

The Senior Paper Class

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1 Introduction

This document describes the class file for the senior papers in Computer Science at Pomona College. It is intended as a guide to the options and restrictions of the style. Most of the basic information can be found in the file `srpaper-sample.tex`.

2 The Underlying Class

Our format is build upon the L^AT_EX `report` class.

```
1 \LoadClass[11pt,oneside,openright,onecolumn]{report}
```

3 Error Messages

`\local@classerror` We define a generic error message for the class.

```
2 \newcommand{\local@classerror}[1]{\ClassError\classname{#1}\@ehc}
```

4 Options

There are twelve options.

`finalcopy` and `draftcopy` control the pagination. With the `finalcopy` option, the text is single spaced with each section starting on a right-hand page. The `draftcopy` option avoids blank pages by not skipping left-hand pages and puts a heading “Draft of `<date and time>`” at the top of each page. The default is `finalcopy`.

`short` is used for short papers and fragments. Use it, for example, when you are asked to submit “one chapter” of your paper. It omits most of the front matter, provides a simple title, and does not start a chapter on a new page.

`singlespace`, `onehalfspace`, and `doublespace` control the inter-line spacing. As the names indicate, `onehalfspace` and `doublespace` increase the vertical distance between lines of text. The front matter is always single-spaced. The `onehalfspace` and `doublespace` options also make the side margins smaller—and the lines correspondingly wider. The default in `draftcopy` is `doublespace`. In `finalcopy`, it is `singlespace`.

`lof` and `nolof` determine the presence of a list of figures. These options are ignored in the presence of `short`. The default is `lof`.

`lot` and `nolot` determine the presence of a list of tables. These options are ignored in the presence of `short`. The default is `lot`.

`cm` and `mathtime` are the font options. The `cm` option gives the standard Computer Modern fonts for T_EX. The `mathtime` option gives Times Roman text with matching math fonts. Special files are required for `mathtime`. Only one of the two options may be used. The default is `cm`.

The paper submitted to the department must be created with the `finalcopy` option.

With a bit of regret, we have chosen the option names `draftcopy` and `finalcopy`. We would have preferred the simpler names `draft` and `final`, but they conflict with options in some of the packages that may be used. For example, `draft` in the `listings` package suppresses output of the listings—clearly undesirable for our purposes. L^AT_EX makes it difficult to stop the propagation of options to packages, so we simply use different names.

```

3 \DeclareOption{finalcopy}{\@draftfalse
4     \let\@drafttrue\incompat@mode}
5 \DeclareOption{draftcopy}{\@drafttrue
6     \let\@draftfalse\incompat@mode}
7 \DeclareOption{short}{\@shorttrue}
8 \DeclareOption{singlespace}{\@select@spacing{singlespacing}}
9 \DeclareOption{onehalfspace}{\@select@spacing{onehalfspacing}}
10 \DeclareOption{doublespace}{\@select@spacing{doublespacing}}
11 \DeclareOption{lof}{\@loftrue
12     \let\@loffalse\incompat@lof}
13 \DeclareOption{nolof}{\@loffalse
14     \let\@lofrue\incompat@lof}
15 \DeclareOption{lot}{\@lottrue
16     \let\@lotfalse\incompat@lot}
17 \DeclareOption{nolot}{\@lotfalse
18     \let\@lotrue\incompat@lot}
19 \DeclareOption{cm}{\@select@font{}}
20 \DeclareOption{mathtime}{\@select@font{mathtime}}
```

Four global boolean values and two strings control the optional behavior and the defaults, which are `finalcopy`, `singlespace`, `lof`, `lot`, and `cm`.

```

21 \newif\if@draft      \@draftfalse
22 \newif\if@short     \@shortfalse
```

```

23 \newif\if@lof          \@loftrue
24 \newif\if@lot          \@lottrue
25 \def\@selectedspacing{}
26 \def\@select@spacing#1{
27   \gdef\@selectedspacing{#1}
28   \global\let\@select@spacing\incompat@spacing}
29 \def\@selectedfont{}
30 \def\@select@font#1{
31   \gdef\@selectedfont{#1}
32   \global\let\@select@font\incompat@font}

