# Article title should be less than 17 words, no acronyms

Author One, 1 Author Two, 1 Author Three, 1 Author Four, 2, a) and Author Five 3, b)

<sup>1)</sup> Department1, University1, City, State ZipCode, Country

<sup>2)</sup> Department2, University2, City, State ZipCode, Country

<sup>3)</sup> Department3, University3, City, State ZipCode, Country

(Dated: 13 May 2021)

Put your abstract here. Abstracts are limited to 200 words for regular articles and

100 words for Letters to the Editor. Please no personal pronouns, also please do not

use the words "new" and/or "novel" in the abstract. An article usually includes an

abstract, a concise summary of the work covered at length in the main body of the

5 article.

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a) author.four@university.edu

b) Also at: Department, University, City, State ZipCode, Country.

#### 6 I. INTRODUCTION

- This sample document demonstrates the use of JASA in manuscripts prepared for sub-
- mission to the Journal of the Acoustical Society of America.
- See JASA-TeXGuide.pdf, which is part of this package, for extensive documentation on
- using commands for JASA.
- You can compare the .tex version of this file with the resulting .pdf version to give you
- an idea of what commands are available and how they work. At the top of the .tex file
- you'll find a listing of the document class options, and an explanation of their results. Some
- <sup>14</sup> additional suggestions are included in the body of this manuscript.
- Beginner Latex users should refer to their favorite online documentation. A useful place
- to start is the primer from the TeX Users Group https://www.tug.org/twg/mactex/
- 17 tutorials/ltxprimer-1.0.pdf
- EXAMPLE TEXT: This is example text. This is example text. This is example text.
- This is example text. This is example text. This is example text. This is example text. This
- 20 is example text. This is example text. This is example text. This is
- 21 example text. This is example text. This is example text. This is
- 22 example text.
- The paper is organized as follows: Section II presents initial information, while Section III
- 24 presents examples of mathematical expressions.

# **FIGURE**

FIG. 1. Caption here.

Note: The only figure formats allowed are the following: .pdf, .ps, .eps, or .jpg. (.tiff is not recommended for use with LaTeX)

Figure files must be named in this fashion: Figure#.xxx, where "#" is the figure number and "xxx" is the file format (Figure1.eps, Figure2.jpg, Figure3a.eps, Figure3b.eps, etc).

However, you do not need to enter the file format for figures.

[For these sample pages we have used only figsamp.jpg for convenience]

#### 25 II. SAMPLE SECTION

- An example of another first-level Section with following example text that refers to sub-
- 27 sections using \ref{subsec:XXX} ... EXAMPLE: Some background in section II and details
- in subsection II A.

### 29 A. Sample subsection

#### 30 1. Sample subsubsection

- 31 a. Sample paragraph. Here is text following the paragraph heading. Here is a figure
- reference: is shown in Fig. 1.

#### 3 III. INLINE AND DISPLAY MATH SAMPLES

# A. Tip: How to keep line numbers from disappearing above some math commands

Due to complications involving the many packages used in this style, occasionally line numbers will disappear in the paragraph above certain math commands, as you can see in the present paragraph.

$$2x - 5y = 8 \tag{1}$$

$$3x + 9y = -12 (2)$$

You can fix this by typing \linenomath before the math command, which will allow the

numbering to continue in the paragraph before the math, as you see in the present paragraph:

$$2x - 5y = 8 \tag{3}$$

$$3x + 9y = -12 (4)$$

37 Another line here.

#### B. Math and equations $\alpha\beta\Delta\Gamma$

- Inline math may be typeset using the \$ delimiters. (Authors: Remember to surround
- 40 your math with the \$ delimiters. A missing dollar sign is a common cause for errors.)
- Bold math symbols may be achieved using the bm package and the \bm{#1} command
- 42 it supplies. For instance, a bold  $\alpha$  can be typeset as  $\sum_{\alpha}$  giving  $\alpha$ . Fraktur
- 43 and Blackboard (or open face or double struck) characters should be typeset using the
- 44 \mathfrak{#1} and \mathbb{#1} commands respectively. Both are supplied by the amssymb

