutions.

- TIFF files (either embedded in a Word doc or submitted as individual files) should have the following resolution requirements:
 - Black & White line art: 1200 dpi
 - Grayscale art (a monochromatic image containing shades of gray): 600 dpi
 - Color art (RGB color mode): 300 dpi

The RGB and resolution requirements are essential for producing high-quality graphics within the published manuscript. Graphics submitted in CMYK or at lower resolutions may be used; however, the colors may not be consistent and graphics of poor quality may not be able to be improved.

Most graphic programs provide an option for changing the resolution when you are saving the image. Best practice is to save the graphic file at the final resolution and size using the program used to create the graphic.

- Graphics should be sized at the final production size when possible. Original illustrations that do not need to be reduced to fit a single or double column will yield the best quality. Single column graphics are preferred and can be sized up to 240 points wide (3.33 in.). Double column graphics must be sized between 300 and 504 points (4.167 in. and 7 in.). All graphics have a maximum depth of 660 points (9.167 in.) including the caption (please allow 12 pts for each line of caption text). **For efficient use of journal space, single-column illustrations are preferred.**

Consistently sizing letters and labels in graphics throughout your manuscript will help ensure consistent graphic presentation for publication. Lettering should be no smaller than 4.5 points. (Helvetica or Arial type works well for lettering.) Lines should be no thinner than 0.5 point. Lettering and lines should be of uniform density. If you submit artwork that must be reduced, use larger lettering and thicker lines so that when reduced, the artwork meets the above-mentioned

parameters. Avoid using complex textures and shading to achieve a three-dimensional effect. To show a pattern, choose a simple cross-hatch design.

- A graphic should be submitted for use in the Table of Contents and Abstract. This graphic should give the reader a quick visual representation of the essence of the paper without providing specific details. The best images for these uses are simple, relatively free of text and technical characters, and make use of color for visual impact.
- For more information, please visit <http://pubs.acs.org/page/4authors/submission/index.html>

Color. Color reproduction, if approved by the Editor, will be provided at no cost to the author. Color illustrations should only be submitted if essential for clarity of communication. A surcharge of \$100 per 100 reprints will be added to the standard cost of reprints. Do not submit color versions of illustrations to be printed in black and white.

Chemical Structures. Structures should be produced with the use of a drawing program such as ChemDraw. Structure drawing preferences (preset in the ACS Style sheet in Chem Draw) are as follows:

(1) As drawing settings select:

chain angle	120°
bond spacing	18% of width
fixed length	14.4 pt (0.508 cm, 0.2 in.)
bold width	2.0 pt (0.071 cm, 0.0278 in.)
line width	0.6 pt (0.021 cm, 0.0084 in.)
margin width	1.6 pt (0.056 cm, 0.0222 in.)
hash spacing	2.5 pt (0.088 cm, 0.0347 in.)

(2) As text settings select:

font	Arial/Helvetica
size	10 pt

(3) Under the preferences choose:

units	points
tolerances	5 pixels

(4) Under page setup choose:

Paper	US Letter
Scale	100%

Authors using other drawing packages should, insofar as possible, modify their program's parameters so that they reflect the above guidelines.

Graphics Files. Graphics should be submitted as "TIFF" images and have the following minimum resolution requirements:

Black and white line art 1200 dpi

Grayscale art	600 dpi
Color art	300 dpi

Consult the documentation in your graphics application for more information on how to save your files in this format. The filename for each graphic should be descriptive of the content graphic, for example, figure 1 for Figure 1, scheme 1 for Scheme 1, etc.

References

In the Web edition of this journal, references will be linked to various electronic sources (e.g., the corresponding abstract from Chemical Abstracts Service, full text from other American Chemical Society journals, etc.); therefore, the accuracy of the references is critical. Authors are responsible for the accuracy of the references.

References to the literature should be numbered in one consecutive series in the text. Each literature reference should be assigned one number and placed in the text as a superscript arabic numeral. The complete list of references should be double-spaced beginning on a separate page after the Acknowledgment and following the format illustrated below (see [The ACS Style Guide](#), 3rd ed. (2006), available from Oxford University Press, Order Department, 201 Evans Road, Cary, NC 27513, for further details concerning the preparation of manuscripts and the format for tables, figures, and references). Footnotes to the text should be combined with references and numbered in ordinal sequence. If the identities of the authors' institutions are not obvious from the heading of the manuscript, use symbols or numbers separate from the reference/footnote list for clarification.

