

The `scrindex` package

Heiko Oberdiek*

2016/05/16 v1.2

Abstract

This package redefines environment ‘theindex’ of package `index`, if a class from KOMA-Script is loaded. Also option `idxotoc` is supported. Index preambles can be given either by means of package `index` or via the interface provided by KOMA-Script.

Contents

1	Documentation	1
1.1	Usage	2
1.2	Preambles	2
1.2.1	Class <code>scartcl</code>	2
1.2.2	Classes <code>scrreprt</code> and <code>scrbook</code>	2
2	Implementation	3
3	Installation	6
3.1	Download	6
3.2	Bundle installation	6
3.3	Package installation	7
3.4	Refresh file name databases	7
3.5	Some details for the interested	7
4	History	8
[2008/07/07 v1.0]		8
[2008/08/11 v1.1]		8
[2016/05/16 v1.2]		8
5	Index	8

1 Documentation

Package `index`, written by David M. Jones, detects the standard classes `article`, `report`, and `book`. It redefines environment ‘theindex’ for its needs. However, it does not know other classes such as KOMA-Script. This package closes the compatibility gap between KOMA-Script’s classes and package `index`.

Environment `theindex` is redefined to support both package `index` and KOMA-Script’s classes. Thus both the prologue of package `index` and the preamble of KOMA-Script’s classes are available. Also class option `idxotoc` of KOMA-Script is supported.

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

1.1 Usage

The package `scrindex` is loaded without options:

```
\usepackage{scrindex}
```

It loads package `index` and requests version 2004/01/20 or later. L^AT_EX's package interface allows multiple calls of the same package. The package is loaded at its first package loading command. At later times L^AT_EX only checks options and a requested version date. Therefore it does not harm to add `\usepackage{index}` before or after `\usepackage{scrindex}`.

Also the class does not matter. Environment `theindex` is only redefined for a supported class:

- `scrartcl`
- `scrreprt`
- `scrbook`

1.2 Preambles

Both the prologue of package `index` and the preamble of KOMA-Script's classes are supported. The position depends on the class.

1.2.1 Class `scrartcl`

```
1 \example1
2 \documentclass{scrartcl}
3 \usepackage{scrindex}
4 \setindexpreamble{Preamble of \texttt{scrartcl}\dotfill EOL}
5 \makeindex
6 \begin{document}
7 \section{First Section}
8 \index{first}
9 \index{section}
10 \printindex[default]%
11 [Prologue of package \texttt{index}\dotfill EOL]%
12 \end{document}
13 \example1
```

The prologue of package `index` is first set straight after the section title spanning both columns. Then the preamble of KOMA-Script follows in the first left column.

Index	
Prologue of package <code>index</code> EOL	
Preamble of <code>scrartcl</code> .. EOL	
first, 1	
section, 1	

1.2.2 Classes `scrreprt` and `scrbook`

```
14 \example2
15 \documentclass[openany]{scrbook}% or scrreprt
16 \usepackage{scrindex}
17 \setindexpreamble{Preamble of class \texttt{scrbook}\dotfill EOL}
18 \makeindex
19 \begin{document}
```

```

20 \chapter{First Chapter}
21 \index{first}
22 \index{chapter}
23 \printindex[default]%
24 [Prologue of package \texttt{index}\dotfill EOL]%
25 \end{document}
26 \end{example2}

```

The order of the two preambles are different for the classes `scrreprt` and `scrbook`. First KOMA-Script's chapter preamble is set, then the prologue of package `index` follows. Both are set spanning both columns.

Index	
Preamble of class <code>scrbook</code> EOL	
Prologue of package <code>index</code> EOL	
chapter, 1	
first, 1	

2 Implementation

```

27 \*package
28 \NeedsTeXFormat{LaTeX2e}
29 \ProvidesPackage{scrindex}
30 [2016/05/16 v1.2 Package index with KOMA-Script classes (HO)]%
31 \RequirePackage{index}[2004/01/20]%
32 \@ifclassloaded{scrartcl}{%
33   \renewenvironment{theindex}{%
34     \edef\indexname{%
35       \the\@nameuse{idxtitle@\@indextype}%
36     }%
37     \if@twocolumn
38       \@restonecolfalse
39     \else
40       \@restonecoltrue
41     \fi
42     \idx@heading
43     \thispagestyle{\indexpagestyle}%
44     \columnseprule\z@
45     \columnsep 35\p@
46     \index@preamble\par\nobreak
47     \parindent\z@
48     \parskip\z@ \@plus .3\p@\relax
49     \parfillskip\z@ \@plus 1fil\relax
50     \let\item\@idxitem
51   }{%
52     \if@restonecol
53       \onecolumn
54     \else
55       \clearpage
56     \fi
57   }%
58 \@ifclasswith{scrartcl}{idxtotoc}{%
59   \renewcommand*{\idx@heading}{%
60     \twocolumn[%
61       \addsec{\indexname}%