- package which is called in JASA, so you don't need an \usepackage{amssymb} command
- in your .tex file. For example,  $\mathbf{S}$  gives  $\mathbb{R}$  and  $\mathbf{S}$  gives  $\mathfrak{G}$ .
- In LATEX there are many different ways to display equations; a few preferred ways are 47
- noted below. Displayed math will center by default. 48
- Below we have numbered single-line equations; this is the most common type of equation. 49

$$\chi_{+}(p)[2|\mathbf{p}|(|\mathbf{p}|+p_{z})]^{-1/2} \begin{pmatrix} |\mathbf{p}|+p_{z} \\ px+ip_{y} \end{pmatrix},$$

$$\left\{1234567890abc123\alpha\beta\gamma\delta1234556\alpha\beta\frac{1\sum_{b}^{a}}{A^{2}}\right\}.$$
(5)

$$\left\{1234567890abc123\alpha\beta\gamma\delta1234556\alpha\beta\frac{1\sum_{b}^{a}}{A^{2}}\right\}.$$
 (6)

- Note the open one in Eq. (6).
- Not all numbered equations will fit within a narrow column this way. The equation 51 number will move down automatically if it cannot fit on the same line with a one-line equation.

$$\chi_{+}(p)[2|\mathbf{p}|(|\mathbf{p}|+p_{z})]^{-1/2}\chi_{+}(p)[2|\mathbf{p}|(|\mathbf{p}|+p_{z})]^{-1/2}\alpha\beta\gamma\delta123455678\alpha\beta\Gamma\Delta\frac{1\sum_{b}^{a}}{A^{2}}1234abcd1234$$
(7)

- When the \label{#1} command is used [ie. input for Eq. (6)], the equation can be referred to in text without knowing the equation number that T<sub>F</sub>X will assign to it. Just use 55  $\mathbf{ref}$  (#1), where #1 is the same name that used in the  $\mathbf{label}$  (#1) command.
- Unnumbered single-line equations can be typeset using the [, ] format: 57

$$g^+g^+ \to g^+g^+g^+g^+\dots$$
,  $q^+q^+ \to q^+g^+g^+\dots$ 

Note the equations can be lettered with the subequations environment:

$$A = mc, (8a)$$

$$B = mc^2, (8b)$$

$$C \gtrsim mc^3$$
. (8c)

<sup>59</sup> Referenced: Eqs. (8a), (8b), and (8c).

# 60 IV. FLOATS, FIGURES AND TABLES

- Figures and tables are typically "floats" which means that their final position is deter-
- mined by LATEX while the document is being typeset. LATEX isn't always successful in placing
- floats optimally. Use the figure\* environment to get a wide figure that spans the page in a
- 64 two-column layout.

#### 65 A. Tables that use \ruledtabular

- Tables generally should be surrounded with \begin{ruledtabular}...\end{ruledtabular}
- 67 This will guarantee that they are the width of the page or column, and have two ruled lines
- at the top and bottom of the table.
- Footnotes in a table are labeled a, b, c, etc. They can be specified by using the LATEX
- 70 \footnotemark[] and \footnotetext[] commands.
- Note: Square brackets are used for the arguments of \footnotemark and \footnotetext.
- The footnotes for a table are typeset at the bottom of the table, rather than at the
- bottom of the page or at the end of the references. The arguments for \footnotemark[]
- and \footnotetext[] should be numbers 1, 2, ... The journal style will convert these to

- 75 letters.
- This system allows multiple entries to refer to the same footnote.
- [ht] in the code below instructs LATEX to place the table where it appears in type, if it will fit on the page; otherwise put it on the top of the next page.

TABLE I. A table with more columns still fits properly in a column. Note that several entries share the same footnote. Inspect the LATEX input for this table to see exactly how it is done.

	$r_c \ ( ext{Å})^{ ext{a}}$	$r_0 \ (\mathring{\mathrm{A}})$	$\kappa r_0$		$r_c$ (Å)	$r_0$ (Å)	$\kappa r_0$
Cu	0.800	14.10	2.550	$\mathrm{Sn^a}$	0.680	1.870	3.700
Ag	0.990	15.90	2.710	$\mathrm{Pb^b}$	0.450	1.930	3.760

<sup>&</sup>lt;sup>a</sup> Here's the first.