```

We want users to declare the options to packages directly, so we complain if an unknown option appears.

```
33 \DeclareOption*{\local@classerror{Unknown option \CurrentOption}}
```

`\incompatible@options` Incompatible options are announced by error messages.

```

34 \def\incompatible@options#1{\local@classerror{Incompatible options: #1}}
35 \def\incompat@mode{\incompatible@options{finalcopy and draftcopy}}
36 \def\incompat@spacing{\incompatible@options{singlespace, %
37   onehalfspace, and doublespace}}
38 \def\incompat@lof{\incompatible@options{lof and nolof}}
39 \def\incompat@lot{\incompatible@options{lot and nolot}}
40 \def\incompat@font{\incompatible@options{cm and mathtime}}

```

It is safe at this point to process the options.

```
41 \ProcessOptions
```

We set the font and the default line spacing now; we will use the boolean values later. The actual line spacing code is in Section 8.4.

```

42 \ifx \@selectedfont\@empty \relax
43 \else
44   \RequirePackage{\@selectedfont}
45 \fi
46 \ifx \@selectedspacing\@empty
47   \if@draft
48     \def\@selectedspacing{doublespacing}
49   \else
50     \def\@selectedspacing{singlespacing}
51   \fi
52 \fi

```

`\@if@finalns` It is handy to have a function to execute commands only in the `finalcopy`, non-short cases.

```
53 \newcommand{\@if@finalns}[1]{\if@draft\else\if@short\else#1\fi\fi}
```

5 Packages

We keep the number of required packages to a minimum. We need `alltt`, `ifthen`, and `verbatim`. It is likely that students will need `graphicx`, `url`, and perhaps

`listings`. We do not load them automatically because we want the student to be able to choose the options.

The packages that we load do not, fortunately, have any options.

```
54 \RequirePackage{alltt}
55 \RequirePackage{ifthen}
56 \RequirePackage{verbatim}
```

The `draftcopy` and wide line spacing options cause `setspace` to be loaded, in Section 8.4 below.

6 Special Words and Text

We declare the names for parts of the paper: abstract, acknowledgments, preface, references, and so on. These declarations are handy in case the names ever have to change.

As stated in the headings to the files, the language in the copyright paragraph is from `hmcthesis.cls` by Claire Connolly and Melissa O'Neill. That work, like this one, is protected by the GNU General Public License. See Section 11.

```
\abstractname
\acknowledgmentname
\prefacename
\institutionname
\subjectname
\departmentname
\submissiontext
\copyrighttext
57 \def\abstractname{Abstract}
58 \def\acknowledgmentname{Acknowledgments}
59 \def\prefacename{Preface}
60 \def\institutionname{Pomona College}
61 \def\subjectname{Computer Science}
62 \def\departmentname{Department of \subjectname}
63 \def\submissiontext{%
64 Submitted as part of the senior exercise for the degree of\
65 Bachelor of Arts in \subjectname}
66 \def\copyrighttext{%
67 The author grants Pomona College the nonexclusive right to make
68 this work available for noncommercial, educational purposes,
69 provided that this copyright statement appears on the reproduced
70 materials and notice is given that the copying is by permission of
71 the author. To disseminate otherwise or to republish requires
72 written permission from the author.}
```

The text of the copyright notice is adapted from the senior thesis class for Computer Science and Mathematics at Harvey Mudd College.

In addition to the foregoing, we use the L^AT_EX names `\contentsname`, `\listfigurename`, `\listtablename`, and `\bibname`.

7 Front Matter

The front matter was generated automatically in Version 1.00. That caused problems with other packages, whose `\AtBeginDocument` code was executed after some of the document. We now require an explicit call to `\frontmatter`, just like `\maketitle` in other classes.