As of spring of 2015, all references should include the title of the paper being cited and the full page range.

Reference Format:

(1) Hollander, J. M.; Jolly, W. L. X-ray Photoelectron Spectroscopy. *Acc. Chem. Res.* **1970**, 3, 193–199.

(2) Smith, A. B. *Textbook of Chemistry*; American Chemical Society: Washington, DC, 1973.

Text

Authors should write in clear, concise English and should follow the style and layout recommended in [The ACS Style Guide](#). All nomenclature must be consistent, clear, and unambiguous and should conform with current American usage. Insofar as possible, authors should use systematic names similar to those used by Chemical Abstracts Service and the International Union of Pure and Applied Chemistry. Chemical Abstracts (CA) nomenclature rules are described in Appendix IV of the *Chemical Abstracts Index Guide*. In general, trade names should be avoided. For CA nomenclature advice, consult the Manager of Nomenclature Services, Chemical Abstracts Service, P.O. Box 3012, Columbus, OH 43210-0012. A name generation service is available for a fee through CAS Client Services, 2540 Olentangy River Road, P.O. Box 3343, Columbus, OH 43210-0334. Telephone: (614) 447-3870. Fax: (614) 447-3747. E-mail: answers@cas.org. Do not insert spaces before punctuation. Ensure that all

characters are correctly represented throughout the manuscript: for example, 1 (one) and l (ell), 0 (zero) and O (oh), x (ex) and × (times sign). Check the final copy carefully for consistent notation and correct spelling. The Editorial Office conversion program will faithfully translate any errors to the typeset copy. Ensure that all special characters (e.g., Greek characters, math symbols, etc.) are present in the body of the text as characters and not as graphic representations. Consult the documentation for the specific software package being used on how to detect the presence of graphics in the files and replace them with the appropriate text characters. Tables may be created using a word processor's text mode or table format feature. The table format feature is preferred. Ensure each data entry is in its own table cell. If the text mode is used, separate columns with a single tab and use a line feed (return) at the end of each row.

[Currently acceptable word processing packages](http://pubs.acs.org/page/4authors/submission/index.html) are provided on the Web. The latest submission instructions can be found at <http://pubs.acs.org/page/4authors/submission/index.html>.

Tables

Tables should be used when they present information more effectively and efficiently than running text. Column heads should be as small as possible. Columns should contain three or more entries.

Table of Contents/Abstract Graphic

A graphic is required for each manuscript for the Table of Contents (TOC). This graphic should be placed on the last page of the manuscript upon submission of the paper. The TOC/abstract graphic should capture the reader's attention and, in conjunction with the manuscript title, should give the reader a quick visual impression of the essence of the paper without providing specific results. The graphic submitted for use on the Table of Contents is used for multiple purposes, including the document abstract and other situations where a representative graphic is required. The TOC graphic should be in the form of a structure, graph, drawing, SEM/TEM photograph, or reaction scheme. Some of the best images are simple, relatively free of text and technical characters, and make use of color for visual impact. It is best to stay away from complex structure schemes and small-sized details. The author must submit a graphic in the actual size to be used for the TOC that will fit in an area 1.875 in. high and 3.3 in. wide (4.8 cm × 8.5 cm). Larger images will be reduced to fit within those dimensions. Type size of labels, formulas, or numbers within the graphic must be legible. Tables or spectra are not acceptable.

More information can be found here:

http://pubs.acs.org/userimages/ContentEditor/1218639294411/cmatex_tocguide.pdf.

Guidelines for Reporting the Properties of Devices (e.g., solar cells, batteries, capacitors, etc.)

A large number of papers received by *Chemistry of Materials* include, or are focused on, devices made with new or modified known materials. Authors need to consider basic standards for the information provided about device properties that extends beyond what is usually reported for papers reporting classical bulk materials properties. Typical devices include but are not limited to those reporting photovoltaic, semiconductor transport and gain behavior, luminescence, or performance as thermoelectric, battery and capacitor materials.