81

## B. Plain Tables: When NOT to use 'ruledtabular'

- There are a number of cases when 'ruledtablar' should not be used: basically for any table using complex content or commands.
  - 1.  $Using \setminus multicolumn$
- When you'd like to use the multicolumn command in your table, you'll find that 'ruledtab-
- <sub>86</sub> ular' will cause bad formatting. In that case, Don't Use Ruledtabular, and instead put in
- Name has a the top and bottom of the table.

<sup>&</sup>lt;sup>b</sup> Here's the second.

TABLE II. A table made without 'ruledtabular' needs to have two hlines added to the top and bottom of the table.

- On the next page you will see a rotated table. The commands to rotate your table are
- % \begin{rotatetable}...\end{rotatetable}
- You will not need to use \begin{table}...\end{table} within these commands.

<sup>&</sup>lt;sup>a</sup> This is the first table note.

<sup>&</sup>lt;sup>b</sup> This is the second table note.

<sup>&</sup>lt;sup>c</sup> This is the third table note.

TABLE. III. This is an example of sidewaystable which will allow a wide table to fit on the page even if it is wider than the normal text.

We can see where this caption wraps when it is a wide caption.

$\kappa r_0$	3.700
$r_0$ (A)	1.870
$r_c$ (A) $r_0$ (A)	0.680
$\kappa r_0$	$14.10 \ 2.550 \ \mathrm{Sn}^a \ 0.680 \ 1.870 \ 3.700$
$r_0 \; (\mathrm{A})$	14.10 2
$r_c (\mathrm{A})^a r_0 (\mathrm{A})$	Cu 0.800
	Cu

Ag 0.990 15.90 2.710 Pb<sup>b</sup> 0.450 1.930 3.760 Au 1.150 15.90 2.710 Ca<sup>c</sup> 0.750 2.170 3.560

<sup>a</sup>This is the first table note.

 $^{b}$ This is the second table note.

<sup>c</sup>This is the second table note.

# 2. Using the \adjustbox{} (tabular)\end{adjustbox} command

- There may be times when the table is too wide, or you want to have the table be the
- width of the page, whether or not it appears in preprint or reprint version of JASA. In this
- ose you can use \begin{adjustbox}{<width>} (tabular) \end{adjustbox}. ('adjust-
- box' will NOT work with 'ruledtabular')
- You can set a maximum width with
- % \begin{adjustbox}{max width=\textwidth}(tabular)\end{adjustbox}
- in which case the table in the reprint version might be less than the full text width;
- Or you can set the exact width you'd like with
- begin{adjustbox}{width=\textwidth}(tabular)\end{adjustbox}
- in which case the table will be the full width of the page in either preprint or reprint.
- This way you can make a table that will fit in the correct width whether you are using the preprint or reprint option.

TABLE IV. Top 5 rated  $\widehat{\text{ITD}}$  estimation methods according to the sum and product metric criteria for  $\pm 0.5$  JND and  $\pm 1$  JND tolerance thresholds (normalized scores).

Rank #	sum criteria [±0.5	JND]	sum crite	eria [±1 .	JND]	product criteria [±0	).5 JND]	product criteria [±1	JND]
1	Threshold –30dB lp	(0.43)	Threshold	-30dB lp	(0.71)	Threshold –30dB lp	(1.00)	Threshold –30dB lp	(1.00)
2	MaxIACCe lp	(0.39)	Threshold	–20dB lp	(0.66)	MaxIACCe lp	(0.39)	Threshold –20dB lp	(0.57)
3	Threshold –20dB lp	(0.38)	CenIACCr	bb	(0.62)	CenIACCr lp	(0.33)	CenIACCr bb	(0.37)
4	CenIACCr lp	(0.37)	MaxIACCe	e lp	(0.61)	Threshold –20dB lp	(0.29)	MaxIACCe lp	(0.34)
5	Cen- $e^2$ lp	(0.34)	CenIACCe	lp	(0.61)	Cen- $e^2$ lp	(0.10)	CenIACCr lp	(0.33)