For the non-`short` option, the front matter consists of a title page, an abstract, acknowledgments, a table of contents, a list of figures, and a list of tables. The title page, abstract, and contents are required; the others are optional. We consider these components first; the different format for `short` is constructed later.

7.1 Front Matter Data

The author specifies the information for the title page in the preamble. The already-existing L^AT_EX commands `\title`, `\author`, and `\date` are used. This style introduces four new commands: `\advisor`, `\abstract`, and `\acknowledgment`. They work similarly to the older commands.

The argument to the `\advisor` command must end with “advisor” or “advisors,” as appropriate.

```

\advisor
\abstract
\acknowledgment
73 \newcommand{\advisor}[1]{\gdef\@advisor{#1}}
74 \long\def\abstract#1{\gdef\@abstract{#1}}
75 \long\def\acknowledgment#1{\gdef\@acknowledgment{#1}}

```

```

\@advisor
\@abstract
\@acknowledgment
Three global values hold the advisor, abstract, and acknowledgment.
76 \gdef\@advisor{}
77 \gdef\@abstract{}
78 \gdef\@acknowledgment{}

```

```

\@title
\@author
\@date
Three other, already-existing global values hold the title, author, and date.
79 \gdef\@title{}
80 \gdef\@author{}
81 \gdef\@date{}

```

7.2 Front Matter Checking

It is always an error not to specify the title, author, and date. For the `finalcopy` version, it is an error to not specify an advisor or an abstract.

```

\frontmatter@check
82 \def\frontmatter@check{%
83   \ifx \@title\@empty \local@classerror{No title specified} \fi
84   \ifx \@author\@empty \local@classerror{No author specified} \fi
85   \ifx \@date\@empty \local@classerror{No date specified} \fi
86   \if@finalns{%
87     \ifx \@advisor\@empty \local@classerror{No advisor specified} \fi
88     \ifx \@abstract\@empty \local@classerror{No abstract specified} \fi}}

```

7.3 Title Page Layout

We modify the layout of the title page, adding some material and putting it on a separate page.

```

\@maketitle
89 \renewcommand{\maketitle}{%
90   \begin{titlepage}%
91     \begin{center}
92       \institutionname\

```

```

93 \departmentname
94 \end{center}
95 \vfill
96 \begin{center}
97 {\LARGE \@title} \\ [3em]
98 {\large \@author} \\ [1.5em]
99 {\large \@date}
100 \end{center}
101 \vfill\vfill
102 \begin{center}
103 \submissiontext \\ [0.5em]
104 \@advisor
105 \end{center}
106 \end{titlepage}%
107 \setcounter{footnote}{0}}

```

7.4 Copyright Page

The copyright notice contains a year of publication. We make the courageous assumption that the publication occurs in the same year as the date on the title page, and that the date is of the form “Month dd, yyyy.”

`\@copyrightpage`

```

108 \def\extract@year#1, #2END{#2}
109 \newcommand{\@copyrightpage}{%
110 \strut\vfill
111 \begin{center}\small
112 \begin{minipage}{0.8\normal@textwidth}
113 \setlength{\parskip}{0.5\normalbaselineskip}
114 Copyright \copyright~\expandafter\extract@year\@date END \@author
115 \par
116 \copyrighttext
117 \end{minipage}
118 \end{center}
119 \clearpage}

```

7.5 Abstract and Acknowledgments

The abstract and acknowledgments are created with the `\@frontsection` command. The heading is centered over a paragraph that is 80 percent the width of a normal page.