Statistics about device properties are required in order to consider a paper beyond initial editorial review. Authors are asked to include the following when writing their manuscript:

- (i) The number of devices examined and the range of results. This can be conveyed in bar graphs (histograms) to represent data for a statistically meaningful number of samples, or could be reported as a specific number of samples with an accompanying specified standard deviation.. The journal will not accept a single result that appears to be the best obtained. It is important to emphasize typical results and the degree of variation so that reviewers and future readers can assess reproducibility, and hence the validity, of the work.
- (ii) Sufficient experimental data to reproduce the results and enable valid comparisons with other work. Manuscripts that report devices must provide additional important characteristics beyond those above to enable comparison with prior work by the authors or others. For example, efficiency depends on, but is not limited to, the area and architecture of a photovoltaic device; such parameters should be included in the manuscript, either in the main body or supporting information.
- (iii) Careful attention must be given to significant figures of experimental results. The final result cannot exceed the precision of the measurement with the smallest number of significant figures.

Crystal Structure Reports

(A) Crystal Structure Studies

Crystal structure reports should only be submitted if the structure is an essential part of the article. If the structure is not included with the submission, however, the author should include a footnote indicating where detailed results can be found. If a crystal structure is an essential part of the manuscript, the author is **required** to make the structural data available for the review process and to notify the Editor that structural data accompanies the manuscript. Authors **must** provide an electronic copy of the structural data in Crystallographic Information File (CIF) format.

(1) Structure Reports (in Articles)

(a) Experimental Data. Every effort should be made to minimize the quantity of tabular material appearing in the manuscript text. The collection of data and refinement usually are routine, and a concise description generally is sufficient. The following data should be included as a table in the main body of the manuscript: crystal dimensions, crystal system, space group, unit cell dimensions and volume, ρ_{calc} , $2\theta_{\text{max}}$, radiation, wavelength, scan mode, temperature of measurement, number of measured and independent reflections, number of reflections included in the refinement, σ limits, whether absorption corrections were performed (μ , min/max transmission), method of structure solution and program, method of refinement and program, number of parameters, treatment of H atoms, R , wR , whether refined against $|F|$ or $|F_2|$, residual electron density, and

the database at which the detailed results are deposited. Tabulations of fractional coordinates generally will not be printed in the text; however, authors should provide this information as part of the crystal structure report supplied for Supporting Information. Authors of papers containing single crystal XRD studies are strongly encouraged to provide powder XRD data (see below) on bulk samples to confirm that the single crystal structure is representative of the entire sample. A clear statement of this result should be provided in the manuscript text.

(b) Tabular Material. For the manuscript text, tables of refined atomic coordinates, bond lengths, and angles (with esd's), should be restricted to only the most significant values. Complete listings of refined atomic coordinates, including those of all peripheral atoms and/or atoms of counterions not playing a significant role in the structure, and bond lengths and angles should be deposited as Supporting Information. Generally, atomic coordinates will not be published as part of the manuscript. Authors are strongly encouraged to use the Crystallographic Information File (CIF) format.

(c) Figures. Drawings of crystal or molecular structures should be made with the noncrystallographer in mind. For structures refined anisotropically, ellipsoid plots are preferred to ball-and-stick drawings. Stereoscopic pairs of perspective drawings and unit cell and packing diagrams should not be included in the printed text unless they are absolutely necessary for the discussion. These drawings, however, can be deposited as Supporting Information.

(2) Abbreviated Structure Reports (in Communications and Articles). In a Communication or in the case where a structure study plays a supporting role in a full paper devoted to another principal objective, a good molecular or unit cell diagram should appear as a figure. A few significant distances and angles should be placed in the figure caption or in a short table. All other information which would otherwise be included in a Structure Report should be in Supporting Information, preferably deposited as a CIF.

(B) Crystallographic Data

Supplementary X-ray data should be provided in the Supporting Information section of the manuscript (see section on **Supporting Information**). The CIF when prepared with a standard set of crystallographic analysis programs will include: complete information on collection of data and refinement of the structure in tabular form; final values of all refined atomic coordinates (with esd's) including all calculated atomic coordinates (especially calculated positions for hydrogen atoms and positions of atoms calculated from refinement of rigid groups); all anisotropic thermal parameters, which should be provided as U_{ij} 's or B_{ij} 's, rather than β_{ij} 's; and all nonessential bond lengths and angles. Common problems found with CIFs include incorrect absorption connection, space group and crystal size information. The CIF should be examined and corrected by authors prior to submission. Authors are encouraged to check the quality of their CIFs through the checkCIF website of the International Union of Crystallography (<http://checkcif.iucr.org>). In addition to the crystallographic data supplied in the CIF, other information such as least-squares planes and atomic deviations therefrom, closest intermolecular contacts including items such as details of intermolecular hydrogen bonding, unit cell and packing diagrams stylized to emphasize packing information and drawn with right-handed axes

