

# The infwarerr package

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2019/12/03 v1.5

## Abstract

This package provides a complete set of macros for informations, warnings and error messages with support for plain  $\text{\TeX}$ .

## Contents

<b>1</b>	<b>Documentation</b>	<b>1</b>
<b>2</b>	<b>Implementation</b>	<b>2</b>
2.1	Reload check and package identification	2
2.2	Catcodes	3
2.3	$\text{\LaTeX}$ detection	4
2.4	Version for $\text{\LaTeX}$	4
2.5	Version for plain $\text{\TeX}$	5
<b>3</b>	<b>Installation</b>	<b>8</b>
3.1	Download	8
3.2	Bundle installation	8
3.3	Package installation	8
3.4	Refresh file name databases	9
3.5	Some details for the interested	9
<b>4</b>	<b>History</b>	<b>9</b>
	[2007/04/26 v1.0]	9
	[2007/06/14 v1.1]	9
	[2007/09/09 v1.2]	9
	[2010/04/08 v1.3]	10
	[2016/05/16 v1.4]	10
	[2019/12/03 v1.5]	10
<b>5</b>	<b>Index</b>	<b>10</b>

## 1 Documentation

Package infwarerr defines the following set of commands, given as pseudo regular expression:

```
\@(Package|Class)(Info|InfoNoLine|Warning|WarningNoLine|Error)
```

---

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

The first argument is the package or class in question. The second argument contains the message text. `\MessageBreak` is supported. In case of error messages, the third argument contains the help text. Supported are L<sup>A</sup>T<sub>E</sub>X's message texts `\@ehc`:

```
Try typing <return> to proceed
If that doesn't work, type X <return> to quit.
```

and `\@ehd`:

```
You're in trouble here. Try typing <return> to proceed
If that doesn't work, type X <return> to quit.
```

The package is intended for macro writers that want to write code that works for both L<sup>A</sup>T<sub>E</sub>X and plain T<sub>E</sub>X. If L<sup>A</sup>T<sub>E</sub>X is detected, then the macros of this package will only be wrappers for L<sup>A</sup>T<sub>E</sub>X's macros. Otherwise L<sup>A</sup>T<sub>E</sub>X's macros will be mimicked for use with plain T<sub>E</sub>X.

## 2 Implementation

```
1 (*package)
```

### 2.1 Reload check and package identification

Reload check, especially if the package is not used with L<sup>A</sup>T<sub>E</sub>X.

```
2 \begingroup\catcode61\catcode48\catcode32=10\relax%
3 \catcode13=5 % ^M
4 \endlinechar=13 %
5 \catcode35=6 % #
6 \catcode39=12 % '
7 \catcode44=12 % ,
8 \catcode45=12 % -
9 \catcode46=12 % .
10 \catcode58=12 % :
11 \catcode64=11 % @
12 \catcode123=1 % {
13 \catcode125=2 % }
14 \expandafter\let\expandafter\x\csname ver@infwarerr.sty\endcsname
15 \ifx\x\relax % plain-TeX, first loading
16 \else
17 \def\empty{}%
18 \ifx\x\empty % LaTeX, first loading,
19 % variable is initialized, but \ProvidesPackage not yet seen
20 \else
21 \expandafter\ifx\csname PackageInfo\endcsname\relax
22 \def\x#1#2{%
23 \immediate\write-1{Package #1 Info: #2.}%
24 }%
25 \else
26 \def\x#1#2{\PackageInfo{#1}{#2, stopped}}%
27 \fi
28 \x{infwarerr}{The package is already loaded}%
29 \aftergroup\endinput
30 \fi
31 \fi
32 \endgroup%
```

