

The `holtxdoc` package

Heiko Oberdiek*
<heiko.oberdiek at googlemail.com>

2019/07/27 v0.28

Abstract

The package is used for the documentation of my packages in DTX format. It contains some private macros and setup for my needs. Thus do not use it. I have separated the part that may be useful for others in package `hypdoc`.

Contents

1 No usage	2
2 Implementation	2
2.1 Help macros	2
2.2 Font setup for <code>LuaLATEX</code>	2
2.3 Date	3
2.4 History	3
2.5 Formatting macros	4
2.6 Names	5
2.7 Setup	6
2.7.1 Package doc	6
2.7.2 Page layout	6
3 Installation	6
3.1 Download	6
3.2 Bundle installation	7
3.3 Package installation	7
3.4 Refresh file name databases	7
3.5 Some details for the interested	7
4 Catalogue	8
5 History	8
[1999/06/26 v0.3]	8
[2000/08/14 v0.4]	8
[2001/08/27 v0.5]	8
[2001/09/02 v0.6]	8
[2006/06/02 v0.7]	8
[2007/10/21 v0.8]	8
[2007/11/11 v0.9]	9
[2007/12/12 v0.10]	9
[2008/08/11 v0.11]	9
[2009/08/07 v0.12]	9
[2009/12/02 v0.13]	9
[2010/02/03 v0.14]	9

*Please report any issues at <https://github.com/ho-tex/oberdiek/issues>

[2010/03/10 v0.15]	9
[2010/04/03 v0.16]	9
[2010/04/08 v0.17]	9
[2010/04/18 v0.18]	9
[2010/04/24 v0.19]	9
[2010/12/03 v0.20]	9
[2011/02/04 v0.21]	9
[2011/11/22 v0.22]	9
[2012/03/07 v0.23]	10
[2012/03/21 v0.24]	10
[2016/05/16 v0.25]	10
[2016/05/16 v0.26]	10
[2016/05/17 v0.27]	10
[2019/07/27 v0.28]	10

1 No usage

Caution: *This package is not intended for public use!*

It contains the macros and settings to generate the documentation of my packages in [CTAN:macros/latex/contrib/oberdiek/](#). Thus the package does not know anything about compatibility. Only my current packages' documentation must compile.

Older versions were more interesting, because they contained code to add `hyperref`'s features to `LATEX`'s doc system, e.g. bookmarks and index links. I separated this stuff and made a new package `hypdoc`.

2 Implementation

```
1 {*package}
```

Package identification.

```
2 \NeedsTeXFormat{LaTeX2e}
3 \ProvidesPackage{holtxdoc}%
4 [2019/07/27 v0.28 Private additional ltxdoc support (HO)]
5 \PassOptionsToPackage{pdfencoding=auto}{hyperref}
6 \RequirePackage[numbered]{hypdoc}[2010/03/26]
7 \RequirePackage{hyperref}[2010/03/30]
8 \RequirePackage{pdftexcmds}[2010/04/01]
9 \RequirePackage{ltxcmds}[2010/03/09]
10 \RequirePackage{hologo}[2011/11/22]
11 \RequirePackage{ifluatex}[2010/03/01]
12 \RequirePackage{array}
```

2.1 Help macros

```
13 \def\hld@info#1{%
14   \PackageInfo{holtxdoc}{#1\@gobble}%
15 }
16 \def\hld@warn#1{%
17   \PackageWarningNoLine{holtxdoc}{#1}%
18 }
```

2.2 Font setup for LuaLATEX

```
19 \ifluatex
20   \RequirePackage{fontspec}[2011/09/18]%
21   \RequirePackage{unicode-math}[2011/09/19]%
22   \setmathfont{latinmodern-math.otf}%
23 \fi
```