```

```

62     \ifx\index@prologue\@empty
63     \else
64         \index@prologue
65         \bigskip
66     \fi
67 ]%
68 \@mkboth{\indexname}{\indexname}%
69 }%
70 }{%
71 \renewcommand*{\idx@heading}{%
72 \twocolumn[%
73 \section*{\indexname}%
74 \ifx\index@prologue\@empty
75 \else
76 \index@prologue
77 \bigskip
78 \fi
79 ]%
80 \@mkboth{\indexname}{\indexname}%
81 }%
82 }%
83 }{}

84 \@ifclassloaded{scrreprt}{%
85 \renewenvironment{theindex}{%
86 \edef\indexname{%
87 \the\@nameuse{idxtitle@\@indextype}%
88 }%
89 \if@twocolumn
90 \@restonecolfalse
91 \else
92 \@restonecoltrue
93 \fi
94 \setchapterpreamble{\index@preamble}%
95 \idx@heading
96 \thispagestyle{\indexpagestyle}%
97 \columnseprule\z@
98 \columnsep 35\p@
99 \parindent\z@
100 \parskip\z@ \@plus .3\p@\relax
101 \parfillskip\z@ \@plus 1fil\relax
102 \let\item\@idxitem
103 }{%
104 \if@restonecol
105 \onecolumn
106 \else
107 \clearpage
108 \fi
109 }%
110 \@ifclasswith{scrreprt}{idx@toc}{%
111 \renewcommand*{\idx@heading}{%
112 \if@openright
113 \cleardoublepage
114 \else
115 \clearpage
116 \fi
117 \twocolumn[%
118 \addchap{\indexname}%
119 \ifx\index@prologue\@empty

```

```

120         \else
121         \index@prologue
122         \bigskip
123         \fi
124     ]%
125     \@mkboth{\indexname}{\indexname}%
126 }%
127 }{%
128     \renewcommand*{\idx@heading}{%
129         \if@openright
130         \cleardoublepage
131         \else
132         \clearpage
133         \fi
134         \twocolumn[%
135             \chapter*{\indexname}%
136             \ifx\index@prologue\@empty
137             \else
138             \index@prologue
139             \bigskip
140             \fi
141         ]%
142         \@mkboth{\indexname}{\indexname}%
143     }%
144 }%
145 }{}

146 \@ifclassloaded{scrbook}{%
147     \renewenvironment{theindex}{%
148         \edef\indexname{%
149             \the\@nameuse{idx@title@\@indextype}%
150         }%
151         \if@twocolumn
152             \@restonecolfalse
153         \else
154             \@restonecoltrue
155         \fi
156         \setchapterpreamble{\index@preamble}%
157         \idx@heading
158         \thispagestyle{\indexpagestyle}%
159         \columnseprule\z@
160         \columnsep 35\p@
161         \parindent\z@
162         \parskip\z@ \@plus .3\p@\relax
163         \parfillskip\z@ \@plus 1fil\relax
164         \let\item\@idxitem
165     }{%
166         \if@restonecol
167             \onecolumn
168         \else
169             \clearpage
170         \fi
171     }%
172 \@ifclasswith{scrbook}{idx@toc}{%
173     \renewcommand*{\idx@heading}{%
174         \if@openright
175         \cleardoublepage
176         \else
177         \clearpage

```

```

178     \fi
179     \twocolumn[%
180         \addchap{\indexname}%
181         \ifx\index@prologue\@empty
182             \else
183                 \index@prologue
184                 \bigskip
185             \fi
186     ]%
187     \@mkboth{\indexname}{\indexname}%
188 }%
189 }{%
190     \renewcommand*{\idx@heading}{%
191         \if@openright
192             \cleardoublepage
193         \else
194             \clearpage
195         \fi
196     \twocolumn[%
197         \chapter*{\indexname}%
198         \ifx\index@prologue\@empty
199             \else
200                 \index@prologue
201                 \bigskip
202             \fi
203     ]%
204     \@mkboth{\indexname}{\indexname}%
205 }%
206 }%
207 }{}
208 </package>

```

3 Installation

3.1 Download

Package. This package is available on CTAN¹:

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

[CTAN:macros/latex/contrib/oberdiek/scrindex.pdf](#) 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](#)