Package identification:

```

33 \begingroup\catcode61\catcode48\catcode32=10\relax%
34 \catcode13=5 % ^^M
35 \endlinechar=13 %
36 \catcode35=6 % #
37 \catcode39=12 % '
38 \catcode40=12 % (
39 \catcode41=12 % )
40 \catcode44=12 % ,
41 \catcode45=12 % -
42 \catcode46=12 % .
43 \catcode47=12 % /
44 \catcode58=12 % :
45 \catcode64=11 % @
46 \catcode91=12 % [
47 \catcode93=12 % ]
48 \catcode123=1 % {
49 \catcode125=2 % }
50 \expandafter\ifx\csname ProvidesPackage\endcsname\relax
51 \def\x#1#2#3[#4]{\endgroup
52 \immediate\write-1{Package: #3 #4}%
53 \xdef#1{#4}%
54 }%
55 \else
56 \def\x#1#2[#3]{\endgroup
57 #2[#{#3}]%
58 \ifx#1\@undefined
59 \xdef#1{#3}%
60 \fi
61 \ifx#1\relax
62 \xdef#1{#3}%
63 \fi
64 }%
65 \fi
66 \expandafter\x\csname ver@infwarerr.sty\endcsname
67 \ProvidesPackage{infwarerr}%
68 [2019/12/03 v1.5 Providing info/warning/error messages (H0)]%

```

## 2.2 Catcodes

```

69 \begingroup\catcode61\catcode48\catcode32=10\relax%
70 \catcode13=5 % ^^M
71 \endlinechar=13 %
72 \catcode123=1 % {
73 \catcode125=2 % }
74 \catcode64=11 % @
75 \def\x{\endgroup
76 \expandafter\edef\csname InfWarErr@AtEnd\endcsname{%
77 \endlinechar=\the\endlinechar\relax
78 \catcode13=\the\catcode13\relax
79 \catcode32=\the\catcode32\relax
80 \catcode35=\the\catcode35\relax
81 \catcode61=\the\catcode61\relax
82 \catcode64=\the\catcode64\relax
83 \catcode123=\the\catcode123\relax
84 \catcode125=\the\catcode125\relax
85 }%
86 }%
87 \x\catcode61\catcode48\catcode32=10\relax%

```

```

88 \catcode13=5 % ^^M
89 \endlinechar=13 %
90 \catcode35=6 % #
91 \catcode64=11 % @
92 \catcode123=1 % {
93 \catcode125=2 % }
94 \def\TMP@EnsureCode#1#2{%
95   \edef\InfWarErr@AtEnd{%
96     \InfWarErr@AtEnd
97     \catcode#1=\the\catcode#1\relax
98   }%
99   \catcode#1=#2\relax
100 }
101 \TMP@EnsureCode{10}{12}% ^^J
102 \TMP@EnsureCode{39}{12}% '
103 \TMP@EnsureCode{40}{12}% (
104 \TMP@EnsureCode{41}{12}% )
105 \TMP@EnsureCode{44}{12}% ,
106 \TMP@EnsureCode{45}{12}% -
107 \TMP@EnsureCode{46}{12}% .
108 \TMP@EnsureCode{58}{12}% :
109 \TMP@EnsureCode{60}{12}% <
110 \TMP@EnsureCode{62}{12}% >
111 \TMP@EnsureCode{94}{7}% ^
112 \edef\InfWarErr@AtEnd{\InfWarErr@AtEnd\noexpand\endinput}

```

## 2.3 L<sup>A</sup>T<sub>E</sub>X detection

```

113 \begingroup
114   \let\x=Y%
115   \def\check#1{%
116     \@check{Generic}{#1}%
117     \@check{Package}{#1}%
118     \@check{Class}{#1}%
119   }%
120   \def\@check#1#2{%
121     \expandafter\ifx\csname #1#2\endcsname\relax
122       \let\x=N%
123     \fi
124   }%
125   \check{Info}%
126   \check{Warning}%
127   \check{Error}%
128   \@check{Package}{WarningNoLine}%
129   \@check{Class}{WarningNoLine}%
130   \@check{}{@ehc}%
131   \@check{}{@ehd}%
132 \expandafter\endgroup
133 \ifx\x Y%

```

## 2.4 Version for L<sup>A</sup>T<sub>E</sub>X

\@PackageInfo

```
134 \let\@PackageInfo\PackageInfo
```

\@PackageInfoNoLine

```

135 \def\@PackageInfoNoLine#1#2{%
136   \PackageInfo{#1}{#2@gobble}%
137 }%