2.3 Date

```
24 \ltx@IfUndefined{pdf@filemoddate}{%
25 }{%
26   \edef\hld@temp{\pdf@filemoddate{\jobname.dtx}}%
27   \ifx\hld@temp\ltx@empty
28   \else
29     \begingroup
30       \def\x#1:#2:#3:#4:#5:#6:#7:#8:#9{%
31         \year=#2#3#4#5\relax
32         \month=#6#7\relax
33         \day=#8#9\relax
34         \y
35       }%
36       \def\y#1#2#3#4#5@nil{%
37         \time=#1#2\relax
38         \multiply\time by 60\relax
39         \advance\time#3#4\relax
40       }%
41       \expandafter\x\hld@temp@nil
42     \endgroup
43     \year=\the\year\relax
44     \month=\the\month\relax
45     \day=\the\day\relax
46     \time=\the\time\relax
47   }%
48   \x
49   \edef\hld@temp{%
50     \noexpand\hypersetup{%
51       pdfcreationdate=\hld@temp,%  

52       pdfmoddate=\hld@temp
53     }%
54   }%
55   \hld@temp
56 \fi
57 }
```

2.4 History

```
\historyname
58 \providecommand*\historyname{History}
59 \newcommand*\StartHistory{%
60   \section{\historyname}%
61 }
62 \@ifpackagelater{hyperref}{2009/11/27}{%
63   \newcommand*\HistVersion[1]{%
64     \subsection*[{\#1}]% hash-ok
65     \addcontentsline{toc}{subsection}{\#1}% hash-ok
66     \def\HistLabel##1{%
67       \begingroup
68         \protected@edef@\currentlabel{\#1}% hash-ok
69         \label{\#1}%
70       \endgroup
71     }%
72   }%
73 }{%
74   \newcommand*\HistVersion[1]{%
75     \subsection*{%
76       \phantomsection
77       \addcontentsline{toc}{subsection}{\#1}% hash-ok
78       \#1}% hash-ok
79   }%
80   \def\HistLabel##1{%
```

```

81      \begingroup
82          \protected@edef@\currentlabel{[#1]}% hash-ok
83          \label{##1}%
84      \endgroup
85  }%
86 }%
87 }
88 \newenvironment{History}{%
89     \StartHistory
90     \def\Version##1{%
91         \HistVersion{##1}%
92         \@ifnextchar{%
93             \let\endVersion\relax
94         }{%
95             \let\endVersion\enditemize
96             \itemize
97         }%
98     }%
99     \raggedright
100 }{}}

```

2.5 Formatting macros

```

\UrlFoot
#1: text
#2: url
101 \newcommand{\URL}[2]{%
102     \begingroup
103         \def\link{\href{#2}}%
104         #1%
105     \endgroup
106     \footnote{Url: \url{#2}}%
107 }

\NameEmail
#1: name
#2: email address
108 \newcommand*{\NameEmail}[2]{%
109     \expandafter\hld@\NameEmail\expandafter{#2}{#1}%
110 }
111 \def\hld@\NameEmail#1#2{%
112     \expandafter\hld@\NameEmail\expandafter{#2}{#1}%
113 }
114 \def\hld@\NameEmail#1#2{%
115     \ifx\\#1#2\\%
116         \hld@warn{%
117             Command \string\NameEmail\space without name and email%
118         }%
119     \else
120         \ifx\\#1\\%
121             \href{mailto:#2}{\nolinkurl{#2}}%
122         \else
123             #1%
124             \ifx\\#2\\%
125                 \else
126                     \footnote{%
127                         #1's email address: %
128                         \href{mailto:#2}{\nolinkurl{#2}}%
129                     }%
130                 \fi
131             \fi
132         \fi