# C. Using dcolumn

The call to \usepackage{dcolumn} is included in JASA.cls so you don't need to add it ex-plicitly. http://anorien.csc.warwick.ac.uk/mirrors/CTAN/macros/latex/required/ tools/dcolumn.pdf will give you detailed information. A gentler introduction may be found in this informative and well illustrated article: https://www.tug.org/pracjourn/ 2007-1/mori/mori.pdf, starting on page 20. (You may want to look at more examples in this quite comprehensive article on making tables in LATEX.) "If we do not want to break the fractional and the integral part in two columns, the dcolumn package provides a new type of column 

D{sep -in}{sep -out}{ before.after}

The first argument {sep-in} is the symbol used in the .tex document to separate the integral and the fractional part (usually the decimal point . or the decimal comma ,), the second argument {sep-out} is the symbol that we want in the output, the third is the number of digits on the left (before) and on the right (after) this symbol. The numbers are aligned to the decimal point and, in case that the third argument is negative, the decimal point is aligned to the center of the column. If the columns have a heading, it must be inserted into the command \multicolumn{1}{c}{...}

124 An example using dcolumn:

- 126 {\hsize= 2in
- 128 \begin{ruledtabular}
- 130 \begin{tabular}{cD {,}{.}{5.4}}
- 132 Expression
- & \multicolumn  $\{1\}\{c\}\{$  Value  $\}\setminus$

- 133 \hline
- 136 \$\pi\$

& 3,1416

\\

- 138 \$\pi^{\pi}\$
- & 36,46

\\

- 130 \$\pi^{\pi^{\pi}}\$
- **&** 80662,7

//

- 142 \end{tabular}
- \end{ruledtabular}
- 145 }

Expression	Value
$\pi$	3.1416
$\pi^{\pi}$	36.46
$\pi^{\pi^{\pi}}$	80662.7

#### $_{147}$ V. USING LONGTABLE FOR A TABLE THAT CONTINUES OVER PAGES

\usepackage{longtable} is included in the JASA.cls, giving you access to the commands 148 for making a table that continues over pages. Here is the syntax for longtable: 149 \begin{center} %% Optionally center table with \begin{center} ...\end{center} 150 \begin{longtable}{} 153 \caption{} %% optional caption %% Everything between here and \endfirsthead will be used for 156 %% column headers for the first page of the table. 159 <your first header here> 160 \endfirsthead 163 %% Everything between here and \endhead will be used for 164 %% column headers for the all the following pages of the table. 168 <your header for continuing pages here> \endhead 170 % Everything between here and \endfoot will be used for footers on every 173 %% page of the table except for the final one: ie, 175 \hline \multicolumn{3}{|r|}{{Continued on next page}} \\ \hline 176 \endfoot 179 %% Everything between here and \endlastfoot will be used for 180 %% bottom of the table on its final page: ie, 183 \hline \hline 185 \endlastfoot 186 %% Enter contents of the table here: 189 Table Text %% Then end table with 193 \end{longtable} 195 \end{center}

An example Long Table follows. Be sure to use two ruled lines (\hline \hline) to start and end the table, to match the JASA table style.

TABLE V: A sample long table.

First column	Second column	Third column
And	So	On

(Continued on next page)

 $TABLE\ V-{\it Continued\ from\ previous\ page}$ 

First column	Second column	Third column
And	So	On
$\operatorname{And}$	So	On
And	So	On
And	So	On
And	So	On

# A. A long table with rotated column heads

TABLE VI: Longtable sample, table that continues over pages, and in this case, rotates column heads.

Bin Interval Lower Bound	Bin Interval Upper Bound	Histogram	Expected	Cumulative Distribution	$\chi^2$ -Value
1000	1003,99	102	100	102	0,04
1004	1007,99	105	100	207	0,25
1008	1011,99	104	100	311	0,16
1012	1015,99	104	100	415	0,16
1000	1003,99	102	100	102	0,04
1004	1007,99	105	100	207	0,25
1008	1011,99	104	100	311	0,16
1012	1015,99	104	100	415	0,16

### B. Sample Figures, new commands available in this style

Note that the publisher determines the final layout, so your choice of figure alignment may not be reflected in the published article.