```

```

\@ClassInfo
138 \let\@ClassInfo\ClassInfo

\@ClassInfoNoLine
139 \def\@ClassInfoNoLine#1#2{%
140 \ClassInfo{#1}{#2\@gobble}%
141 }%

\@PackageWarning
142 \let\@PackageWarning\PackageWarning

\@PackageWarningNoLine
143 \let\@PackageWarningNoLine\PackageWarningNoLine

\@ClassWarning
144 \let\@ClassWarning\ClassWarning

\@ClassWarningNoLine
145 \let\@ClassWarningNoLine\ClassWarningNoLine

\@PackageError
146 \let\@PackageError\PackageError

\@ClassError
147 \let\@ClassError\ClassError

148 \expandafter\InfWarErr@AtEnd
149 \fi%

```

## 2.5 Version for plain T<sub>E</sub>X

```

\InfWarErr@online
150 \begingroup\expandafter\endgroup
151 \ifcase\expandafter\ifx\csname inputlineno\endcsname\relax
152 0 %
153 \else
154 \ifnum\inputlineno<0 %
155 0 %
156 \else
157 1 %
158 \fi
159 \fi
160 \def\InfWarErr@online{}%
161 \else
162 \def\InfWarErr@online{ on input line \the\inputlineno}%
163 \fi

\InfWarErr@protected
164 \begingroup\expandafter\expandafter\expandafter\endgroup
165 \expandafter\ifx\csname protected\endcsname\relax
166 \def\InfWarErr@protected{}%
167 \else
168 \let\InfWarErr@protected\protected
169 \fi

\InfWarErr@unused
170 \chardef\InfWarErr@unused=16 %

```

\InfWarErr@ehc

```
171 \def\InfWarErr@ehc{%
172   Try typing \space <return> \space to proceed.\MessageBreak
173   If that doesn't work, type \space X <return> \space to quit.%
174 }
```

\InfWarErr@ehd

```
175 \def\InfWarErr@ehd{%
176   You're in trouble here. \space\@ehc
177 }
```

\InfWarErr@GenericInfo

```
178 \InfWarErr@protected\def\InfWarErr@GenericInfo#1#2{%
179   \begingroup
180   \let\on@line\InfWarErr@online
181   \long\def\@gobble##1{%
182     \def\space{ }%
183     \def\@spaces{\space\space\space\space}%
184     \def\MessageBreak{^^J#1}%
185     \newlinechar=10 %
186     \escapechar=92 %
187     \immediate\write-1{#2\on@line.}%
188   \endgroup
189 }
```

\InfWarErr@GenericWarning

```
190 \InfWarErr@protected\def\InfWarErr@GenericWarning#1#2{%
191   \begingroup
192   \let\on@line\InfWarErr@online
193   \long\def\@gobble##1{%
194     \def\space{ }%
195     \def\@spaces{\space\space\space\space}%
196     \def\MessageBreak{^^J#1}%
197     \newlinechar=10 %
198     \escapechar=92 %
199     \immediate\write\InfWarErr@unused{^^J#2\on@line.^^J}%
200   \endgroup
201 }
```

\InfWarErr@GenericError Old TeX versions below 3.141 where ^^J is not working as newline in error message and help texts are not supported.

```
202 \InfWarErr@protected\def\InfWarErr@GenericError#1#2#3#4{%
203   \begingroup
204   \immediate\write\InfWarErr@unused{%
205     \def\space{ }%
206     \def\@spaces{\space\space\space\space}%
207     \let\@ehc\InfWarErr@ehc
208     \let\@ehd\InfWarErr@ehd
209     \let\on@line\InfWarErr@online
210     \def\MessageBreak{^^J}%
211     \newlinechar=10 %
212     \escapechar=92 %
213     \edef\InfWarErr@help{\noexpand\errhelp{#4}}%
214     \InfWarErr@help
215     \def\MessageBreak{^^J#1}%
216     \errmessage{%
217       #2.^^J^^J%
```

```

218     #3^^J%
219     Type \space H <return> \space for immediate help.^^J ...^^J%
220   }%
221 \endgroup
222 }

```

\@PackageInfo

```

223 \def\@PackageInfo#1#2{%
224   \InfWarErr@GenericInfo{%
225     (#1) \@spaces\@spaces\@spaces
226   }{%
227     Package #1 Info: #2%
228   }%
229 }

