

# L<sup>A</sup>T<sub>E</sub>X Support For Adobe Caslon Fonts

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## Abstract

This package provides L<sup>A</sup>T<sub>E</sub>X support for the Adobe Caslon Fonts. Note that it does not provide the fonts themselves.

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Table 1: PFB Files

File	Font
awrg____.pfb	Adobe Caslon Regular
awi_____pfb	Adobe Caslon Italic
awsb____.pfb	Adobe Caslon Semibold
awsbi____.pfb	Adobe Caslon Semibold Italic
awb_____.pfb	Adobe Caslon Bold
awbi_____.pfb	Adobe Caslon Bold Italic

## 1 Introduction

This package provides support files for the Adobe Caslon font family in pdfL<sup>A</sup>T<sub>E</sub>X. (The LuaT<sub>E</sub>X and X<sub>E</sub>T<sub>E</sub>X engines support system fonts directly, but there are still good reasons to use pdfL<sup>A</sup>T<sub>E</sub>X.)

The expert font support is based on the `acaslon` package by Ulrik Vieth.

For text symbols such as footnote marks and currencies, the TS1 encoding is used, which must be activated by using the `textcomp` package.

## 2 Installation

The following instructions assume a TeX Directory Structure compliant TeX system. If you don't know what that is, you probably have one! Otherwise, you'll need to work out where to put the files yourself.

First, you need to purchase the fonts themselves: the `pfb` files are *not* included in the package. If you got the fonts from Adobe, do not rename the `pfb` files. However, if there are uppercase letters in your files' names, downcase them. If you obtained the files from another source, rename the fonts according to Table 1 and, if you have the expert fonts, Table 2. Install the files into `$TEXMF/fonts/type1/adobe/adobecaslon`.

Then, download <http://ctan.tug.org/install/fonts/psfonts/adobe/adobecaslon.tds.zip> and unzip this file in `$TEXMF`.

Finally, add the line `Map pac.map` to your `updmap.cfg` file, and run `updmap` and `texhash` to update the configuration files and file names database.

The package `adobecaslon.sty` provides a number of commands for using the font family (see Section 3).

### 2.1 Fonts for extra ligatures

There is a range of ligatures for the ‘long s’ letter in the Alternate fonts, but there are others it is nice to have (although the fonts do quite well without them). They are quite easy to make in a font editor such as FontForge (<http://fontforge.github.io>): for example, ‘longs longs i’ can be made by grafting the left-hand letter of the ‘longs longs’ ligature on to the ‘longs i’ ligature.

Table 2: Expert PFB Files

File	Font
awab____.pfb	Adobe Caslon Bold Alternate
awabi____.pfb	Adobe Caslon Bold Italic Alternate
awai____.pfb	Adobe Caslon Italic Alternate
awarg____.pfb	Adobe Caslon Regular Alternate
awasb____.pfb	Adobe Caslon Semibold Alternate
awasi____.pfb	Adobe Caslon Semibold Italic Alternate
awb_____.pfb	Adobe Caslon Bold
awbi_____.pfb	Adobe Caslon Bold Italic
awi_____pfb	Adobe Caslon Italic
awor_____.pfb	Adobe Caslon Ornaments
awrg_____.pfb	Adobe Caslon Regular
awsb_____.pfb	Adobe Caslon Semibold
awsbi_____.pfb	Adobe Caslon Semibold Italic
awsbs_____.pfb	Adobe Caslon SemiboldSC
awsc_____.pfb	Adobe Caslon Regular Small Caps & Oldstyle Figures
awssb_____.pfb	Adobe Caslon Swash Semibold Italic
awswb_____.pfb	Adobe Caslon Swash Bold Italic
awswi_____.pfb	Adobe Caslon Swash Italic
axb_____.pfb	Adobe Caslon Bold Expert
axbi_____.pfb	Adobe Caslon Bold Italic Expert
axi_____.pfb	Adobe Caslon Italic Expert
axrg_____.pfb	Adobe Caslon Regular Expert
axsb_____.pfb	Adobe Caslon Semibold Expert
axsbi_____.pfb	Adobe Caslon Semibold Italic Expert
awbio_____.pfb	Adobe Caslon Bold Italic OsF
awbos_____.pfb	Adobe Caslon Bold OsF
awio_____.pfb	Adobe Caslon Italic OsF
awsis_____.pfb	Adobe Caslon Semibold Italic OsF

Table 3: Supported extra ligatures

Ligature sequence	Code point	Standard glyph at code point
longs longs i	0x49	i
longs longs l	0x4c	l

Table 4: Extra ligature PFB Files

File	Font
awabe____.pfb	Adobe Caslon Bold Alternate Extra
awabie____.pfb	Adobe Caslon Bold Italic Alternate Extra
awaiae____.pfb	Adobe Caslon Italic Alternate Extra
awarge____.pfb	Adobe Caslon Regular Alternate Extra
awasbe____.pfb	Adobe Caslon Semibold Alternate Extra
awasie____.pfb	Adobe Caslon Semibold Italic Alternate Extra

Unfortunately, distributing these ligatures would probably be illegal in many countries, so if you want them you will have to make them for yourself.

Table 3 lists the extra ligatures supported, along with the code point at which each glyph should appear and the corresponding glyph name in the standard encoding. (It would be nice to support a wider range of extra ligatures if there were a way of detecting which the user had supplied.) Table 4 lists the required font files, one for each Alternate font. The extra ligatures are used when the `extraligs` package option is given.

### 3 Using L<sup>A</sup>T<sub>E</sub>X Style

To use the package, add to the preamble of your document the usual incantation `\usepackage[⟨options⟩]{adobecaslon}`.

Several options are defined; see Table 5.

Note that the `scaled` package option does not currently apply to the italic swash and ornament fonts.

The package provides Adobe fonts in two shapes: upright and italic, and in three weights: medium (`m`), semibold (`sb`) and bold (`b`). The can be selected in the usual way, for example

```
\fontfamily{pac}\fontshape{it}\fontseries{sb}\selectfont
```

`\adobecaslonfamily`      Alternatively you can use a declaration `\adobecaslonfamily` and a command  
`\textadobecaslon`

`\sbseries`      You can use the standard L<sup>A</sup>T<sub>E</sub>X commands to select the shape and weight of  
`\textsb`      the font. The package also provides a new declaration `\sbseries` and a command

Table 5: Package options

Option	Meaning
<code>expert</code>	Use expert fonts
<code>osf</code>	Use old-style (ranging) figures (requires expert fonts)
<code>swashit</code>	Use swash italics (requires expert fonts)
<code>alternate</code>	Use alternate old-style ligatures (requires expert fonts)
<code>longs</code>	Use long ‘s’ (requires expert fonts)
<code>c18th</code>	Use long ‘s’ with 18th century rules (require expert fonts)
<code>extraligs</code>	Use extra ligatures with <code>longs</code> or <code>c18th</code> (see Section 2.1)
<code>swashlongs</code>	Use long ‘s’ with swashes (requires expert fonts)
<code>normdefault</code>	Don’t make Caslon the default roman typeface
<code>rmdefault</code>	Make Caslon the default roman typeface (default)
<code>scaled=N</code>	Scale the font by the given factor (default: 1.00)
<code>bold</code>	Use bold faces for <code>\bfseries</code>
<code>semibold</code>	Use semibold faces for <code>\bfseries</code> (default)

`\textsb` modeled after the familiar commands `\bfseries` and `\textbf`, which select semi-bold weights.