```

```

133 }
134 \newcommand*{\Package}[1]{\texttt{\#1}}
135 \newcommand*{\File}[1]{\texttt{\#1}}
136 \newcommand*{\Verb}[1]{\texttt{\#1}}
137 \newcommand*{\CS}[1]{\texttt{\expandafter\@gobble\string\#1}}
138 \newcommand*{\CTAN}[1]{%
139   \href{http://ctan.org/pkg/\#1}{\nolinkurl{CTAN:\#1}}%
140 }
141 \newcommand*{\Newsgroup}[1]{%
142   \href{http://groups.google.com/group/\#1/topics}{\nolinkurl{news:\#1}}%
143 }
144 \newcommand*{\xpackage}[1]{\textsf{\#1}}
145 \newcommand*{\xmodule}[1]{\textsf{\#1}}
146 \newcommand*{\xclass}[1]{\textsf{\#1}}
147 \newcommand*{\xooption}[1]{\textsf{\#1}}
148 \newcommand*{\xfile}[1]{\texttt{\#1}}
149 \newcommand*{\xext}[1]{\texttt{\#1}}
150 \newcommand*{\xemail}[1]{%
151   \textless\texttt{\#1}\textgreater%
152 }
153 \newcommand*{\xnewsgroup}[1]{%
154   \href{news:\#1}{\nolinkurl{\#1}}%
155 }

```

The following environment `declcs` is derived from environment `decl` of `ltxguide.cls`:

```

156 \newenvironment{declcs}[1]{%
157   \par
158   \addvspace{4.5ex plus 1ex}%
159   \vskip -\parskip
160   \noindent
161   \hspace{-\leftmargini}%
162   \def\#1{\texttt{\{\}}\meta{\#\#1}\texttt{\{\}}}%
163   \def\*{\unskip\,,\texttt{\{*\}}}%
164   \begin{tabular}{|l|}%
165     \hline
166     \expandafter\SpecialUsageIndex\csname #1\endcsname
167     \cs{\#1}%
168   }{%
169     \%
170     \hline
171   \end{tabular}%
172   \nobreak
173   \par
174   \nobreak
175   \vspace{2.3ex}%
176   \vskip -\parskip
177   \noindent
178   \ignorespacesafterend
179 }

```

2.6 Names

```

180 \def\TeX{\hologo{eTeX}}
181 \def\pdfTeX{\hologo{pdfTeX}}
182 \def\pdfLaTeX{\hologo{pdfLaTeX}}
183 \def\LuaTeX{\hologo{LuaTeX}}
184 \def\LuaLaTeX{\hologo{LuaLaTeX}}
185 \def\XeTeX{\hologo{XeTeX}}
186 \def\XeLaTeX{\hologo{XeLaTeX}}
187 \def\plainTeX{\hologo{plainTeX}}
188 \providecommand*{\teTeX}{\textrm{e}\textrm{T}\textrm{e}\textrm{X}}

```

```

189 \providecommand*{\mikTeX}{\mik\TeX}
190 \providecommand*{\MakeIndex}{\textsf{MakeIndex}}
191 \providecommand*{\docstrip}{\textsf{docstrip}}
192 \providecommand*{\iniTeX}{\mbox{\ini-\TeX}}
193 \providecommand*{\VTeX}{\V\TeX}

```

2.7 Setup

2.7.1 Package doc

```

194 \CodelineIndex
195 \EnableCrossrefs
196 \setcounter{IndexColumns}{2}
197 \DoNotIndex{\begingroup,\endgroup,\bgroup,\egroup}
198 \DoNotIndex{\def,\edef,\xdef,\global,\long,\let}
199 \DoNotIndex{\expandafter,\noexpand,\string}
200 \DoNotIndex{\else,\fi,\or}
201 \DoNotIndex{\relax}
202 \IndexPrologue{%
203   \section*{Index}%
204   \markboth{Index}{Index}%
205   Numbers written in italic refer to the page %
206   where the corresponding entry is described; %
207   numbers underlined refer to the %
208   \ifcodeline@index
209     code line of the %
210   \fi
211   definition; plain numbers refer to the %
212   \ifcodeline@index
213     code lines %
214   \else
215     pages %
216   \fi
217   where the entry is used.%}
218 }