```

\@PackageInfoNoLine

```

230 \def\@PackageInfoNoLine#1#2{%
231   \@PackageInfo{#1}{#2\@gobble}%
232 }

```

\@ClassInfo

```

233 \def\@ClassInfo#1#2{%
234   \InfWarErr@GenericInfo{%
235     (#1) \space\space\@spaces\@spaces
236   }{%
237     Class #1 Info: #2%
238   }%
239 }

```

\@ClassInfoNoLine

```

240 \def\@ClassInfoNoLine#1#2{%
241   \@ClassInfo{#1}{#2\@gobble}%
242 }

```

\@PackageWarning

```

243 \def\@PackageWarning#1#2{%
244   \InfWarErr@GenericWarning{%
245     (#1)\@spaces\@spaces\@spaces\@spaces
246   }{%
247     Package #1 Warning: #2%
248   }%
249 }

```

\@PackageWarningNoLine

```

250 \def\@PackageWarningNoLine#1#2{%
251   \@PackageWarning{#1}{#2\@gobble}%
252 }

```

\@ClassWarning

```

253 \def\@ClassWarning#1#2{%
254   \InfWarErr@GenericWarning{%
255     (#1) \space\@spaces\@spaces\@spaces
256   }{%
257     Class #1 Warning: #2%
258   }%
259 }

```

```

\@ClassWarningNoLine
260 \def\@ClassWarningNoLine#1#2{%
261   \@ClassWarning{#1}{#2\@gobble}%
262 }

\@PackageError
263 \def\@PackageError#1#2#3{%
264   \InfWarErr@GenericError{%
265     (#1)\@spaces\@spaces\@spaces\@spaces
266   }{%
267     Package #1 Error: #2%
268   }{%
269     See the #1 package documentation for explanation.%
270   }{#3}%
271 }

\@ClassError
272 \def\@ClassError#1#2#3{%
273   \InfWarErr@GenericError{%
274     (#1) \space\@spaces\@spaces\@spaces
275   }{%
276     Class #1 Error: #2%
277   }{%
278     See the #1 class documentation for explanation.%
279   }{#3}%
280 }

281 \InfWarErr@AtEnd%
282 \</package>

```

## 3 Installation

### 3.1 Download

**Package.** This package is available on CTAN<sup>1</sup>:

[CTAN:macros/latex/contrib/infwarerr/infwarerr.dtx](#) The source file.

[CTAN:macros/latex/contrib/infwarerr/infwarerr.pdf](#) Documentation.

**Bundle.** All the packages of the bundle ‘infwarerr’ 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/infwarerr.tds.zip](#)

*TDS* refers to the standard “A Directory Structure for T<sub>E</sub>X Files” ([CTAN:pkg/tds](#)). Directories with `texmf` in their name are usually organized this way.

### 3.2 Bundle installation

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

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

---

<sup>1</sup>[CTAN:pkg/infwarerr](#)



### 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 infwarerr.dtx
```

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

```
infwarerr.sty → tex/generic/infwarerr/infwarerr.sty
infwarerr.pdf → doc/latex/infwarerr/infwarerr.pdf
infwarerr.dtx → source/latex/infwarerr/infwarerr.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 (`TEX Live`, `mikTEX`, ...) relies on file name databases, you must refresh these. For example, `TEX Live` users run `texhash` or `mktexlsr`.