<code>\adobecaslonexpert</code>	Select expert fonts.
<code>\adobecaslonosf</code>	Select expert fonts with old-style (ranging) figures.
<code>\adobecaslonalternate</code>	Select old-style alternate ligatures.
<code>\adobecaslonlongs</code>	Select long ‘s’.
<code>\adobecasloneighteenth</code>	Select long ‘s’ with 18th century rules (see Section 3.1).
<code>\adobecaslonswashit</code>	Select swash italics.
<code>\adobecaslonwashcaps</code>	Select swash caps.
<code>\adobecaslonornaments</code>	Select ornaments.
	Note that currently hyphenation of long ‘s’ does not work properly: TeX seems to register a word boundary before the hyphen, so the ‘s’ is shortened incorrectly. As a workaround, use <code>\noboundary</code> directly before such a hyphenation. This applies to automatically inserted hyphenation points as well as manual ones, so unfortunately complicates proof-reading whenever hyphenation is allowed.

### 3.1 Rules for ‘long s’

The following rules are implemented automatically for the use of ‘long s’ when the `longs` package option or `\adobecaslonlongs` command is used. Some come directly from the font; others are taken from <http://babelstone.blogspot.co.uk/2006/06/rules-for-long-s.html>. See also <http://english.stackexchange.com/questions/96408/during-what-period-of-history-did-english-use-ss-the-sharp-s-ligatu>

- ‘Long s’ becomes short at the end of a word.
- ‘Long s’ becomes short before apostrophe.
- ‘Long s’ becomes short before and after ‘f’. (But see section 3.2.)

- ‘Long s’ before manual hyphen (i.e., glyph `hyphen`; line-break hyphen is `hyphenchar`) becomes short.

The following rules must be applied manually:

- ‘Long s’ is retained at the end of abbreviations before the full stop: add `\noboundary` before stop.
- ‘Long s’ before line-break hyphen (glyph `hyphenchar`): this is incorrectly shortened, so add `\noboundary\-` at the hyphenation point.
- To shorten a ‘long s’ that is not automatically shortened, insert some sort of break after it.

The following additional rules are implemented when the `c18th` package option or `\adobecasloneteenth` command is used:

- The ‘esset’-style ligature becomes a ‘long s’–‘short s’ ligature.
- ‘Long s’ is shortened before b and k.

### 3.2 Bugs and future work

The rule that ‘long s’ becomes short before ‘f’ is not correctly applied in the case of double ‘long s’ followed by ‘f’, as the double-long-s ligature is not broken. This should be fixed manually, for example by writing `success\ful`.

It might seem odd that for version 2 of this package, prepared in 2014, we are still using fontinst and PostScript Type 1 fonts. The reason is that as of TeX Live 2012, LuaTeX seems to kern Adobe Caslon Pro poorly, and the `hlig` historical ligature rules don’t seem to work as expected.

The files currently supplied in binary form from Ulrik Vieth’s original package for the swash and ornament fonts should be generated.

Ligatures should be broken in small caps (st, ct) for correct operation of `\textls`. A workaround is to avoid using `\adobecaslonalternate` or `\adobecasloneteenth` with `\textsc`. It may be convenient to make a definition such as:

```
\newcommand{\smallcaps}[1]{{\adobecaslonexpert\textsc{#1}}}
```

## 4 Implementation

### 4.1 Identification

We start by declaring who we are.

```
1 <style>\NeedsTeXFormat{LaTeX2e}
2 <driver>\ProvidesFile{adobecaslon.dtx}
3 <style>\ProvidesPackage{adobecaslon}
4 <style> [2017/01/22 v2.2 Using Adobe Caslon Font in LaTeX]
```

And the driver code:

```
5 <*driver>
6 \documentclass{ltxdoc}
7 \usepackage{booktabs}
8 \usepackage{url}
9 \usepackage[tableposition=top]{caption}
10 \usepackage{hypdoc}
11 \usepackage[normdefault]{adobecaslon}
12 \usepackage{metalogo}
13 \PageIndex
14 \CodelineIndex
15 \RecordChanges
16 \EnableCrossrefs
17 \begin{document}
18 \DocInput{adobecaslon.dtx}
19 \end{document}
20 </driver>
```

### 4.2 Fontinst Driver

This follows [1].

First, the preamble

```
21 /*pac-drv, pac-expert-drv, pac-extraligs-drv*/
22 \input fontinst.sty
23 \substitutesilent{bx}{b}
```

Starting recording transforms:

```
24 \recordtransforms{pac-rec.tex}
25 </pac-drv, pac-expert-drv, pac-extraligs-drv>
```

The base fonts:

```
26 /*pac-drv, pac-expert-drv, pac-extraligs-drv*/
27 \transformfont{pacr8r}{\reencodefont{8r}{\fromafm{awrg_____}}}
28 \transformfont{pacri8r}{\reencodefont{8r}{\fromafm{awi_____}}}
29 \transformfont{pacs8r}{\reencodefont{8r}{\fromafm{awsb_____}}}
30 \transformfont{pacsi8r}{\reencodefont{8r}{\fromafm{awsbi_____}}}
31 \transformfont{pacb8r}{\reencodefont{8r}{\fromafm{awb_____}}}
32 \transformfont{pacbi8r}{\reencodefont{8r}{\fromafm{awbi_____}}}
```

Make oblique fonts for faking italic small caps:

```
33 \transformfont{pacro8r}{\slantfont{167}{\frommtx{pacr8r}}}
34 \transformfont{pacso8r}{\slantfont{167}{\frommtx{pacs8r}}}
35 
```

36 %  
37 % The use of expert fonts is optional, so we have a separate driver for them:  
38 % \begin{macrocode}  
39 /\*pac-expert-drv, pac-extraligs-drv)  
40 \transformfont{pacb7a}{\fromafm{awab\_\_\_\_}}  
41 \transformfont{pacbi7a}{\fromafm{awabi\_\_\_\_}}  
42 \transformfont{pacri7a}{\fromafm{awai\_\_\_\_}}  
43 \transformfont{pacr7a}{\fromafm{awarg\_\_\_\_}}  
44 \transformfont{pacs7a}{\fromafm{awasb\_\_\_\_}}  
45 \transformfont{paci7a}{\fromafm{awasi\_\_\_\_}}  
46 \transformfont{pacrp}{\fromafm{awor\_\_\_\_}}  
47 \transformfont{pacsc8x}{\fromafm{awsbs\_\_\_\_}}  
48 \transformfont{pacrc8x}{\fromafm{awsc\_\_\_\_}}  
49 \transformfont{paciw}{\fromafm{awssb\_\_\_\_}}  
50 \transformfont{pacbiw}{\fromafm{awsbw\_\_\_\_}}  
51 \transformfont{pacriw}{\fromafm{awswi\_\_\_\_}}  
52 \transformfont{pacb8x}{\fromafm{axb\_\_\_\_\_}}  
53 \transformfont{pacbi8x}{\fromafm{axbi\_\_\_\_\_}}  
54 \transformfont{pacri8x}{\fromafm{axi\_\_\_\_\_}}  
55 \transformfont{pacr8x}{\fromafm{axrg\_\_\_\_\_}}  
56 \transformfont{pacs8x}{\fromafm{axsb\_\_\_\_\_}}  
57 \transformfont{paci8x}{\fromafm{axsbi\_\_\_\_\_}}