`\@frontsection`

```

120 \newcommand{\@frontsection}[2]{%
121 \cleardoublepage
122 \vspace*{50pt}
123 \addcontentsline{toc}{section}{#1}
124 \begin{center}
125 \begin{minipage}{0.8\normal@textwidth}
126 \setlength{\parskip}{0.5\normalbaselineskip}
127 \section*{#1}#2
128 \end{minipage}

```

```
129 \end{center}}
```

7.6 Contents Lists

The table of contents, the list of figures, and the list of tables are all constructed in the same way. They look like ordinary chapters, but appear in the table of contents as sections. There is a special check to avoid a self-referential entry for the table of contents itself.

```
\@frontlist
130 \newcommand{\@frontlist}[2]{%
131 \cleardoublepage
132 \chapter*{#2}%
133 \ifthenelse{\equal\contentsname{#2}}
134   {}
135   {\addcontentsline{toc}{section}{#2}}
136 \@starttoc{#1}}
```

7.7 Generating the Front Matter

The front matter is created with the command `\frontmatter`, which simply calls the previously-described macros in the right order. With the `finalcopy` option, it is an error to have an empty abstract.

The command `\frontmatter` also sets the hook to change the page numbering to arabic at the first (real) chapter, restores the spacing and margins, and recycles some of the space used by definitions.

```
\frontmatter
137 \newcommand{\frontmatter}{%
138 \frontmatter@check
139 \pagestyle{empty}
140 \maketitle
141 \clearpage
142 \@copyrightpage
143 \pagenumbering{roman}
144 \pagestyle{plain}
145 \@frontsection{\abstractname}{\@abstract}
146 \ifx \@acknowledgment\@empty
147 \else
148   \@frontsection{\acknowledgmentname}{\@acknowledgment}
149 \fi
150 \@frontlist{toc}{\contentsname}
151 \if@lof
152   \@frontlist{lof}{\listfigurename}
153 \fi
154 \if@lot
155   \@frontlist{lot}{\listtablename}
156 \fi
157 \cleardoublepage
158 \def\@chapter@one@hook{\pagenumbering{arabic}}
159 \clean@up
160 \restorespacing
```

```
161 \@narrowmargins}
```

7.8 Front Matter for short

`\frontmatter` We do little more than copy the form for a title heading from the `report` class.

```
162 \if@short
163 \renewcommand{\frontmatter}{%
164   \frontmatter@check
165   \@narrowmargins
166   \vskip 2em
167   \begin{center}
168     {\LARGE\@title}\@[1.5em]
169     {\large\@author}\@[1em]
170     {\large\@date}
171   \end{center}
172   \par\vskip 1.5em
173   \pagestyle{plain}
174   \thispagestyle{empty}
175   \pagenumbering{arabic}
176   \ifx \@abstract\@empty \else
177     \begin{center}
178       \textbf{\abstractname}\@[0.5\normalbaselineskip]
179       \begin{minipage}{0.8\normal@textwidth}
180         \setlength{\parskip}{0.5\normalbaselineskip}
181         \small \@abstract
182       \end{minipage}
183     \end{center}
184     \vskip 1.5em
185   \fi
186   \@clean@up
187   \restorespacing}
188 \fi
```

7.9 Cleaning Up

`\@clean@up` After the front matter has been typeset, we discard all the data that will not be used again.

```
189 \newcommand{\@clean@up}{%
190   \global\let\thanks\relax
191   \global\let\maketitle\relax
192   \global\let\@thanks\@empty
193   \global\let\@author\@empty
194   \global\let\@date\@empty
195   \global\let\@title\@empty
196   \global\let\title\relax
197   \global\let\author\relax
198   \global\let\date\relax
199   \global\let\and\relax
```



```

200 \global\let\@advisor\@empty
201 \global\let\@abstract\@empty
202 \global\let\@acknowledgment\@empty
203 \global\let\@copyrighttext\@empty
204 \global\let\@submissiontext\@empty}

```

8 Appearance

8.1 Fonts

We try to keep the fonts standard. The one concession is to modify `\bfseries` so that it makes mathematical expressions bold. That way, math in a section title is bold (if the current math fonts permit) but the same content in the table of

`\bfseries` contents is not bold.

```

205 \DeclareRobustCommand\bfseries
206     {\not@math@alphabet\bfseries\mathbf
207     \fontseries\bfdefault\selectfont
208     \boldmath}

```

8.2 Page Styles

We use the usual `plain` and `empty` page styles from L^AT_EX. With the `draftcopy` option, we modify them to have a heading. For each style, we remember the old one and construct the new style around it.