```

2.7.2 Page layout

```

219 \addtolength{\textheight}{\headheight}
220 \addtolength{\textheight}{\headsep}
221 \setlength{\headheight}{0pt}
222 \setlength{\headsep}{0pt}
223 \addtolength{\topmargin}{-10mm}
224 \addtolength{\textheight}{20mm}
225 </package>

```

3 Installation

3.1 Download

Package. This package is available on CTAN¹:

[CTAN:macros/latex/contrib/oberdiek/holtxdoc.dtx](http://ctan.org/pkg/holtxdoc) The source file.

[CTAN:macros/latex/contrib/oberdiek/holtxdoc.pdf](http://ctan.org/pkg/holtxdoc) Documentation.

Bundle. All the packages of the bundle ‘oberdiek’ are also available in a TDS compliant ZIP archive. There the packages are already unpacked and the documentation files are generated. The files and directories obey the TDS standard.

[CTAN:install/macros/latex/contrib/oberdiek.tds.zip](http://ctan.org/pkg/oberdiek.tds.zip)

TDS refers to the standard “A Directory Structure for TeX Files” ([CTAN:tds/tds.pdf](http://ctan.org/pkg/tds.pdf)). Directories with `texmf` in their name are usually organized this way.

¹<http://ctan.org/pkg/holtxdoc>

3.2 Bundle installation

Unpacking. Unpack the `oberdiek.tds.zip` in the TDS tree (also known as `texmf` tree) of your choice. Example (linux):

```
unzip oberdiek.tds.zip -d ~/texmf
```

Script installation. Check the directory `TDs:scripts/oberdiek/` for scripts that need further installation steps. Package `attachfile2` comes with the Perl script `pdfatfi.pl` that should be installed in such a way that it can be called as `pdfatfi`. Example (linux):

```
chmod +x scripts/oberdiek/pdfatfi.pl
cp scripts/oberdiek/pdfatfi.pl /usr/local/bin/
```

3.3 Package installation

Unpacking. The `.dtx` file is a self-extracting `docstrip` archive. The files are extracted by running the `.dtx` through plain `TEX`:

```
tex holtxdoc.dtx
```

TDS. Now the different files must be moved into the different directories in your installation TDS tree (also known as `texmf` tree):

```
holtxdoc.sty → tex/latex/oberdiek/holtxdoc.sty
holtxdoc.pdf → doc/latex/oberdiek/holtxdoc.pdf
holtxdoc.dtx → source/latex/oberdiek/holtxdoc.dtx
```

If you have a `docstrip.cfg` that configures and enables `docstrip`'s TDS installing feature, then some files can already be in the right place, see the documentation of `docstrip`.

3.4 Refresh file name databases

If your `TEX` distribution (`teTEX`, `mikTEX`, ...) relies on file name databases, you must refresh these. For example, `teTEX` users run `texhash` or `mktexlsr`.

3.5 Some details for the interested

Unpacking with L^AT_EX. The `.dtx` chooses its action depending on the format:

plain T_EX: Run `docstrip` and extract the files.

L^AT_EX: Generate the documentation.

If you insist on using L^AT_EX for `docstrip` (really, `docstrip` does not need L^AT_EX), then inform the autodetect routine about your intention:

```
latex \let\install=y\input{holtxdoc.dtx}
```

Do not forget to quote the argument according to the demands of your shell.