Make expert oblique fonts for faking italic small caps:

```
58 \transformfont{pacro8x}{\slantfont{167}{\frommtx{pacr8x}}}
59 \transformfont{pacrco8x}{\slantfont{167}{\frommtx{pacrc8x}}}
60 \transformfont{pacso8x}{\slantfont{167}{\frommtx{pacs8x}}}
61 \transformfont{pacsco8x}{\slantfont{167}{\frommtx{pacsc8x}}}
62 
```

63

The “extraligs” fonts must be supplied by the user, so they have a separate driver:

```
63 /*pac-extraligs-drv)
64 \transformfont{pacb7ae}{\fromafm{awabe____}}
65 \transformfont{pacbi7ae}{\fromafm{awabie____}}
66 \transformfont{pacri7ae}{\fromafm{awaie____}}
67 \transformfont{pacr7ae}{\fromafm{awarge____}}
68 \transformfont{pacs7ae}{\fromafm{awasbe____}}
69 \transformfont{paci7ae}{\fromafm{awasie____}}
70 
```

There is no hook in `fontinst.sty` for writing our own preamble to `.fd` file. However, we need to add scaling commands to the preamble, so we patch `fontinst`:

```
71 /*pac-drv, pac-expert-drv, pac-extraligs-drv)
72 \fontinstcc
73 \def\fd_family{\#1\#2\#3{
```

```

74   \a_toks{\#3}
75   \edef\lowercase_file{\lowercase{
76     \edef\noexpand\lowercase_file{\#1#2.fd}}
77   \lowercase_file
78   \open_out{\lowercase_file}
79   \out_line{\percent_char~Filename:~\lowercase_file}
80   \out_line{\percent_char~Created~by:~tex~\jobname}
81   \out_line{\percent_char~Created~using~fontinst~v\fontinstversion}
82   \out_line{}
83   \out_line{\percent_char~THIS~FILE~SHOULD~BE~PUT~IN~A~TEX~INPUTS~
84   DIRECTORY}
85   \out_line{}
86   \out_line{\string\ProvidesFile{\lowercase_file}}
87   \out_lline{[
88     \the\year/
89     \ifnum10>\month0\fi\the\month/
90     \ifnum10>\day0\fi\the\day\space
91     Fontinst~v\fontinstversion\space
92     font~definitions~for~#1/#2.
93   ]}
94   \out_line{}

```

Here is our patch:

```

95   \out_line{\string\expandafter\string\ifx\string\csname\space
96     adobecaslon@scaled\string\endcsname\string\relax}
97   \out_line{\space\string\let\string\adobecaslon@scaled\string\@empty}
98   \out_line{\string\else}
99   \out_line{\space\string\edef\string\adobecaslon@scaled\left_brace_char
100    s*\string\csname\space adobecaslon@scaled\string\endcsname]
101    \right_brace_char\percent_char}
102   \out_line{\string\fi\percent_char}
103   \out_line{}

```

End of the patch.

```

104   \out_line{\string\DeclareFontFamily{\#1}{\#2}{\the\a_toks}}
105   {
106     \csname #1-\#2\endcsname
107     \out_line{}
108     \let\do_shape=\substitute_shape
109     \csname #1-\#2\endcsname
110     \let\do_shape=\remove_shape
111     \csname #1-\#2\endcsname
112   }
113   \x_cs\g_let{\#1-\#2}\x_relax
114   \out_line{}
115   \out_line{\string\endinput}
116   \close_out{Font~definitions}
117 }
118 \normalcc

```

Now we install the fonts. First T1:

```

119 \installfonts
120 \installfont{pacr8t}{pacr8r,newlatin}{t1}{T1}{pac}{m}{n}{ <->\string\adobecaslon@scaled}
121 \installfont{pacro8t}{pacro8r,newlatin}{t1}{T1}{pac}{m}{sl}{ <->\string\adobecaslon@scaled}
122 \installfont{pacrc8t}{pacr8r,newlatin}{t1c}{T1}{pac}{m}{sc}{ <->\string\adobecaslon@scaled}
123 \installfont{pacrco8t}{pacro8r,newlatin}{t1c}{T1}{pac}{m}{scit}{ <->\string\adobecaslon@scaled}
124 \installfont{pacri8t}{pacri8r,newlatin}{t1}{T1}{pac}{m}{it}{ <->\string\adobecaslon@scaled}
125 \installfont{pacs8t}{pacs8r,newlatin}{t1}{T1}{pac}{sb}{n}{ <->\string\adobecaslon@scaled}
126 \installfont{pacso8t}{pacso8r,newlatin}{t1}{T1}{pac}{sb}{sl}{ <->\string\adobecaslon@scaled}
127 \installfont{pacsc8t}{pacs8r,newlatin}{t1c}{T1}{pac}{sb}{sc}{ <->\string\adobecaslon@scaled}
128 \installfont{pacsc08t}{pacso8r,newlatin}{t1c}{T1}{pac}{sb}{scit}{ <->\string\adobecaslon@scaled}
129 \installfont{paci8t}{paci8r,newlatin}{t1}{T1}{pac}{sb}{it}{ <->\string\adobecaslon@scaled}
130 \installfont{pacb8t}{pacb8r,newlatin}{t1}{T1}{pac}{b}{n}{ <->\string\adobecaslon@scaled}
131 \installfont{pacbi8t}{pacbi8r,newlatin}{t1}{T1}{pac}{b}{it}{ <->\string\adobecaslon@scaled}

```

Then TS1:

```

132 \installfont{pacr8c}{pacr8r,textcomp}{ts1}{TS1}{pac}{m}{n}{ <->\string\adobecaslon@scaled}
133 \installfont{pacri8c}{pacri8r,textcomp}{ts1}{TS1}{pac}{m}{it}{ <->\string\adobecaslon@scaled}
134 \installfont{pacs8c}{pacs8r,textcomp}{ts1}{TS1}{pac}{sb}{n}{ <->\string\adobecaslon@scaled}
135 \installfont{paci8c}{paci8r,textcomp}{ts1}{TS1}{pac}{sb}{it}{ <->\string\adobecaslon@scaled}
136 \installfont{pacb8c}{pacb8r,textcomp}{ts1}{TS1}{pac}{b}{n}{ <->\string\adobecaslon@scaled}
137 \installfont{pacbi8c}{pacbi8r,textcomp}{ts1}{TS1}{pac}{b}{it}{ <->\string\adobecaslon@scaled}

```

And OT1:

```

138 \installfont{pacr7t}{pacr8r,newlatin}{ot1}{OT1}{pac}{m}{n}{ <->\string\adobecaslon@scaled}
139 \installfont{pacro7t}{pacro8r,newlatin}{ot1}{OT1}{pac}{m}{sl}{ <->\string\adobecaslon@scaled}
140 \installfont{pacrc7t}{pacr8r,newlatin}{ot1c}{OT1}{pac}{m}{sc}{ <->\string\adobecaslon@scaled}
141 \installfont{pacrco7t}{pacro8r,newlatin}{ot1c}{OT1}{pac}{m}{scit}{ <->\string\adobecaslon@scaled}
142 \installfont{pacri7t}{pacri8r,newlatin}{ot1}{OT1}{pac}{m}{it}{ <->\string\adobecaslon@scaled}
143 \installfont{pacs7t}{pacs8r,newlatin}{ot1}{OT1}{pac}{sb}{n}{ <->\string\adobecaslon@scaled}
144 \installfont{pacso7t}{pacso8r,newlatin}{ot1}{OT1}{pac}{sb}{sl}{ <->\string\adobecaslon@scaled}
145 \installfont{pacsc7t}{pacs8r,newlatin}{ot1c}{OT1}{pac}{sb}{sc}{ <->\string\adobecaslon@scaled}
146 \installfont{pacsc07t}{pacso8r,newlatin}{ot1c}{OT1}{pac}{sb}{scit}{ <->\string\adobecaslon@scaled}
147 \installfont{paci7t}{paci8r,newlatin}{ot1}{OT1}{pac}{sb}{it}{ <->\string\adobecaslon@scaled}
148 \installfont{pacb7t}{pacb8r,newlatin}{ot1}{OT1}{pac}{b}{n}{ <->\string\adobecaslon@scaled}
149 \installfont{pacbi7t}{pacbi8r,newlatin}{ot1}{OT1}{pac}{b}{it}{ <->\string\adobecaslon@scaled}
150 \endinstallfonts