The contents of the heading is saved in `\drafthead`, so that someone could (if one wished) modify it. It is visible only in `draftcopy` mode. We would like the

```

\drafttime time to appear along with the date, so we need to create a string for the time.
\drafthead
209 \if@draft
210     \newcount\@hours
211     \newcount\@minutes
212     \@tempcnta \time
213     \@hours\@tempcnta
214     \divide \@hours 60
215     \@minutes -\@hours
216     \multiply \@minutes 60
217     \advance \@minutes \@tempcnta
218     \ifnum 0=\@hours
219         \@hours 12
220     \else \ifnum 12 < \@hours
221         \advance \@hours -12
222     \fi\fi
223     \edef\drafttime{\number\@hours:\two@digits{\@minutes}
224                 \ifnum \@tempcnta < 720 am\else pm\fi}
225     \def\drafthead{Draft of \today, at \drafttime}
226     \let\ps@empty@saved\ps@empty
227     \def\ps@empty{%
228         \ps@empty@saved

```

```

229 \def\@oddhead{\hss\textsf{\drafthead}\hss}
230 \let\@evenhead\@oddhead}
231 \let\ps@plain@saved\ps@plain
232 \def\ps@plain{%
233 \ps@plain@saved
234 \def\@oddhead{\hss\textsf{\drafthead}\hss}
235 \let\@evenhead\@oddhead}
236 \fi

```

8.3 Margins

For double and one-and-a-half spacing, we narrow the margins and widen the text. The front matter is single-spaced, so we create macros for adjusting the margins after the front matter is completed. The margin-changing commands force a pagebreak.

```

\@normalmargins
\@narrowmargins
237 \newlength\normal@textwidth
238 \setlength{\normal@textwidth}{\textwidth}
239 \ifthenelse{\equal\@selectedspacing{singlespacing}}
240 {\let\@normalmargins\relax
241 \let\@narrowmargins\relax}
242 {\newlength\normal@margin
243 \setlength{\normal@margin}{\oddsidemargin}
244 \newcommand{\@adjustmargins}[1]{%
245 \clearpage%
246 \setlength{\@tempdima}{#1}%
247 \@settopoint\@tempdima%
248 \setlength{\oddsidemargin}{\normal@margin}%
249 \addtolength{\oddsidemargin}{1\@tempdima}%
250 \setlength{\evensidemargin}{\oddsidemargin}%
251 \setlength{\textwidth}{\normal@textwidth}%
252 \addtolength{\textwidth}{-2\@tempdima}%
253 \setlength{\linewidth}{\textwidth}%
254 \setlength{\columnwidth}{\textwidth}%
255 \setlength{\hsize}{\textwidth}}%
256 \newcommand{\@normalmargins}{\@adjustmargins{0pt}}%
257 \newcommand{\@narrowmargins}{\@adjustmargins{-0.5in}}

```

8.4 Line Spacing

We start with single spacing and change it, if necessary, at the end of `\frontmatter`. We have to do a bit of work to avoid double spacing where we do not want it—for example, any where in the front matter and in code listings.