\figline{} will center one or more figures on one line.

```
\fig{<name of file>}{<width>}{<letter to put underneath>}
\leftfig{<name of file>}{<width>}{<letter to put underneath>}
\rightfig{<name of file>}{<width>}{<letter to put underneath>}
\boxedfig{<name of file>}{<width>}{<letter to put underneath>}
\rotatefig{<degrees of rotation>}{<name of file>}{<width>}
\{cletter to put underneath>}
\{cletter to put underneath>}
\}
```

If you don't want a letter beneath any of these \fig... environments, please remember to supply {}, ie, \fig{<name of file>}{<width>}{}

The following illustrations show these commands in use.

```
\figline{\fig{figsamp}{3cm}{(a)}
\fig{figsamp}{3cm}{(b)}}
\figline{\fig{figsamp}{3cm}{(c)}
\fig{figsamp}{3cm}{(d)}}
\figline{\fig{figsamp}{3cm}{(e)}}
```

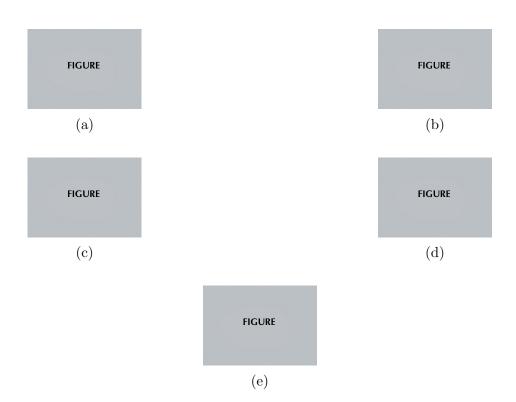


FIG. 2. Multiple images on one figure example (a) image 1, (b-f) ( $\rho$ =1000 kg/m<sup>3</sup>) and speed of sound (c=1500 m/s).

```
\figline{\boxedfig{figsamp}{2in}{(a)}}
\figline{\leftfig{figsamp}{2in}{(b)}\rightfig{figsamp}{2in}{(c)}}
\figline{\rotatefig{90}{figsamp}{2in}{(d)}\rotatefig{180}{figsamp}{2in}{(e)}}
```

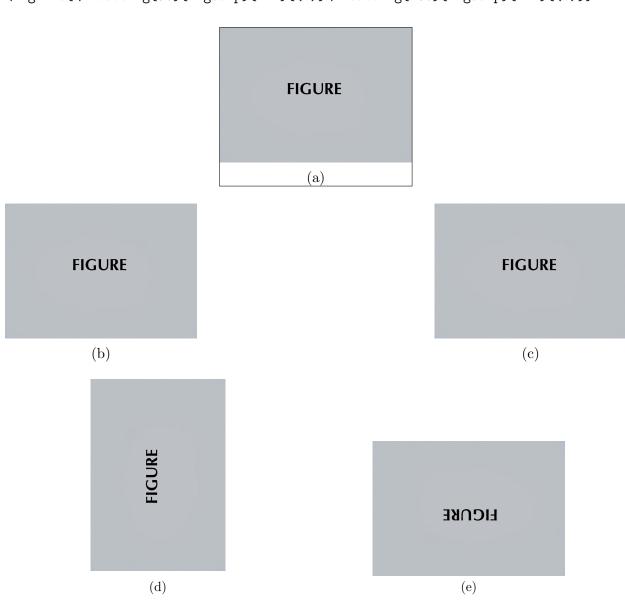


FIG. 3. More figure examples: (a) boxedfig, (b)leftfig; (c)right fig; (d) rotatefig 90 degrees; (e) rotatefig 180 degrees.

#### 202 VI. LABELS IN FIGLINE

- We can label and reference separate parts of the figure when using figline. The reference
- will give the illustration letter as well as the figure number.
- To label figures used in \figline{} type in your label immediately after the \fig{}{}{}
- 206 command, inside the argument to figline. For example:
- 20% \figline
- The same placement should be used for all the kinds of fig environments used in
- 212 \figline{}:
- $_{218} fig{}{}{}\$  \label{}, \rightfig{}{}\label{}, \rightfig{}\label{}, \rightfig{}\label{}\label{}, \rightfig{}\label{}, \rightfig{}\label{}, \rightfig{}\
- 216 \boxedfig{}{}\label{}, \rotatefig{}{}\label{},
- 218 \caption{}{}\label{}.

```
\label{lossedfigfigsamp} $$ \left(a\right)\leq \left(b\right) $$ \end{figLetter} $$
\figline{\leftfig{figsamp}{2in}{(b)}
\rightfig{figsamp}{2in}{(c)}\label{rightfigLetter}}
\figline{\rotatefig{90}{figsamp}{2in}{(d)}
\rotatefig{180}{figsamp}{2in}{(e)}\label{rotatefigLetter}}
                                        FIGURE
                                           (a)
         FIGURE
                                                                       FIGURE
                                                                          (c)
            (b)
                                                               EICORE
                     (d)
                                                                 (e)
```