```

Now the expert and extra ligature fonts, which we make available only in T1 and TS1 encodings. `/*pac-expert-drv,pac-extraligs-drv*/`

```

151 \installfonts
152 /*/pac-expert-drv, pac-extraligs-drv*/

```

First, the *expert* option:

```

153 /**pac-expert-drv*/
154 \installfont{pacr9e}{pacr8r,pacr8x,newlatin}{t1}{T1}{pacx}{m}{n}{ <->\string\adobecaslon@scaled}
155 \installfont{pacro9e}{pacro8r,pacro8x,newlatin}{t1}{T1}{pacx}{m}{sl}{ <->\string\adobecaslon@scaled}
156 \installfont{pacrc9e}{pacrc8x,pacr8x,newlatin}{t1}{T1}{pacx}{m}{sc}{ <->\string\adobecaslon@scaled}
157 \installfont{pacrco9e}{pacrco8x,pacro8x,newlatin}{t1}{T1}{pacx}{m}{scit}{ <->\string\adobecaslon@scaled}
158 \installfont{pacri9e}{pacri8r,paci8x,newlatin}{t1}{T1}{pacx}{m}{it}{ <->\string\adobecaslon@scaled}
159 \installfont{pacs9e}{pacs8r,pacs8x,newlatin}{t1}{T1}{pacx}{sb}{n}{ <->\string\adobecaslon@scaled}
160 \installfont{pacso9e}{pacso8r,pacso8x,newlatin}{t1}{T1}{pacx}{sb}{sl}{ <->\string\adobecaslon@scaled}

```

```

161 \installfont{pacsc9e}{pacsc8x,pacs8x,newlatin}{t1}{T1}{pacx}{sb}{sc}{ <->\string\adobecaslon@sc}
162 \installfont{pacsc09e}{pacsc08x,pacso8x,newlatin}{t1}{T1}{pacx}{sb}{scit}{ <->\string\adobecas}
163 \installfont{pacsi9e}{pacsi8r,paci8x,newlatin}{t1}{T1}{pacx}{sb}{it}{ <->\string\adobecaslon@}
164 \installfont{pacb9e}{pacb8r,pacb8x,newlatin}{t1}{T1}{pacx}{b}{n}{ <->\string\adobecaslon@scaled}
165 \installfont{pacbi9e}{pacbi8r,pacbi8x,newlatin}{t1}{T1}{pacx}{b}{it}{ <->\string\adobecaslon@sc}
166
167 \installfont{pacr9c}{pacr8r,pacr8x,textcomp}{ts1}{TS1}{pacx}{m}{n}{}
168 \installfont{acro9c}{acro8r,paco8x,textcomp}{ts1}{TS1}{pacx}{m}{sl}{}
169 \installfont{aci9c}{aci8r,paci8x,textcomp}{ts1i}{TS1}{pacx}{m}{it}{}
170 \installfont{pacs9c}{pacs8r,pacs8x,textcomp}{ts1}{TS1}{pacx}{sb}{n}{}
171 \installfont{pacso9c}{pacso8r,paco8x,textcomp}{ts1}{TS1}{pacx}{sb}{sl}{}
172 \installfont{pacsi9c}{pacsi8r,paci8x,textcomp}{ts1i}{TS1}{pacx}{sb}{it}{}
173 \installfont{pacb9c}{pacb8r,pacb8x,textcomp}{ts1}{TS1}{pacx}{b}{n}{}
174 \installfont{pacbi9c}{pacbi8r,pacbi8x,textcomp}{ts1i}{TS1}{pacx}{b}{it}{}
175 %      \end{macrocode}
176 %
177 % The \texttt{\osf} option:
178 %      \begin{macrocode}
179 \installfont{pacr9d}{pacr8r,pacr8x,newlatin}{t1j}{T1}{pacj}{m}{n}{ <->\string\adobecaslon@sca}
180 \installfont{acro9d}{acro8r,paco8x,newlatin}{t1j}{T1}{pacj}{m}{sl}{ <->\string\adobecaslon@}
181 \installfont{pacrc9d}{pacrc8x,pacr8x,newlatin}{t1j}{T1}{pacj}{m}{sc}{ <->\string\adobecaslon@}
182 \installfont{pacrco9d}{pacrco8x,paco8x,newlatin}{t1j}{T1}{pacj}{m}{scit}{ <->\string\adobecas}
183 \installfont{aci9d}{aci8r,paci8x,newlatin}{t1j}{T1}{pacj}{m}{it}{ <->\string\adobecaslon@}
184 \installfont{pacs9d}{pacs8r,pacs8x,newlatin}{t1j}{T1}{pacj}{sb}{n}{ <->\string\adobecaslon@sca}
185 \installfont{pacso9d}{pacso8r,paco8x,newlatin}{t1j}{T1}{pacj}{sb}{sl}{ <->\string\adobecaslon@}
186 \installfont{pacsc9d}{pacsc8x,pacs8x,newlatin}{t1j}{T1}{pacj}{sb}{sc}{ <->\string\adobecaslon@}
187 \installfont{pacsc09d}{pacsc08x,paco8x,newlatin}{t1j}{T1}{pacj}{sb}{scit}{ <->\string\adobecas}
188 \installfont{pacsi9d}{pacsi8r,paci8x,newlatin}{t1j}{T1}{pacj}{sb}{it}{ <->\string\adobecaslon@}
189 \installfont{pacb9d}{pacb8r,pacb8x,newlatin}{t1j}{T1}{pacj}{b}{n}{ <->\string\adobecaslon@sca}
190 \installfont{pacbi9d}{pacbi8r,pacbi8x,newlatin}{t1j}{T1}{pacj}{b}{it}{ <->\string\adobecaslon@}

The alternate option:
191 \installfont{pacra9d}{pacr8r,pacr7a,pacr8x,newlatina}{t1aj}{T1}{paca}{m}{n}{ <->\string\adobec}
192 \installfont{pacroa9d}{pacro8r,paco8x,newlatina}{t1aj}{T1}{paca}{m}{sl}{ <->\string\adobecas}
193 \installfont{pacrca9d}{pacrc8x,pacr8x,newlatinasc}{t1aj}{T1}{paca}{m}{sc}{ <->\string\adobecas}
194 \installfont{pacrcoa9d}{pacrco8x,paco8x,newlatinasc}{t1aj}{T1}{paca}{m}{scit}{ <->\string\ado}
195 \installfont{pacria9d}{aci8r,paci7a,paci8x,newlatina}{t1aj}{T1}{paca}{m}{it}{ <->\string\ad}
196 \installfont{pacsa9d}{pacs8r,pacs7a,pacs8x,newlatina}{t1aj}{T1}{paca}{sb}{n}{ <->\string\adobe}
197 \installfont{pacsoa9d}{pacso8r,paco8x,newlatina}{t1aj}{T1}{paca}{sb}{sl}{ <->\string\adobecas}
198 \installfont{pacsc9d}{pacsc8x,pacs8x,newlatinasc}{t1aj}{T1}{paca}{sb}{sc}{ <->\string\adobecas}
199 \installfont{pacsc9d}{pacsc08x,paco8x,newlatinasc}{t1aj}{T1}{paca}{sb}{scit}{ <->\string\adob}
200 \installfont{pacsia9d}{pacsi8r,paci7a,paci8x,newlatina}{t1aj}{T1}{paca}{sb}{it}{ <->\string\ad}
201 \installfont{pacba9d}{pacb8r,pacb7a,pacb8x,newlatina}{t1aj}{T1}{paca}{b}{n}{ <->\string\adobe}
202 \installfont{pacbia9d}{pacbi8r,paci7a,paci8x,newlatina}{t1aj}{T1}{paca}{b}{it}{ <->\string\ad}
203
204 \installfont{pacra9c}{pacr8r,pacr8x,textcomp}{ts1}{TS1}{paca}{m}{n}{}
205 \installfont{pacroa9c}{pacro8r,paco8x,textcomp}{ts1}{TS1}{paca}{m}{sl}{}
206 \installfont{pacria9c}{aci8r,paci8x,textcomp}{ts1i}{TS1}{paca}{m}{it}{}
207 \installfont{pacsa9c}{pacs8r,pacs8x,textcomp}{ts1}{TS1}{paca}{sb}{n}{}
208 \installfont{pacsoa9c}{pacso8r,paco8x,textcomp}{ts1}{TS1}{paca}{sb}{sl}{}