Generating the documentation. You can use both the `.dtx` or the `.drv` to generate the documentation. The process can be configured by the configuration file `ltxdoc.cfg`. For instance, put this line into this file, if you want to have A4 as paper format:

```
\PassOptionsToClass{a4paper}{article}
```

An example follows how to generate the documentation with pdfL^AT_EX:

```
pdflatex holtxdoc.dtx
makeindex -s gind.ist holtxdoc.idx
pdflatex holtxdoc.dtx
makeindex -s gind.ist holtxdoc.idx
pdflatex holtxdoc.dtx
```

4 Catalogue

The following XML file can be used as source for the **TeX Catalogue**. The elements **caption** and **description** are imported from the original XML file from the Catalogue. The name of the XML file in the Catalogue is `holtxdoc.xml`.

```
226 <*>
227 <?xml version='1.0' encoding='us-ascii'?>
228 <!DOCTYPE entry SYSTEM 'catalogue.dtd'>
229 <entry datestamp='$Date$' modifier='$Author$' id='holtxdoc'>
230   <name>holtxdoc</name>
231   <caption>Documentation macros for oberdiek bundle, etc.</caption>
232   <authorref id='auth:oberdiek' />
233   <copyright owner='Heiko Oberdiek' year='1999-2012' />
234   <license type='lpp1.3' />
235   <version number='0.28' />
236   <description>
237     These are personal macros, which are not necessarily useful to
238     other authors (they are provided as part off the source of others
239     of the author's packages). Macros that may be of use to other
240     authors are available separately, in package
241     <xref refid='hypdoc'>hypdoc</xref>.
242   <p/>
243   The package is part of the <xref refid='oberdiek'>oberdiek</xref> bundle.
244 </description>
245 <documentation details='Package documentation'
246   href='ctan:/macros/latex/contrib/oberdiek/holtxdoc.pdf' />
247 <ctan file='true' path='/macros/latex/contrib/oberdiek/holtxdoc.dtx' />
248 <miktex location='oberdiek' />
249 <texlive location='oberdiek' />
250 <install path='/macros/latex/contrib/oberdiek/oberdiek.tds.zip' />
251 </entry>
252 </catalogue>
```

5 History

[1999/06/26 v0.3]

- ...

[2000/08/14 v0.4]

- ...

[2001/08/27 v0.5]

- ...

[2001/09/02 v0.6]

- ...

[2006/06/02 v0.7]

- Major change: most is put into a new package `hypdoc`.

[2007/10/21 v0.8]

- `\XeTeX` and `\XeLaTeX` added.

[2007/11/11 v0.9]

- \LuaTeX added.

[2007/12/12 v0.10]

- \iniTeX added.

[2008/08/11 v0.11]

- \Newsgroup, \xnewsgroup, and \URL updated.

[2009/08/07 v0.12]

- \xmodule added.

[2009/12/02 v0.13]

- Anchor hack for unnumbered subsections is removed for hyperref ≥ 2009/11/27 6.79k.

[2010/02/03 v0.14]

- \XeTeX and \XeLaTeX are made robust.

[2010/03/10 v0.15]

- \LuaTeX changed according to Hans Hagen's definition in the luatex mailing list.

[2010/04/03 v0.16]

- Use date and time of .dtx file.

[2010/04/08 v0.17]

- Option pdfencoding=auto added for package hyperref.
- Package hologo added.

[2010/04/18 v0.18]

- Standard index prologue replaced by corrected prologue.

[2010/04/24 v0.19]

- Requested date of package hologo updated.

[2010/12/03 v0.20]

- History is now set using \raggedright.

[2011/02/04 v0.21]

- GL needs \protected@edef instead of \edef in \HistLabel.

[2011/11/22 v0.22]

- Font stuff added for LuaLATEX.

[2012/03/07 v0.23]

- Accept empty history version.

[2012/03/21 v0.24]

- Section title for history uses \historyname.

[2016/05/16 v0.25]

- Documentation updates.

[2016/05/16 v0.26]

- Documentation updates.

[2016/05/17 v0.27]

- New name for lm math font

[2019/07/27 v0.28]

- Use CTAN's preferred URL form for packages Documentation updates.

6 Index

Numbers written in italic refer to the page where the corresponding entry is described; numbers underlined refer to the code line of the definition; plain numbers refer to the code lines where the entry is used.