should be deposited in PDF format as Supporting Information. Submission of the structure factor table(s) is not required, but authors should be prepared to submit a copy of the structure factor table(s) if it is requested during the review process. The structure factor table(s) will not be deposited and the authors are requested to retain a copy (which should list h , k , l , F_o , F_c , and $\sigma|F_o|$ values) for at least 2 years, so that it can be consulted should any questions concerning the published structure arise. A suitable paragraph should appear at the end of the manuscript enumerating the contents of the Supporting Information.

As part of the Supporting Information, authors **must** provide an electronic copy of the structural data as a Crystallographic Information File (CIF) and must **clearly** notify the Editor in the cover letter that the manuscript contains structural data. (See the journal homepage for further instructions.) Authors must confirm that the data in the CIF file correspond to the structures reported in the manuscript. During the review process, the CIFs will be available only to the reviewers of the manuscript and will remain confidential. Authors should note that the ACS does not forward coordinates to crystallographic databases such as the Fachinformationszentrum Karlsruhe (FIZ) or the Cambridge Structural Database (CSD). This is the responsibility of the author.

(C) Powder Diffraction Data

The presentation of X-ray powder diffraction data for new materials or for materials previously uncharacterized by this technique is encouraged. Data from X-ray powder measurements should be accompanied by details of the experimental technique: the radiation, its wavelength, filters or monochromators, camera diameter, the type of X-ray recording, and the technique for estimating intensities. In cases of an unindexed listing of the data, the d spacings of all observed lines should be listed in sequence, together with their relative intensities. In cases where filtered radiation is used, every effort should be made to identify residual β lines. Where resolution into α_1 – α_2 doublets occurs, the identification of the d spacing for each line as $d\alpha_1$, $d\alpha_2$ gives a measure of the quality of the photograph. When an indexing of the data is offered, the observed and calculated $1/d^2$ values should be listed side by side along with the observed relative intensities (it is superfluous to give d spacings in this instance). All calculated $1/d^2$ values should be listed (exclusive of systematic absences), to the limit of the data quoted. If possible, the crystal system should be specified. Possible space groups may also be listed if the data warrant it. Relevant information about the specimen used should be included.

(D) Corrections

Errors discovered in published structure reports should be communicated directly to the corresponding author of the work. The Editor should be kept informed by a copy of such correspondence. Upon verifying the error, the author or authors should submit a suitable correction to the Editor without delay, carrying an acknowledgment of the colleagues who brought the matter to their attention.

Supporting Information

Supporting Information must be submitted at the same time as the manuscript and uploaded separately to the ACS Paragon Plus Environment. A [list of acceptable file types](#) is available on the Web. All Supporting Information files of the same type should be prepared as a single file (rather than submitting a series of files containing individual images or structures). For example, all Supporting Information available as PDF files should be contained in one PDF file.

DO NOT UPLOAD FIGURES AND TABLES THAT ARE TO BE PUBLISHED IN THE ARTICLE INTO THE SUPPORTING INFORMATION FILE.

Material deposited as Supporting Information is considered to be part of the publication and should not be submitted for republication as part of a future paper.

When a paper contains Supporting Information, a statement of availability is required at the end of the manuscript. The following are examples using the preferred format:

“Supporting Information Available: Brief statement in nonsentence format listing the contents of the material supplied as Supporting Information. This material is available free of charge via the Internet at <http://pubs.acs.org>.”

“Supporting Information Available: Synthetic schemes for **1** and **2**, 400 MHz ^1H NMR spectra of **4** and of **4** in the presence of 1 equiv of 3,5-lutidine, and X-ray structural information on **3** and **5** (PDF). An X-ray crystallographic file (CIF). This material is available free of charge via the Internet at <http://pubs.acs.org>.”

“Supporting Information Available: Tables of crystal data, structure solution and refinement, atomic coordinates, bond lengths and angles, and anisotropic thermal parameters for **5**, $[\mathbf{5}][\text{AlCl}_4]_2$, **6**, and $[\mathbf{6}][\text{AlCl}_4]_2$ (PDF). This material is available free of charge via the Internet at <http://pubs.acs.org>.”