```

```

209 \installfont{pacsia9c}{pacsi8r,paci8x,textcomp}{ts1i}{TS1}{paca}{sb}{it}{}
210 \installfont{pacba9c}{pacb8r,pacb8x,textcomp}{ts1}{TS1}{paca}{b}{n}{}
211 \installfont{pacbia9c}{pacbi8r,pacbi8x,textcomp}{ts1i}{TS1}{paca}{b}{it}{}

```

The longs option:

```

212 \installfont{pacraa9d}{pacr8r,pacr7a,pacr8x,newlatinaa}{t1aaaj}{T1}{paca}{m}{n}{ <->\string\adobe
213 \installfont{pacroaa9d}{acro8r,paco8x,newlatinaa}{t1aaaj}{T1}{paca}{m}{s1}{ <->\string\adobe
214 \installfont{pacrcaa9d}{pacrc8x,pacr8x,newlatinaasc}{t1aaaj}{T1}{paca}{m}{sc}{ <->\string\adobe
215 \installfont{pacrcoaa9d}{pacrc08x,paco8x,newlatinaasc}{t1aaaj}{T1}{paca}{m}{scit}{ <->\string\adobe
216 \installfont{pacriaa9d}{aci8r,paci7a,paci8x,newlatinaa}{t1aaaj}{T1}{paca}{m}{it}{ <->\string\adobe
217 \installfont{pacsaaa9d}{pacs8r,pacs7a,pacs8x,newlatinaa}{t1aaaj}{T1}{paca}{sb}{n}{ <->\string\adobe
218 \installfont{pacsoaaa9d}{pacso8r,paco8x,newlatinaa}{t1aaaj}{T1}{paca}{sb}{s1}{ <->\string\adobe
219 \installfont{pacscaa9d}{pacsc8x,pacs8x,newlatinaasc}{t1aaaj}{T1}{paca}{sb}{sc}{ <->\string\adobe
220 \installfont{pacscoaa9d}{pacsc08x,paco8x,newlatinaasc}{t1aaaj}{T1}{paca}{sb}{scit}{ <->\string\adobe
221 \installfont{pacsiaa9d}{pacsi8r,paci7a,paci8x,newlatinaa}{t1aaaj}{T1}{paca}{sb}{it}{ <->\string\adobe
222 \installfont{pacbaa9d}{pacb8r,pacb7a,pacb8x,newlatinaa}{t1aaaj}{T1}{paca}{b}{n}{ <->\string\adobe
223 \installfont{pacbiaa9d}{pacbi8r,pacbi7a,pacbi8x,newlatinaa}{t1aaaj}{T1}{paca}{b}{it}{ <->\string\adobe
224
225 \installfont{pacraa9c}{pacr8r,pacr8x,textcomp}{ts1}{TS1}{paca}{m}{n}{}
226 \installfont{pacroaa9c}{acro8r,paco8x,textcomp}{ts1}{TS1}{paca}{m}{s1}{}
227 \installfont{pacriaa9c}{aci8r,paci8x,textcomp}{ts1i}{TS1}{paca}{m}{it}{}
228 \installfont{pacsaaa9c}{pacs8r,pacs8x,textcomp}{ts1}{TS1}{paca}{sb}{n}{}
229 \installfont{pacsoaaa9c}{pacso8r,paco8x,textcomp}{ts1}{TS1}{paca}{sb}{s1}{}
230 \installfont{pacsiaa9c}{pacsi8r,paci8x,textcomp}{ts1i}{TS1}{paca}{sb}{it}{}
231 \installfont{pacbaa9c}{pacb8r,pacb8x,textcomp}{ts1}{TS1}{paca}{b}{n}{}
232 \installfont{pacbiaa9c}{pacbi8r,pacbi8x,textcomp}{ts1i}{TS1}{paca}{b}{it}{}

```

The c18th option:

```

233 \installfont{pacraa89d}{pacr8r,pacr7a,pacr8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{m}{n}{ <->\string\adobe
234 \installfont{pacroaa89d}{acro8r,paco8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{m}{s1}{ <->\string\adobe
235 \installfont{pacrcaa89d}{pacrc8x,pacr8x,newlatinaa8sc}{t1aa8j}{T1}{paca}{8}{m}{sc}{ <->\string\adobe
236 \installfont{pacrcoaa89d}{pacrc08x,paco8x,newlatinaa8sc}{t1aa8j}{T1}{paca}{8}{m}{scit}{ <->\string\adobe
237 \installfont{pacriaa89d}{aci8r,paci7a,paci8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{m}{it}{ <->\string\adobe
238 \installfont{pacsaaa89d}{pacs8r,pacs7a,pacs8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{sb}{n}{ <->\string\adobe
239 \installfont{pacsoaaa89d}{pacso8r,paco8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{sb}{s1}{ <->\string\adobe
240 \installfont{pacscaa89d}{pacsc8x,pacs8x,newlatinaa8sc}{t1aa8j}{T1}{paca}{8}{sb}{sc}{ <->\string\adobe
241 \installfont{pacscoaa89d}{pacsc08x,paco8x,newlatinaa8sc}{t1aa8j}{T1}{paca}{8}{sb}{scit}{ <->\string\adobe
242 \installfont{pacsiaa89d}{pacsi8r,paci7a,paci8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{sb}{it}{ <->\string\adobe
243 \installfont{pacbaa89d}{pacb8r,pacb7a,pacb8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{b}{n}{ <->\string\adobe
244 \installfont{pacbiaa89d}{pacbi8r,pacbi7a,pacbi8x,newlatinaa8}{t1aa8j}{T1}{paca}{8}{b}{it}{ <->\string\adobe
245
246 \installfont{pacraa89c}{pacr8r,pacr8x,textcomp}{ts1}{TS1}{paca}{8}{m}{n}{}
247 \installfont{pacroaa89c}{acro8r,paco8x,textcomp}{ts1}{TS1}{paca}{8}{m}{s1}{}
248 \installfont{pacriaa89c}{aci8r,paci8x,textcomp}{ts1i}{TS1}{paca}{8}{m}{it}{}
249 \installfont{pacsaaa89c}{pacs8r,pacs8x,textcomp}{ts1}{TS1}{paca}{8}{sb}{n}{}
250 \installfont{pacsoaaa89c}{pacso8r,paco8x,textcomp}{ts1}{TS1}{paca}{8}{sb}{s1}{}
251 \installfont{pacsiaa89c}{pacsi8r,paci8x,textcomp}{ts1i}{TS1}{paca}{8}{sb}{it}{}
252 \installfont{pacbaa89c}{pacb8r,pacb8x,textcomp}{ts1}{TS1}{paca}{8}{b}{n}{}
253 \installfont{pacbiaa89c}{pacbi8r,pacbi8x,textcomp}{ts1i}{TS1}{paca}{8}{b}{it}{}
254 </pac-expert-drv>