### 3.5 Some details for the interested

**Unpacking with  $\LaTeX$ .** The `.dtx` chooses its action depending on the format:

**plain `TEX`:** Run `docstrip` and extract the files.

**$\LaTeX$ :** Generate the documentation.

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

```
latex \let\install=y\input{infwarerr.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 `pdf $\LaTeX$` :

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

## 4 History

[2007/04/26 v1.0]

- First version.

[2007/06/14 v1.1]

- Small fixes.

[2007/09/09 v1.2]

- Catcode section extended.

[2010/04/08 v1.3]

- Ensure `\escapechar=92` (backslash) for infos/warnings/errors.

[2016/05/16 v1.4]

- Documentation updates.

[2019/12/03 v1.5]

- Documentation updates.

## 5 Index

Numbers written in *italics* 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	
<code>\@ClassError</code> . . . . .	<a href="#">147</a> , <a href="#">272</a>
<code>\@ClassInfo</code> . . . . .	<a href="#">138</a> , <a href="#">233</a> , <a href="#">241</a>
<code>\@ClassInfoNoLine</code> . . . . .	<a href="#">139</a> , <a href="#">240</a>
<code>\@ClassWarning</code> . . . . .	<a href="#">144</a> , <a href="#">253</a> , <a href="#">261</a>
<code>\@ClassWarningNoLine</code> . . . . .	<a href="#">145</a> , <a href="#">260</a>
<code>\@PackageError</code> . . . . .	<a href="#">146</a> , <a href="#">263</a>
<code>\@PackageInfo</code> . . . . .	<a href="#">134</a> , <a href="#">223</a> , <a href="#">231</a>
<code>\@PackageInfoNoLine</code> . . . . .	<a href="#">135</a> , <a href="#">230</a>
<code>\@PackageWarning</code> . . . . .	<a href="#">142</a> , <a href="#">243</a> , <a href="#">251</a>
<code>\@PackageWarningNoLine</code> . . . . .	<a href="#">143</a> , <a href="#">250</a>
<code>\@check</code> . . . . .	<a href="#">116</a> , <a href="#">117</a> , <a href="#">118</a> , <a href="#">120</a> , <a href="#">128</a> , <a href="#">129</a> , <a href="#">130</a> , <a href="#">131</a>
<code>\@ehc</code> . . . . .	<a href="#">176</a> , <a href="#">207</a>
<code>\@ehd</code> . . . . .	<a href="#">208</a>
<code>\@gobble</code> . . . . .	<a href="#">136</a> , <a href="#">140</a> , <a href="#">181</a> , <a href="#">193</a> , <a href="#">231</a> , <a href="#">241</a> , <a href="#">251</a> , <a href="#">261</a>
<code>\@spaces</code> . . . . .	<a href="#">183</a> , <a href="#">195</a> , <a href="#">206</a> , <a href="#">225</a> , <a href="#">235</a> , <a href="#">245</a> , <a href="#">255</a> , <a href="#">265</a> , <a href="#">274</a>
<code>\@undefined</code> . . . . .	<a href="#">58</a>
A	
<code>\aftergroup</code> . . . . .	<a href="#">29</a>
C	
<code>\catcode</code> <a href="#">2</a> , <a href="#">3</a> , <a href="#">5</a> , <a href="#">6</a> , <a href="#">7</a> , <a href="#">8</a> , <a href="#">9</a> , <a href="#">10</a> , <a href="#">11</a> , <a href="#">12</a> , <a href="#">13</a> , <a href="#">33</a> , <a href="#">34</a> , <a href="#">36</a> , <a href="#">37</a> , <a href="#">38</a> , <a href="#">39</a> , <a href="#">40</a> , <a href="#">41</a> , <a href="#">42</a> , <a href="#">43</a> , <a href="#">44</a> , <a href="#">45</a> , <a href="#">46</a> , <a href="#">47</a> , <a href="#">48</a> , <a href="#">49</a> , <a href="#">69</a> , <a href="#">70</a> , <a href="#">72</a> , <a href="#">73</a> , <a href="#">74</a> , <a href="#">78</a> , <a href="#">79</a> , <a href="#">80</a> , <a href="#">81</a> , <a href="#">82</a> , <a href="#">83</a> , <a href="#">84</a> , <a href="#">87</a> , <a href="#">88</a> , <a href="#">90</a> , <a href="#">91</a> , <a href="#">92</a> , <a href="#">93</a> , <a href="#">97</a> , <a href="#">99</a>	