The user can use `\displayspacing` and `\restorespacing` to alternate between single spaced displays and the default. These commands have no effect when the default is single spacing. Our definition of `\displayspacing` attempts to adjust the vertical space. The macro `\singlespacing` is used internally in the package. We leave the commands and environments of the `setspace` package intact.

```

\restorespacing
\displayspacing
@singlespacing

```

```

258 \ifthenelse{\equal{@selectedspacing{singlespacing}}
259   {\let\restorespacing\relax
260   \let\displayspacing\relax
261   \let@singlespacing\relax}
262   {\RequirePackage[singlespacing]{setspace}
263   \ifthenelse
264     {\equal{@selectedspacing{onehalfspacing}}
265     {\let\restorespacing\onehalfspacing}
266     {\let\restorespacing\doublespacing}
267   \newcommand{\@singlespacing}{\setstretch{\setspace@singlespace}}
268   \newcommand{\displayspacing}{%
269     \vskip\baselineskip%
270     \@singlespacing%
271     \vskip-\baselineskip}}

```

8.5 Sectioning

`\preface` We create a chapter-like command for a preface.

```

272 \newcommand{\preface}{%
273   \chapter*{\prefacename}
274   \addcontentsline{toc}{chapter}{\prefacename}}

```

Our style is based on the L^AT_EX report document class, but we choose not to use `\part`.

```

275 \renewcommand{\part}{\local@classerror{part is not used in srpaper.}}

```

The highest division of text is the `\chapter`. Under the `short` option, we change the chapter command so that there is no new page. Otherwise, we change the chapter command so that, on the first invocation, it calls `\@chapter@one@hook`. In the non-short front matter, that command is defined to change the page numbering from roman to arabic numerals.

`\chapter`

```

276 \if@short
277   \renewcommand{\chapter}{\@startsection{chapter}{0}{\z@}%
278     {-5ex \@plus -1ex \@minus -.2ex}%
279     {3ex \@plus .2ex}%
280     {\normalfont\LARGE\bfseries}}
281 \else
282   \let\@chapter@saved\@chapter
283   \let\@chapter@one@hook\relax
284   \def\@chapter[#1]#2{%
285     \@chapter@one@hook
286     \@chapter@saved[#1]{#2}
287     \global\let\@chapter\@chapter@saved}
288 \fi

```

The wider line spacing throws off the vertical space in the chapter and section headings, so we have to require single-spacing when setting them.

```

289 \let\saved@makechapterhead\@makechapterhead
290 \renewcommand{\@makechapterhead}[1]{%

```

```

291 \begingroup
292 \@singlespacing
293 \saved@makechapterhead{#1}
294 \endgroup}
295 \let\saved@makeschapterhead\@makeschapterhead
296 \renewcommand{\@makeschapterhead}[1]{%
297 \begingroup
298 \@singlespacing
299 \saved@makeschapterhead{#1}
300 \endgroup}
301 \let\saved@startsection\@startsection
302 \renewcommand{\@startsection}[6]{%
303 \saved@startsection{#1}{#2}{#3}{#4}{#5}{\@singlespacing#6}}

```

This author’s personal preference is for indentation in the paragraph immediately following a section heading. The Computer Science faculty decided to retain the default L^AT_EX convention of omitting the indentation. The following redefinition of \@startsection does not appear in the class; it is preserved here for documentation.

```

\let\@startsection@saved\@startsection
\renewcommand{\@startsection}[4]{%
  \@tempskipa #4\relax
  \ifdim \@tempskipa <\z@ \@tempskipa -\@tempskipa \fi
  \@startsection@saved{#1}{#2}{#3}{\@tempskipa}}

```

8.6 Two-sided Formatting

We really want two-sided printing, but we don’t like the different left and right margins. When we load the underlying report class, we give the options `oneside`, to get the proper margins, `onecolumn`, to avoid any complication about what is a “page,” and `textttopenright`, to start chapters on the right hand pages. The only thing left is to redefine `\cleardoublepage` to work properly in one-sided mode.

```

\cleardoublepage
304 \renewcommand{\cleardoublepage}{%
305 \clearpage
306 \@if@finalns{\ifodd\c@page\else\strut\newpage\fi}}

```

8.7 Contents Style

Only chapters and sections go into the table of contents.

```

307 \setcounter{tocdepth}{1}

```

8.8 Bibliography Style

Normally, we use the standard L^AT_EX `\bibliography` for the references section, with the `alpha` bibliography style. (Another bibliography style can be used by changing `\thebibstyle`.) We want a table of contents entry for the

bibliography, so we modify an existing command. It is hard to get into the workings of the `thebibliography` environment, so we (locally) redefine the call `\chapter*{\bibname}`. We also set the bibliography with single spacing, regardless of the convention for the rest of the document.