Symbols	
*	163
\,	163
\@currentlabel	68, 82
\@gobble	14, 137
\@ifnextchar	92
\@ifpackagelater	62
\@nil	36, 41
\`	115, 120, 124, 137, 169
\{	162
\}	162
A	
\addcontentsline	65, 77
\addtolength	219, 220, 223, 224
\addvspace	158
\advance	39
B	
\begin	164
C	
\CodeIndex	194
\CS	137
\cs	167
\csname	166
\CTAN	138
D	
\day	33, 45
\docstrip	191
E	
\DoNotIndex	197, 198, 199, 200, 201
\EnableCrossrefs	195
\end	92, 171
\endcsname	166
\enditemize	95
\endVersion	93, 95
\eTeX	180
F	
\File	135
\footnote	106, 126
H	
\headheight	219, 221
\headsep	220, 222
\HistLabel	66, 80
\historyname	58, 60
\HistVersion	63, 74, 91
\hld@@NameEmail	112, 114
\hld@info	13
\hld@NameEmail	109, 111
\hld@temp	26, 27, 41, 49, 51, 52, 55
\hld@warn	16, 116
\hline	165, 170
\hologo	180, 181, 182, 183, 184, 185, 186, 187
\href	103, 121, 128, 139, 142, 154
\hspace	161
\hypersetup	50

	I		
\ifcodeline@index	208, 212	\ProvidesPackage	3
\ifluatex	19		
\ifx	27, 115, 120, 124	R	
\ignorespacesafterend	178	\raggedright	99
\IndexPrologue	202	\RequirePackage	
\iniTeX	192 6, 7, 8, 9, 10, 11, 12, 20, 21	
\itemize	96		
	J		
\jobname	26	\section	60, 203
		\setcounter	196
		\setlength	221, 222
		\setmathfont	22
		\space	117
	L		
\label	69, 83	\SpecialUsageIndex	166
\leftmargini	161	\StartHistory	59, 89
\link	103	\subsection	64, 75
\ltx@empty	27		
\ltx@ifundefined	24	T	
\LuaLaTeX	184	\textTeX	188
\LuaTeX	183	\TeX	188, 189, 192, 193
		\textgreater	151
	M		
\M	162	\textheight	219, 220, 224
\MakeIndex	190	\textless	151
\markboth	204	\textsf	144, 145, 146, 147, 191
\mbox	192	\textsl	190
\meta	162	\texttt	134, 135, 136, 137, 148, 149, 151, 162, 163
\mikTeX	189	\the	43, 44, 45, 46
\month	32, 44	\time	37, 38, 39, 46
\multiply	38	\topmargin	223
	N		
\NameEmail	108, 117	U	
\NeedsTeXFormat	2	\unskip	163
\newcommand		\URL	101
.... 59, 63, 74, 101, 108, 134, 135, 136, 137, 138, 141, 144, 145, 146, 147, 148, 149, 150, 153		\url	106
\newenvironment	88, 156		
\Newsgroup	141	V	
\nobreak	172, 174	\Verb	136
\noindent	160, 177	\Version	90
\nolinkurl	121, 128, 139, 142, 154	\vskip	159, 176
		\vspace	175
	P		
\Package	134	\VTeX	193
\PackageInfo	14		
\PackageWarningNoLine	17	X	
\par	157, 173	\x	30, 41, 42, 48
\parskip	159, 176	\xclass	146
\PassOptionsToPackage	5	\XeTeX	186
\pdf@filemoddate	26	\xemail	150
\pdfLaTeX	182	\xTeX	185
\pdfTeX	181	\xext	149
\phantomsection	76	\xfile	148
\plainTeX	187	\xmodule	145
\protected@edef	68, 82	\xnewsgroup	153
\providecommand		\xooption	147
... 58, 188, 189, 190, 191, 192, 193		\xpackage	144
	Y		
		\y	34, 36
		\year	31, 43