FIG. 4. More figure examples, showing how to enter \label{} command.

References:\ref{boxedfigLetter},\ref{rightfigLetter},\ref{rotatefigLetter} which produces References: 4(a),4(c),4(e)

\sidebysidefigures{figsamp}{Describing the first illustration.}/{figsamp}{Describing the second illustration.}

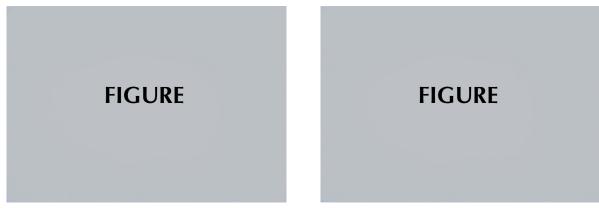


FIG. 5. Describing the first illustration.

FIG. 6. Describing the second illustration.

```
\figcolumn{
\fig{figsamp}{.2\textwidth}{(a)}
\fig{figsamp}{.2\textwidth}{(b)}
\fig{figsamp}{.2\textwidth}{(c)}
}
```

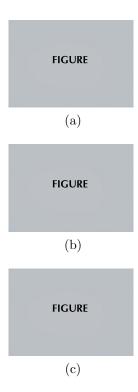


FIG. 7. Here are some stacking figures in a single column. The \figcolumn{} command works equally well in single or double column figures.

```
\begin{nofloatfigure}
229
   \centering
222
   \includegraphics[width=2in]{figsamp}
223
   \caption{\label{nofloatcaption}
225
   The commands
228
   {\tt\string\begin\string{nofloatfigure\string}...
239
                 \string\end\string{nofloatfigure\string}}\\
    allows this caption to {\bf continues across pages or columns!}
238
236
   This is a caption in a no float figure. It is designed to continue
238
   across columns or pages if it is particularly long. This is a caption
239
   that will continue across pages if necessary. This is a caption that
242
   will continue across pages if necessary. This is a caption that will
243
   continue across pages if necessary. {\bf End of caption that started
   on the previous page.}
248
259
   }
252
   \end{nofloatfigure}
```

# **FIGURE**

255

FIG. 8. The commands \begin{nofloatfigure}...\end{nofloatfigure}

257 allows this caption to continues across pages or columns! This is a caption in a no float figure.

258 It is designed to continue across columns or pages if it is particularly long. This is a caption that

will continue across pages if necessary. This is a caption that will continue across pages if necessary.

- 260 This is a caption that will continue across pages if necessary. End of caption that started on
- the previous page.

#### 262 VII. ALGORITHM EXAMPLE

- JASA.cls includes \usepackage{algorithm2e}, \usepackage{algorithmic}, and
- 264 \usepackage{algcompatible}.
- Below is an example of \begin{algorithmic}...\end{algorithmic} used within
- begin{algorithm}...\end{algorithm}. Note that the commands that are printed in
- bold are all entered with all caps in the code.

ALGORITHM 1: Sample code is shown using the algorithmic commands without numbering.

```
\begin{aligned} & \text{if } i \geq maxval \text{ then} \\ & i \leftarrow 0 \\ & \text{else} \\ & \text{if } i + k \leq maxval \text{ then} \\ & i \leftarrow i + k \\ & \text{end if} \end{aligned}
```

Algorithm 2: Sample code is shown using the algorithmic commands with numbering, by following algorithmic with [1], ie, (\begin{algorithmic}[1]).

```
1: if i \ge maxval then

2: i \leftarrow 0

3: else

4: if i + k \le maxval then

5: i \leftarrow i + k

6: end if

7: end if
```