```

Now the extra ligature fonts. First, the longs with `extraligs` option (see Section 2.1):

```

255 <*>pac-extraligs-drv>
256 \installfont{pacraae9d}{pacr8r,pacr7a,pacr7ae,pacr8x,newlatinaae}{t1aae}{T1}{pacaae}{m}{n}{ <->\string\ad}
257 \installfont{pacroaae9d}{pacro8r,pacro8x,newlatinaae}{t1aae}{T1}{pacaae}{m}{s1}{ <->\string\ad}
258 \installfont{pacrcaaee9d}{pacrc8x,pacr8x,newlatinaaesc}{t1aae}{T1}{pacaae}{m}{sc}{ <->\string\ad}
259 \installfont{pacrcoaae9d}{pacrc08x,pacro8x,newlatinaaesc}{t1aae}{T1}{pacaae}{m}{scit}{ <->\string\ad}
260 \installfont{pacriaae9d}{pacri8r,pacri7a,paci7ae,paci8x,newlatinaae}{t1aae}{T1}{pacaae}{m}{s1}{ <->\string\ad}
261 \installfont{pacsaae9d}{pacs8r,pacs7a,pacs7ae,pacs8x,newlatinaae}{t1aae}{T1}{pacaae}{sb}{n}{ <->\string\ad}
262 \installfont{pacsoaae9d}{pacso8r,paco8x,newlatinaae}{t1aae}{T1}{pacaae}{sb}{s1}{ <->\string\ad}
263 \installfont{pacscaaee9d}{pacsc8x,pacs8x,newlatinaaesc}{t1aae}{T1}{pacaae}{sb}{sc}{ <->\string\ad}
264 \installfont{pacscoaae9d}{pacsc08x,paco8x,newlatinaaesc}{t1aae}{T1}{pacaae}{sb}{scit}{ <->\string\ad}
265 \installfont{pacsiaae9d}{pacsi8r,paci7a,paci7ae,paci8x,newlatinaae}{t1aae}{T1}{pacaae}{sb}{s1}{ <->\string\ad}
266 \installfont{pacbaae9d}{pacb8r,pacb7a,pacb7ae,pacb8x,newlatinaae}{t1aae}{T1}{pacaae}{b}{n}{ <->\string\ad}
267 \installfont{pacbiaae9d}{pacbi8r,pacbi7a,paci7ae,paci8x,newlatinaae}{t1aae}{T1}{pacaae}{b}{s1}{ <->\string\ad}
268
269 \installfont{pacraae9c}{pacr8r,pacr8x,textcomp}{ts1}{TS1}{pacaae}{m}{n}{}
270 \installfont{pacroaae9c}{pacro8r,paco8x,textcomp}{ts1}{TS1}{pacaae}{m}{s1}{}
271 \installfont{pacriaae9c}{pacri8r,paci8x,textcomp}{ts1i}{TS1}{pacaae}{m}{it}{}
272 \installfont{pacsaae9c}{pacs8r,pacs8x,textcomp}{ts1}{TS1}{pacaae}{sb}{n}{}
273 \installfont{pacsoaae9c}{pacso8r,paco8x,textcomp}{ts1}{TS1}{pacaae}{sb}{s1}{}
274 \installfont{pacsiaae9c}{pacsi8r,paci8x,textcomp}{ts1i}{TS1}{pacaae}{sb}{it}{}
275 \installfont{pacbaae9c}{pacb8r,pacb8x,textcomp}{ts1}{TS1}{pacaae}{b}{n}{}
276 \installfont{pacbiaae9c}{pacbi8r,pacbi7a,paci7ae,paci8x,newlatinaae}{ts1i}{TS1}{pacaae}{b}{it}{}

```

Then the c18th with `extraligs` option:

```

277 \installfont{pacraae8e9d}{pacr8r,pacr7a,pacr7ae,pacr8x,newlatinaae8e}{t1aa8je}{T1}{pacaa8e}{m}{n}{ <->\string\ad}
278 \installfont{pacroaa8e9d}{pacro8r,paco8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{m}{s1}{ <->\string\ad}
279 \installfont{pacrcaa8e9d}{pacrc8x,pacr8x,newlatinaa8esc}{t1aa8je}{T1}{pacaa8e}{m}{sc}{ <->\string\ad}
280 \installfont{pacrcoaa8e9d}{pacrc08x,paco8x,newlatinaa8esc}{t1aa8je}{T1}{pacaa8e}{m}{scit}{ <->\string\ad}
281 \installfont{pacriaa8e9d}{pacri8r,paci7a,paci7ae,paci8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{s1}{ <->\string\ad}
282 \installfont{pacsaa8e9d}{pacs8r,pacs7a,pacs7ae,pacs8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{sb}{s1}{ <->\string\ad}
283 \installfont{pacsoaa8e9d}{pacso8r,paco8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{sb}{s1}{ <->\string\ad}
284 \installfont{pacscaa8e9d}{pacsc8x,pacs8x,newlatinaa8esc}{t1aa8je}{T1}{pacaa8e}{sb}{sc}{ <->\string\ad}
285 \installfont{pacscoaa8e9d}{pacsc08x,paco8x,newlatinaa8esc}{t1aa8je}{T1}{pacaa8e}{sb}{scit}{ <->\string\ad}
286 \installfont{pacsiaaa8e9d}{pacsi8r,paci7a,paci7ae,paci8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{s1}{ <->\string\ad}
287 \installfont{pacbaaa8e9d}{pacb8r,pacb7a,pacb7ae,pacb8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{b}{n}{ <->\string\ad}
288 \installfont{pacbiaaa8e9d}{pacbi8r,pacbi7a,paci7ae,paci8x,newlatinaa8e}{t1aa8je}{T1}{pacaa8e}{b}{s1}{ <->\string\ad}
289
290 \installfont{pacraaa8e9c}{pacr8r,pacr8x,textcomp}{ts1}{TS1}{pacaa8e}{m}{n}{}
291 \installfont{pacroaa8e9c}{pacro8r,paco8x,textcomp}{ts1}{TS1}{pacaa8e}{m}{s1}{}
292 \installfont{pacriaaa8e9c}{pacri8r,paci8x,textcomp}{ts1i}{TS1}{pacaa8e}{m}{it}{}
293 \installfont{pacsaaa8e9c}{pacs8r,pacs8x,textcomp}{ts1}{TS1}{pacaa8e}{sb}{n}{}
294 \installfont{pacsoaa8e9c}{pacso8r,paco8x,textcomp}{ts1}{TS1}{pacaa8e}{sb}{s1}{}
295 \installfont{pacsiaaa8e9c}{pacsi8r,paci8x,textcomp}{ts1i}{TS1}{pacaa8e}{sb}{it}{}
296 \installfont{pacbaaa8e9c}{pacb8r,pacb8x,textcomp}{ts1}{TS1}{pacaa8e}{b}{n}{}
297 \installfont{pacbiaaa8e9c}{pacbi8r,pacbi7a,paci7ae,paci8x,newlatinaa8e}{ts1i}{TS1}{pacaa8e}{b}{it}{}
298 </>pac-extraligs-drv