“Supporting Information Available: Force field parameters, a FORTRAN program for evaluating the bending potential, Z matrices for compounds **1–5**, and Cartesian coordinates for structures **6–10** (ASCII). Discussion of how the phosphorous parameters were obtained (PDF). This material is available free of charge via the Internet at <http://pubs.acs.org>”.

Journal Cover Illustrations

General Requirements

Authors of all papers are encouraged to submit one or more illustrations for consideration for use on the front cover of the journal, but authors of **Reviews** will be given special consideration. These illustrations should be submitted in color and pertain to the subject matter of the paper.

In addition to the scientific content, considerations of design and visual appeal as a cover illustration will play an important role in the selection of illustrations. A brief, descriptive caption (about 25 words) that will appear at the beginning of the Table of Contents is also needed. Once submitted by the author, the final version, if published, is at the discretion of the Editor-in-Chief. Once an illustration is selected for use on the cover, authors will be asked to provide a digital version of the image. The following guidelines are provided:

Digital Image Guidelines for Cover Graphics. Contact acsjournalscovers@acs.org for further details.

Vector-Based Images. This kind of image is generated with the use of a drawing program. Since vector-based images are resolution independent, the main concern for this

type of graphic is file format. **File Format.** All vector-drawn images should be supplied in EPS format. Macintosh FreeHand EPS (with original Freehand file included) or Macintosh Illustrator EPS files are preferred. **Size.** Since vector-drawn graphics are scalable, there is no size requirement. The ACS recommends that images be made at the size they are expected to appear when published, if the size is known. **Color.** Create colors as CMYK builds. Send a CMYK color proof.

Embedded Images. If any images are imported or embedded into the EPS file, you need to include originals of all images along with the final EPS file (follow guidelines for pixel-based images if necessary for these files). **Requirements:** format, EPS; color, CMYK builds; other, supply all embedded images separately.

Pixel-Based Images. This kind of image is typically generated with a scanner or by an application (such as Photoshop) to produce a bitmap or pixel image. The main concerns for producing pixel based artwork for use in print are file format and resolution. **File Format and Resolution.** All pixel-based images should be supplied in TIFF format at a resolution of 300 dots per inch (dpi). (If you cannot send TIFF, use JPEG at the highest quality setting.) Photoshop TIFF files for the Macintosh are preferred. **Size.** Send pixel-based artwork with the image sized as large as possible (8.5 in. wide minimum recommended). **Color.** Save in CMYK mode and send a CMYK color proof. CMYK is required for 4-color print production. (We can adapt RGB files if you are unable to create CMYK, but be aware that it is impossible to match RGB colors exactly when converting to CMYK—especially bright greens and bright blues.) **Requirements:** format, TIFF (or JPEG); resolution, 300 dpi minimum; color, CMYK.

Proofs, On-line Publication and Reprints

Patent Activities and Intellectual Property Issues

Authors are responsible for ensuring that all patent activities and intellectual property issues are satisfactorily resolved prior to first publication (Just Accepted, ASAP, or in issue). Acceptance and publication will not be delayed for pending or unresolved issues of this nature.

Just Accepted Manuscripts

Just Accepted manuscripts are peer-reviewed, accepted manuscripts that are posted on the ACS Publications website prior to technical editing, formatting for publication, and author proofing, usually within 30 minutes to 24 hours of acceptance by the editorial office. During the manuscript submission process, Authors can choose to have their manuscript posted online as a *Just Accepted* manuscript. When authors choose to do so, the *Just Accepted* manuscript is considered the first publication of the paper. To ensure rapid delivery of the accepted manuscript to the Web, Authors must adhere carefully to all requirements in the journal's Author Guidelines. For further information, please refer to the *Just Accepted* FAQ, accessible from <http://help.acs.org>. Note that publishing a manuscript as *Just Accepted* is not a means by which to comply with the [NIH Public Access Mandate](#).