- Documentation for the algorithm2e commands is found at
- http://tug.ctan.org/macros/latex/contrib/algorithm2e/doc/algorithm2e.pdf
- Documentation for the algorithmics commands is found at
- 277 http://tug.ctan.org/macros/latex/contrib/algorithmicx/algorithmicx.pdf
- A description of options for the algorithm bundle found here:
- 279 http://ctan.math.utah.edu/ctan/tex-archive/macros/latex/contrib/algorithms/
- 280 algorithms.pdf

## A. Example of multimedia entry

- Please note that this is for multimedia intended to appear inline within the published article.
- Here is what a multimedia entry will look like:
- Mm. 1. Corresponding pulse-compressed echo envelopes and video recordings from a fluttering luna moth. Echoes from the wings and body of the moth generally dominate the
  acoustic returns, which vary greatly over consecutive ensonifications across the wingbeat
  cycle. File of type "mp4" (15.3 MB)
- Here we cross reference the multimedia entry: The multimedia above is Mm. 1.

# B. Supplementary Material

290

ASA prefers that authors to submit related/relevant article files as supplementary material with their submission.

### C. Supplementary material for publication

293

303

- Any archival supplemental materials to be published with the manuscript (eg., supplementary figures) should be cited in-text and a footnote provided.
- An example of reference to supplementary material:
- The sound files and videos for this and other figures are included as supplementary materials<sup>1</sup>.
- The contents of the footnote above will appear at the beginning of the bibliography made
  with BibTeX when the default 'author-year' documentclass option is used; BibTeX output
  will have the footnote interleaved with other references if the NumberedRefs documentclass
  option is used.

### D. File naming conventions

- Here are the conventions for naming files:
- Supplementary Figure or Supplementary Figure or Text files should be named: Supp-Pub#.xxx, where "#" is a number and "xxx" is the file format extension (Supp-Pub1.docx, SuppPub2.jpg, etc)
- Supplementary Multimedia files: SuppPubmm#.xxx, where "#" is a number and

  "xxx" is the file format extension (SuppPubmm1.mp3, SuppPubmm2.gif, etc)
- Multimedia files must be named accordingly: MM#.xxx, where "#" is the number and "xxx" is the file format extension (MM1.wav, MM2.avi, etc).
  - The only figure formats allowed are the following: .pdf, .ps, .eps, or .jpg. Figure files

may be named in this fashion: Figure#.xxx, where Figure# is the file name and "xxx" is the file extension. (Figure1.eps, Figure2.jpg, Figure3a.eps, Figure3b.eps, etc).

#### 315 VIII. CONCLUSION

And in conclusion...

#### 317 ACKNOWLEDGMENTS

This research was supported by ...

#### 319 IX. APPENDICES

To start the appendix, use the \appendix command. This signals that all following section commands will produce appendixes instead of regular sections.

Therefore, the \appendix command should be used only once—to set up the section commands to act as appendices. Subsection and subsubsections are not changed from normal subsection and subsubsection commands.

# $Making\ Multiple\ Appendices$

325	Every \section command after \appendix will produce a new appendix with a new
326	appendix letter:
327	APPENDIX A: ONE OF MULTIPLE APPENDICES
328	1. Here is subsection
329	$a.  Here \ is \ subsubsection$
330	APPENDIX B: ANOTHER APPENDIX
331	Notice that the equation will use the letter for the current appendix:
	$t = -\frac{1}{\bar{\chi}_{\beta}} \frac{\sin^2 \phi}{\cos \bar{\theta}} + t_h \tag{B1}$
	$Appendix\ without\ a\ title$
333	To make an appendix without a title, after \appendix use . For example,
335	\appendix
336	
338	will produce:

APPENDIX A

# Subsection or subsubsection in an appendix

# 1. A subsection in an appendix

Note the equation numbers in this appendix, produced with the subequations environment:

$$E = mc, (A1a)$$

$$E = mc^2, (A1b)$$

$$E \gtrsim mc^3$$
. (A1c)

### 343 a. A subsubsection in an appendix

References for subequations: they turn out to be Eqs. (A1a), (A1b), and (A1c).