```

End the fonts installation: `/*pac-expert-drv,pac-extraligs-drv*/`

```

299 \endinstallfonts
|/pac-expert-drv,pac-extraligs-drv}; End the driver:
300 \endrecordtransforms
301 \bye
302 </pac-drv, pac-expert-drv, pac-extraligs-drv>

```

### 4.3 Fontmap Generation

This is a standard procedure [1]

```

303 /*pac-map)
304 \input finstmsc.sty
305 \resetstr{PSfontsuffix}{.pfb}
306 \adddriver{dvips}{pac.map}
307 \input pac-rec.tex
308 \donedrivers
309 \bye
310 </pac-map>

```

### 4.4 Metrics

Old-style ligatures on modern letters.

```

|*newlatina;
311 \relax
312 \metrics
313
314 \inputmtx{newlatin}
315 \inputmtx{oldstyle-kerning}
316
317 \unfakable{st}
318 \unfakable{ct}
319
320 \endmetrics
|/newlatina;

```

Old-style ligatures with small caps.

```

|*newlatinasc;
321 \relax
322 \metrics
323
324 \inputmtx{newlatin}
325 \inputmtx{oldstyle-kerning}
326
327 \setglyph{st}
328   \glyph{s}{1000}
329   \glyph{t}{1000}
330 \endsetglyph
331 \setglyph{ct}
332   \glyph{c}{1000}

```

```

333 \glyph{t}{1000}
334 \endsetglyph
335
336 \endmetrics
|/newlatinasc;
The 'long s' variant.
|*newlatinaa;
337 \relax
338 \metrics
339
340 \inputmtx{newlatina}
341 \inputmtx{longs-kerning}
342
343 \unfakable{longs}
344 \unfakable{longsh}
345 \unfakable{longsi}
346 \unfakable{longsl}
347 \unfakable{longst}
348 \unfakable{longdbls}
349
350 \endmetrics
|/newlatinaa;
The 'long s' variant for small caps.
|*newlatinaasc;
351 \relax
352 \metrics
353
354 \inputmtx{newlatinasc}
355 \inputmtx{longs-kerning}
356
357 \setglyph{longs}
358 \glyph{s}{1000}
359 \endsetglyph
360 \setglyph{longsh}
361 \glyph{s}{1000}
362 \glyph{h}{1000}
363 \endsetglyph
364 \setglyph{longsi}
365 \glyph{s}{1000}
366 \glyph{i}{1000}
367 \endsetglyph
368 \setglyph{longsl}
369 \glyph{s}{1000}
370 \glyph{l}{1000}
371 \endsetglyph
372 \setglyph{longst}
373 \glyph{s}{1000}
374 \glyph{t}{1000}

```

```

375 \endsetglyph
376 \setglyph{longdbls}
377   \glyph{s}{1000}
378   \glyph{s}{1000}
379 \endsetglyph
380
381 \endmetrics
382 \relax
383 \metrics
384
385 \inputmtx{newlatinaasc}
386 \inputmtx{longdbls-kerning}
387
388 \unfakable{longdblsi}
389 \unfakable{longdbls1}
390
391 \endmetrics
392 \relax
393 \metrics
394
395 \inputmtx{newlatinaasc}
396 \inputmtx{longdbls-kerning}
397
398 \setglyph{longdblsi}
399   \glyph{s}{1000}
400   \glyph{s}{1000}
401   \glyph{i}{1000}
402 \endsetglyph
403 \setglyph{longdbls1}
404   \glyph{s}{1000}
405   \glyph{s}{1000}
406   \glyph{l}{1000}
407 \endsetglyph
408
409 \endmetrics
410 \relax
411 \metrics
412

```

The ‘long s’ variant with extra ligatures.  
 $\text{\textit{*newlatinaae}}$

The ‘long s’ variant with extra ligatures for small caps.  
 $\text{\textit{*newlatinaaesc}}$

The 18th century variant.  
 $\text{\textit{*newlatinaa8}}$

```

413 \inputmtx{newlatinaa}
414 \inputmtx{longss-kerning}
415 \inputmtx{longss-glyph}
416
417 \endmetrics
|/newlatinaa8;
The 18th century variant for small caps.
|*newlatinaa8sc;
418 \relax
419 \metrics
420
421 \inputmtx{newlatinaasc}
422 \inputmtx{longss-kerning}
423 \inputmtx{longss-glyph-sc}
424
425 \endmetrics
|/newlatinaa8sc;
The 18th century variant with extra ligatures.
|*newlatinaa8e;
426 \relax
427 \metrics
428
429 \inputmtx{newlatinaae}
430 \inputmtx{longss-kerning}
431 \inputmtx{longss-glyph}
432
433 \endmetrics
|/newlatinaa8e;
The 18th century variant with extra ligatures for small caps.
|*newlatinaa8esc;
434 \relax
435 \metrics
436
437 \inputmtx{newlatinaaesc}
438 \inputmtx{longss-kerning}
439 \inputmtx{longss-glyph-sc}
440
441 \endmetrics
|/newlatinaa8esc;
A fragment for kerning old-style ligatures.
442 {*oldstyle-kerning}
443 \setleftkerning{st}{s}{1000}
444 \setleftkerning{ct}{c}{1000}
445 \setrightkerning{st}{t}{1000}
446 \setrightkerning{ct}{t}{1000}

```

i/oldstyle-kerning;  
A fragment for kerning ‘long s’ ligatures.

```
447 {*longs-kerning}  
448 \setleftkerning{longsh}{longs}{1000}  
449 \setrightkerning{longsh}{h}{1000}  
450 \setleftkerning{longsi}{longs}{1000}  
451 \setrightkerning{longsi}{i}{1000}  
452 \setleftkerning{longsl}{longs}{1000}  
453 \setrightkerning{longsl}{l}{1000}  
454 \setleftkerning{longst}{longs}{1000}  
455 \setrightkerning{longst}{t}{1000}  
456 \setleftrightkerning{longdbs}{longs}{1000}
```

i/longs-kerning;  
A fragment for kerning ‘double long s’ ligatures.

```
457 {*longdbs-kerning}  
458 \setleftkerning{longdblsi}{longs}{1000}  
459 \setrightkerning{longdblsi}{i}{1000}  
460 \setleftkerning{longdbisl}{longs}{1000}  
461 \setrightkerning{longdbisl}{l}{1000}
```

i/longdbs-kerning;  
A fragment for kerning long ‘s’ followed by ‘s’.

```
462 {*longss-kerning}  
463 \setleftkerning{longss}{longs}{1000}  
464 \setrightkerning{longss}{s}{1000}
```

i/longss-kerning;  
A fragment for a long ‘s’ followed by ‘s’ glyph.

```
465 {*longss-glyph}  
466 \setglyph{longss}  
467 \glyph{longs}{1000}  
468 \glyph{s}{1000}  
469 \endsetglyph
```

i/longss-glyph;  
A fragment for a long ‘s’ followed by ‘s’ glyph for small caps.

```
470 {*longss-glyph-sc}  
471 \setglyph{longss}  
472 \glyph{s}{1000}  
473 \glyph{s}{1000}  
474 \endsetglyph
```

i/longss-glyph-sc;