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

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
```

¹[CTAN:pkg/scrindex](#)

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 scrindex.dtx
```

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

```
scrindex.sty      → tex/latex/oberdiek/scrindex.sty
scrindex.pdf      → doc/latex/oberdiek/scrindex.pdf
scrindex-example1.tex → doc/latex/oberdiek/scrindex-example1.tex
scrindex-example2.tex → doc/latex/oberdiek/scrindex-example2.tex
scrindex.dtx      → source/latex/oberdiek/scrindex.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 `mktextlsr`.

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{scrindex.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 scrindex.dtx
makeindex -s gind.ist scrindex.idx
pdflatex scrindex.dtx
makeindex -s gind.ist scrindex.idx
pdflatex scrindex.dtx
```

4 History

[2008/07/07 v1.0]

- First version, also published in newsgroup [de.comp.text.tex](#):
“[Re: Zähler bei \index](#)”²

[2008/08/11 v1.1]

- Code is not changed.
- URLs updated.

[2016/05/16 v1.2]

- Documentation updates.

5 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	E
<code>\@empty</code> 62, 74, 119, 136, 181, 198	<code>\end</code> 12, 25
<code>\@idxitem</code> 50, 102, 164	
<code>\@ifclassloaded</code> 32, 84, 146	
<code>\@ifclasswith</code> 58, 110, 172	
<code>\@indextype</code> 35, 87, 149	
<code>\@mkboth</code> 68, 80, 125, 142, 187, 204	
<code>\@nameuse</code> 35, 87, 149	
<code>\@plus</code> 48, 49, 100, 101, 162, 163	
<code>\@restonecolfalse</code> 38, 90, 152	
<code>\@restonecoltrue</code> 40, 92, 154	
A	I
<code>\addchap</code> 118, 180	<code>\idx@heading</code> 42, 59, 71, 95, 111, 128, 157, 173, 190
<code>\addsec</code> 61	<code>\if@openright</code> 112, 129, 174, 191
	<code>\if@restonecol</code> 52, 104, 166
	<code>\if@twocolumn</code> 37, 89, 151
	<code>\ifx</code> 62, 74, 119, 136, 181, 198
	<code>\index</code> 8, 9, 21, 22
	<code>\index@preamble</code> 46, 94, 156
	<code>\index@prologue</code> 62, 64, 74, 76, 119, 121, 136, 138, 181, 183, 198, 200
	<code>\indexname</code> 34, 61, 68, 73, 80, 86, 118, 125, 135, 142, 148, 180, 187, 197, 204
	<code>\indexpagestyle</code> 43, 96, 158
	<code>\item</code> 50, 102, 164
B	M
<code>\begin</code> 6, 19	<code>\makeindex</code> 5, 18
<code>\bigskip</code> 65, 77, 122, 139, 184, 201	
C	N
<code>\chapter</code> 20, 135, 197	<code>\NeedsTeXFormat</code> 28
<code>\cleardoublepage</code> .. 113, 130, 175, 192	<code>\nobreak</code> 46
<code>\clearpage</code> 55, 107, 115, 132, 169, 177, 194	
<code>\columnsep</code> 45, 98, 160	
<code>\columnseprule</code> 44, 97, 159	
D	O
<code>\documentclass</code> 2, 15	<code>\onecolumn</code> 53, 105, 167
<code>\dotfill</code> 4, 11, 17, 24	
	P
	<code>\p@</code> 45, 48, 98, 100, 160, 162
	<code>\par</code> 46

²Url: <https://groups.google.com/group/de.comp.text.tex/msg/39575b5e2f29be1e>

<code>\parfillskip</code>	49, 101, 163	<code>\setindexpreamble</code>	4, 17
<code>\parindent</code>	47, 99, 161		
<code>\parskip</code>	48, 100, 162		
<code>\printindex</code>	10, 23		
<code>\ProvidesPackage</code>	29		
	R		T
<code>\renewcommand</code> 59, 71, 111, 128, 173, 190		<code>\texttt</code>	4, 11, 17, 24
<code>\renewenvironment</code>	33, 85, 147	<code>\the</code>	35, 87, 149
<code>\RequirePackage</code>	31	<code>\thispagestyle</code>	43, 96, 158
		<code>\twocolumn</code> ..	60, 72, 117, 134, 179, 196
	S		U
<code>\section</code>	7, 73	<code>\usepackage</code>	3, 16
<code>\setchapterpreamble</code>	94, 156		
			Z
		<code>\z@</code>	44, 47, 48, 49,
			97, 99, 100, 101, 159, 161, 162, 163