Galley Proofs

The corresponding author of an accepted manuscript will receive e-mail notification and complete instructions when page proofs are available for review via a secure Web site. Authors will access the secure site through ACS ChemWorx and will need an ACS ID. To obtain an ACS ID

or to reset your password, go to www.acschemworx.org. Proofs should be checked with utmost care against the manuscript (in particular, all tables, equations, and formulas). Routine rephrasing of sentences or additions are not permitted at the page proof stage. Alterations should be restricted to serious changes in interpretation or corrections of data. Extensive or important changes on page proofs, including changes to the title or list of authors, are subject to Editorial review. All corrections, revisions, and additions must be listed with their location clearly identified. Instructions for submittal of revised artwork are provided in the instructions received with the proof. It is the responsibility of the corresponding author to ensure that all authors listed on the manuscript agree with the changes made on the proofs. Galley proofs should be returned within 48 h of receipt in order to ensure timely publication of the manuscript. No paper is released for publication until the author's proof has been received.

ASAP Publication

Accepted manuscripts will be published on the "Articles ASAP" page on the Journal Web site as soon as page proofs are corrected and all author concerns are resolved. Publication on the Web usually occurs within 1 to 4 working days of receipt of page proof corrections, and this can be anywhere from 3 to 6 weeks in advance of the cover date of the issue. Manuscripts assigned to a special issue often remain published ASAP for several months. Authors should take this schedule into account when planning intellectual and patent activities related to a manuscript. Once a manuscript appears on the Web, it is published. For papers that were not published as *Just Accepted* manuscripts, this is the first publication. Any change after ASAP publication must be considered additions or corrections. The actual date on which an accepted paper is published on the Web is recorded on the Web version of the manuscript and on the first page of the PDF version.

Citing by DOI

For work published online (*Just Accepted* or ASAP) and work submitted for publication (e.g., submitted; in press), the DOI should be furnished in addition to the standard bibliographic information. Authors are given instruction for citing work by DOI in an email communication when manuscript proofs are made available. A DOI is assigned to each manuscript and should be in the form <http://dx.doi.org/10.1021/cm000000a> or <http://dx.doi.org/10.1021/acs.chemmater.0a00000>. DOI is an accepted form of citation before and after the article appears in an issue.

ACS Policies for E-prints and Reprints

Under the [ACS Articles on Request policy](#), the Society will provide (free of charge) to all contributing authors a unique URL within the ACS Web site that they may e-mail to colleagues or post on external Web sites. These author-directed links are designed to facilitate distribution of an author's published work to interested colleagues in lieu of direct distribution of the PDF file by the author. The ACS Articles on Request policy allows 50 downloads within the first year after Web publication and unlimited access via the same author-directed links 12 months after Web publication.

When authors are sent the proof of their paper, they will receive a link to a website where they may order paper reprints. They may also call Cierant Corporation at 866-305-0111 from 9AM to 5PM EST. Reprints will be shipped within two weeks after the issue publication date. Neither the Editors nor the Washington ACS Office keeps a supply of reprints; requests for single copies of papers should be addressed to the corresponding author of the paper concerned.

ACS AuthorChoice Open Access

[ACS AuthorChoice](#) options establish fee-based mechanisms for authors or their research funding agencies to sponsor the open availability of final published articles on the Web. ACS *AuthorChoice* offers authors a wide range of open access license options, such as Creative Commons licenses and provisions for immediate or 12-month embargoed open access, and includes [ACS Certified Deposit](#). Authors will find useful information about compliance with open access policies available [here](#) and FAQs [here](#). Corresponding authors who published with ACS during 2014 may have access to [ACS Author Rewards](#), a \$60M stimulus program ACS provided to help authors transition to new open access publishing models.

Authors must sign the Journals Publishing Agreement. Forms and complete instructions are available [here](#). After acceptance, authors will be presented with the opportunity to purchase an *ACS AuthorChoice* option, and authors who do so will be presented with the appropriate license at that time. For a review of all license options available, see [here](#). For questions or further assistance with *ACS AuthorChoice*, please reach out to support@services.acs.org.

Notice: Documents accepted for publication in ACS Journals will be posted in the World Wide Web edition of the journal as soon as they are ready for publication, that is, when galley proofs are corrected and all author concerns are resolved. This can occur anywhere from 2 to 11 weeks in advance of the cover date of the printed issue. The actual date on which the document is published on the Web is recorded in a separate line at the bottom of the first page of the document.

Please conform to these instructions when submitting manuscripts. This document will be updated periodically to reflect changes in manuscript submission and handling procedures. Authors may download the [latest version](#) from the [journal Web site](#).