## 2. Labels should go AFTER appendix title

This will work:

345

- 348 \section{Testing}
- 359 \label{app:testing}
- This will not:
- 353 \section{Testing\label{app:testing}}

# Only one appendix? use \appendix\*

- If there is only one appendix, then the letter "A" should not appear. This is suppressed
- by using the star version of the appendix command (\appendix\* in the place of \appendix).
- Since this is a single appendix, the first \section{} command after \appendix\* will
- make an appendix heading. However, after the first section, \section will not produce the
- word 'Appendix', but will be a plain section head.
- Here are examples of single appendices that are not lettered.

# Single appendix with title

#### APPENDIX: SINGLE APPENDIX

1. Here is subsection

361

- 362 a. Here is subsubsection
- All of the equations in the single appendix will use the letter 'A':

$$t = -\frac{1}{\bar{\chi}_{\beta}} \frac{\sin^2 \phi}{\cos \bar{\theta}} + t_h \tag{A1}$$

# Single appendix without title

#### 364 APPENDIX

365

1. Here is the topic of this appendix

# Sample appendix figure and table

Figure and table numbering are continuous through the article, and handled the same as
they are in the rest of the article.

FIGURE

FIG. 9. Figure in an appendix.

369 370

TABLE VII. Here is the caption for a table in an appendix.

one	two	three	four
С	D	E	F

371

## Footnotes

The contents of the footnotes will appear at the beginning of the bibliography when
BibTeX produces the .bbl file using the default AuthorYear style; interleaved with other
references if NumberedRefs option:

375 \documentclass[preprint,NumberedRefs]{JASA}

and BibTeX has been used.

This example show where this cite (Hollman, 1997) will appear in the bibliography, depending on whether we use default author-year style or call for the NumberedRefs docu-

- mentclass option.
- This example shows how to cite author correctly:
- The recent work of Shera (2001a) show that
- is better than
- The recent work of Shera (Shera, 2001a) show that...
- This example shows what happens when there are two references to the same author and same year, Shera (2001a) and Shera (2001b).
- Here are some sample footnotes:<sup>2,3</sup>

# Making the Bibliography Using BibTeX

- Authors are highly recommended to use BibTeX to produce their bibliographies. The
- results will be predictable and even if it might take some time to get comfortable with using
- BibTeX, in the long run it will save you endless aggravation.
- A resource for making your bibliography entries correctly is included in this package:
- ReferenceStyles.pdf. You will also find the files bibsamp1.tex/.pdf and bibsamp2.tex/.pdf
- for examples of output; and sampbib.bib for an example of how to make your .bib database
- entries.
- There are two possible bibliography styles: the default, author-year, and the optional
- style, NumberedRefs, which you would call using
- 396 \documentclass[preprint,NumberedRefs]{JASA}
- \citep{} should normally be used rather than \cite{}.
- You can also use \citet{} if it is more grammatically correct to have only the year in

- parens (note: this is used with author-year style references). \citep{bibitemName} = (bibitemName, year) or \citet{bibitemName} = bibitemName (year) Note that the citations are hyperlinked to their entries in the bibliography: 406 Normal journal cite: (Christian et al., 1984), Book reference Hollman (1997), Computer 407 language documentation: (DISPERSE, 2001). Every \citep or \citet{} will produce a citation and an entry in the bibliography. Every 409 citation must have a matching entry in the bibliography database file (\filename.bib). 410 Make your bibliography by doing: pdflatex filename, bibtex filename, pdflatex filename, 411 pdflatex filename. 412 When uploading your files to Editorial Manager, include both the .bib and the appro-413 priate .bst file (for author/year reference style: jasaauthoryear2.bst; for numerical style: 414 jasanum2.bst). Both the .bib and .bst should be uploaded as the "Manuscript (TeX or 415 Word only)" item type. Compare the results you get with 417  $\documentclass[preprint]{JASA}\ vs.\documentclass[preprint,NumberedRefs]{JASA}$ 418 419 <sup>1</sup>See Supplementary materials at [URL will be inserted by AIP] for [give a brief description of the material]. 420 <sup>2</sup>Here is the second footnote. It will appear before the beginning of the bibliography in Author-Year style 421
- <sup>3</sup>Here is a third footnote.

422

(default) or it will be interleaved with other references when using the NumberedRefs option.

424

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