<code>\chardef</code> . . . . .	<a href="#">170</a>
<code>\check</code> . . . . .	<a href="#">115</a> , <a href="#">125</a> , <a href="#">126</a> , <a href="#">127</a>
<code>\ClassError</code> . . . . .	<a href="#">147</a>
<code>\ClassInfo</code> . . . . .	<a href="#">138</a> , <a href="#">140</a>
<code>\ClassWarning</code> . . . . .	<a href="#">144</a>
<code>\ClassWarningNoLine</code> . . . . .	<a href="#">145</a>
<code>\csname</code> <a href="#">14</a> , <a href="#">21</a> , <a href="#">50</a> , <a href="#">66</a> , <a href="#">76</a> , <a href="#">121</a> , <a href="#">151</a> , <a href="#">165</a>	
E	
<code>\empty</code> . . . . .	<a href="#">17</a> , <a href="#">18</a>
<code>\endcsname</code> . . . . .	<a href="#">14</a> , <a href="#">21</a> , <a href="#">50</a> , <a href="#">66</a> , <a href="#">76</a> , <a href="#">121</a> , <a href="#">151</a> , <a href="#">165</a>
<code>\endinput</code> . . . . .	<a href="#">29</a> , <a href="#">112</a>
<code>\endlinechar</code> . . . . .	<a href="#">4</a> , <a href="#">35</a> , <a href="#">71</a> , <a href="#">77</a> , <a href="#">89</a>
<code>\errhelp</code> . . . . .	<a href="#">213</a>
<code>\errmessage</code> . . . . .	<a href="#">216</a>
<code>\escapechar</code> . . . . .	<a href="#">186</a> , <a href="#">198</a> , <a href="#">212</a>
I	
<code>\ifcase</code> . . . . .	<a href="#">151</a>
<code>\ifnum</code> . . . . .	<a href="#">154</a>
<code>\ifx</code> . . . . .	<a href="#">15</a> , <a href="#">18</a> , <a href="#">21</a> , <a href="#">50</a> , <a href="#">58</a> , <a href="#">61</a> , <a href="#">121</a> , <a href="#">133</a> , <a href="#">151</a> , <a href="#">165</a>
<code>\immediate</code> . . . . .	<a href="#">23</a> , <a href="#">52</a> , <a href="#">187</a> , <a href="#">199</a> , <a href="#">204</a>
<code>\InfWarErr@AtEnd</code> <a href="#">95</a> , <a href="#">96</a> , <a href="#">112</a> , <a href="#">148</a> , <a href="#">281</a>	
<code>\InfWarErr@ehc</code> . . . . .	<a href="#">171</a> , <a href="#">207</a>
<code>\InfWarErr@ehd</code> . . . . .	<a href="#">175</a> , <a href="#">208</a>
<code>\InfWarErr@GenericError</code> <a href="#">202</a> , <a href="#">264</a> , <a href="#">273</a>	
<code>\InfWarErr@GenericInfo</code> <a href="#">178</a> , <a href="#">224</a> , <a href="#">234</a>	
<code>\InfWarErr@GenericWarning</code> . . . . .	<a href="#">190</a> , <a href="#">244</a> , <a href="#">254</a>
<code>\InfWarErr@help</code> . . . . .	<a href="#">213</a> , <a href="#">214</a>

<code>\InfWarErr@online</code>	. 150, 180, 192, 209	<code>\protected</code>	..... 168
<code>\InfWarErr@protected</code>	164, 178, 190, 202	<code>\ProvidesPackage</code>	..... 19, 67
<code>\InfWarErr@unused</code>	.... 170, 199, 204		
<code>\inputlineno</code>	..... 154, 162		
		<b>S</b>	
		<code>\space</code>	. 172, 173, 176, 182, 183, 194, 195, 205, 206, 219, 235, 255, 274
		<b>T</b>	
		<code>\the</code>	77, 78, 79, 80, 81, 82, 83, 84, 97, 162
		<code>\TMP@EnsureCode</code>	..... ..... 94, 101, 102, 103, 104, 105, 106, 107, 108, 109, 110, 111
		<b>W</b>	
		<code>\write</code>	..... 23, 52, 187, 199, 204
		<b>X</b>	
		<code>\x</code>	..... 14, 15, 18, 22, 26, 28, 51, 56, 66, 75, 87, 114, 122, 133
		<b>M</b>	
<code>\MessageBreak</code>	. 172, 184, 196, 210, 215		
		<b>N</b>	
<code>\newlinechar</code>	..... 185, 197, 211		
		<b>O</b>	
<code>\on@line</code>	..... 180, 187, 192, 199, 209		
		<b>P</b>	
<code>\PackageError</code>	..... 146		
<code>\PackageInfo</code>	..... 26, 134, 136		
<code>\PackageWarning</code>	..... 142		
<code>\PackageWarningNoLine</code>	..... 143		