`\bibliography`

```

308 \def\thebibstyle{alpha}
309 \let\biblio@saved\bibliography
310 \renewcommand{\bibliography}[1]{%
311   \bibliographystyle{\thebibstyle}
312   \begingroup
313   \displayspacing
314   \let\bibchapter@saved\chapter
315   \def\chapter##1##2{%
316     \bibchapter@saved##1{##2}%
317     \addcontentsline{toc}{chapter}{##2}}
318   \biblio@saved{#1}
319   \clearpage
320   \endgroup}

```

Everything changes for an annotated bibliography. We use the `annotate` bibliography style, which adds a field named `annotate`, and omit any chapter heading. We also add more vertical space before the bibliography and between the bibliography items. The line spacing is inherited from the surrounding environments.

`\annotatedbibliography`

The `annotate` bibliography style uses the `quotation` environment. We modify it to reduce the indentation and the leading vertical space. Additionally, we save the surrounding penalties so that the annotations are typeset with the ordinary spacing—not the “block style” of a bibliography.

At one’s own risk, the bibliography style can be changed by redefining `\theannbibstyle`.

```

321 \def\theannbibstyle{annotate}
322 \newcount\clubpenalty@saved
323 \newcount\widowpenalty@saved
324 \newcount\sfperiod@saved
325 \newcommand{\annotatedbibliography}[1]{%
326   \bibliographystyle{\theannbibstyle}
327   \begingroup
328   \let\@listi@saved\@listi
329   \def\@listi{\@listi@saved%
330     \addtolength{\itemsep}{0.5\topsep}%
331     \addtolength{\topsep}{0.5\topsep}}
332   \clubpenalty@saved \clubpenalty
333   \widowpenalty@saved \widowpenalty
334   \sfperiod@saved \sfcode‘\
335   \renewenvironment{quotation}{\par
336     \clubpenalty \clubpenalty@saved
337     \widowpenalty \widowpenalty@saved
338     \sfcode‘\ \sfperiod@saved}{\par}
339   \def\chapter##1##2{}
340   \biblio@saved{#1}
341   \endgroup}

```

9 Utility Environments

Often, we want a block indented. Here is an environment that simply indents from the left by the amount usual for `itemize` and similar environments. The

`indented` `indented` environment does the trick.

```
342 \newenvironment{indented}
343   {\list{}{}\item}
344   {\endlist}
```

When double spacing, one sometimes wants to display a single-spaced block. We try to do that with the `indented*` environment. The vertical space before or after a block may not be correct, however. If single-spacing is in effect, `indented*`

`indented*` is identical to `indented`.

```
345 \newenvironment{indented*}
346   {\list{}{}\item\displayspacing}
347   {\endlist}
```

We create a `code` environment that is used inside our sample document. It is an `alltt` environment nested inside an `indented*` environment.

```
348 \newenvironment{code}
349   {\begin{indented*}\begin{alltt}}
350   {\end{alltt}\end{indented*}}
```

Using the `verbatim` package, we can place a `verbatim` environment inside `indented*`. Because `verbatim` is so delicate, we have to do it directly.

```
351 \newenvironment{vcode}
352   {\csname indented*\endcsname\verbatim}
353   {\endverbatim\csname endindented*\endcsname}
```

10 Local Configuration

We provide an option for simple changes. For example, to produce a paper for another institution or department, one could just have a one-line file named `srpaper.cfg` whose contents is one of the following.

```
\renewcommand{\institutionname}{Scripps College}
\renewcommand{\subjectname}{Mathematics}
```

```
354 \InputIfFileExists{srpaper.cfg}{}{}
```

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