## 4.5 Encodings

The variant for old-style figures:

```
475 {*t1aj}
```

```

476 \relax
477 \encoding
478
479 %% Define the parameters to produce a font with old-style figures
480 \setcommand{digit}{\#1oldstyle}
481
482 \inputetx{t1a}
483
484 \endencoding
485 </t1aj>

```

The ‘long s’ variant with old-style figures.

```

486 <*t1aa{j}
487 \relax
488 \encoding
489
490 %% Define the parameters to produce a font with old-style figures
491 \setcommand{digit}{\#1oldstyle}
492
493 \inputetx{t1aa}
494
495 \endencoding
496 </t1aa{j}

```

The eighteenth-century variant with old-style figures.

```

497 <*t1aa8{j}
498 \relax
499 \encoding
500
501 %% Define the parameters to produce a font with old-style figures
502 \setcommand{digit}{\#1oldstyle}
503
504 \inputetx{t1aa8}
505
506 \endencoding
507 </t1aa8{j}

```

The ‘long s’ variant with old-style figures and extra ligatures.

```

508 <*t1aa{je}
509 \relax
510 \encoding
511
512 %% Define the parameters to produce a font with old-style figures
513 \setcommand{digit}{\#1oldstyle}
514
515 \inputetx{t1aae}
516
517 \endencoding
518 </t1aa{je}

```

The eighteenth-century variant with old-style figures and extra ligatures.

```
519 <*t1aa8je>
520 \relax
521 \encoding
522
523 %% Define the parameters to produce a font with old-style figures
524 \setcommand{digit#1}{\oldstyle}
525
526 \inputetx{t1aa8e}
527
528 \endencoding
529 </t1aa8je>
```

## 4.6 Font definitions

We define the ornament and swash font encodings directly, in files from Ulrik Vieth's `pacaslon` package.

## 4.7 Style File

Declare the package options:

```
530 <*style>
531 \RequirePackage{kvoptions}
532 \RequirePackage{ifthen}
533 \def\adobecaslonf@ntsuffix{}
534 \DeclareVoidOption{expert}{\def\adobecaslonf@ntsuffix{x}}
535 \DeclareVoidOption{osf}{\def\adobecaslonf@ntsuffix{j}}
536 \DeclareVoidOption{swashit}{\def\adobecaslonf@ntsuffix{w}}
537 \DeclareVoidOption{alternate}{\def\adobecaslonf@ntsuffix{a}}
538 \newif\ifadobecaslon@longs\adobecaslon@longsfalse
539 \DeclareVoidOption{longs}{\def\adobecaslonf@ntsuffix{aa}\adobecaslon@longstrue}
540 \newif\ifadobecaslon@eighteenth\adobecaslon@eighteenthfalse
541 \DeclareVoidOption{c18th}{\def\adobecaslonf@ntsuffix{aa8}\adobecaslon@eighteenthtrue}
542 \DeclareVoidOption{swashlongs}{\def\adobecaslonf@ntsuffix{aaw}}
543 \DeclareBoolOption[false]{extraligs}
544 \DeclareBoolOption[true]{rmdefault}
545 \DeclareComplementaryOption{normdefault}{rmdefault}
546 \DeclareStringOption[1.00]{scaled}
547 \DeclareBoolOption{bold}
548 \DeclareComplementaryOption{semibold}{bold}
549 \ProcessKeyvalOptions*
550 \def\adobecaslonf@ntextraligs{}
551 \ifadobecaslon@extraligs
552   \def\adobecaslonf@ntextraligs{e}
553   \ifthenelse{\boolean{adobecaslon@longs}\OR\boolean{adobecaslon@eighteenth}}{}{%
554     \edef\adobecaslonf@ntsuffix{\adobecaslonf@ntsuffix e}{}}
555 \fi
556 \ifadobecaslon@rmdefault
557   \renewcommand{\rmdefault}{\adobecaslonf@ntsuffix}
```

```

558 \ifadobecaslon@bold\else
559   \def\bfdefault{sb}
560 \fi
561 \fi

Some new commands:
562 \DeclareRobustCommand\adobecaslonfamily{\fontfamily{pac}\selectfont}
563 \DeclareTextFontCommand{\textadobecaslon}{\adobecaslonfamily}
564 \DeclareRobustCommand\sbseries{\fontseries{sb}\selectfont}
565 \DeclareTextFontCommand{\textsb}{\sbseries}
566 \DeclareRobustCommand\adobecaslonexpert{\fontfamily{pacx}\selectfont}
567 \DeclareRobustCommand\adobecaslonosf{\fontfamily{pacj}\selectfont}
568 \DeclareRobustCommand\adobecaslonalternate{\fontfamily{paca}\selectfont}
569 \DeclareRobustCommand\adobecaslonlongs{\fontfamily{pacaa}\adobecaslonf@ntextraligs}\selectfont}
570 \DeclareRobustCommand\adobecasloneighteenth{\fontfamily{pacaa8}\adobecaslonf@ntextraligs}\selectfont}
571 \DeclareRobustCommand\adobecaslonswashits{\usefont{T1}{pacw}{\f@series}{it}}
572 \DeclareRobustCommand\adobecaslonswashcaps{\usefont{U}{pac}{\f@series}{iw}}
573 \DeclareRobustCommand\adobecaslonornaments{\usefont{U}{pac}{m}{n}}
574 </style>

```

## 4.8 Example output

A file with slight variants for core and expert fonts:

```

|*pac-sample,pac-sample-expert,pac-sample-extraligs;
575 \documentclass{article}
576
577 \usepackage[T1]{fontenc}
578 \usepackage{ifpdf}
579 \ifpdf
580   \pdfmapfile{+pac.map}
581   \usepackage{microtype}
582 \fi
583 <pac-sample> \usepackage[bold]{adobecaslon}
584 <pac-sample-expert> \usepackage[expert, bold]{adobecaslon}
585 <pac-sample-extraligs> \usepackage[extraligs, expert, bold]{adobecaslon}
586 \usepackage{textcomp}
587 \usepackage{lipsum}
588 \usepackage{slantsc}
589
590 <pac-sample> \newcommand{\samplertext}{0123456789. fi, ffi, \textsc{small caps}.}
591 <pac-sample-expert, pac-sample-extraligs> \newcommand{\samplertext}{0123456789 {\adobecaslonosf 0123456789}}
592
593 \begin{document}
594
595 Adobe Caslon Regular: \samplertext
596
597 {\itshape Adobe Caslon Italic: \samplertext}
598
599 {\sbseries Adobe Caslon Semibold: \samplertext}
600

```

```

601 \itshape Adobe Caslon Semibold Italic: \samplertext}
602
603
604 {\bfseries Adobe Caslon Bold: \samplertext
605
606 \itshape Adobe Caslon Bold Italic: \samplertext}
607
608
609 Package \textsf{textcomp} allows us to typeset currencies: \texteuro25.00,
610 \pounds4.5, \textdollar6, \textyen4.
611
612 {/pac-sample, pac-sample-expert, pac-sample-extraligs}
613 {*pac-sample-expert, pac-sample-extraligs}
614 {\adobecaslonlongs Some words with long 's': dress splice slice strife finesse sift shine sess
615
616 A long line with splits-seen and a word to be hyphenated and should long: shes\-ellsseashells.
617
618 A long line with splits-seen and a word to be hyphenated and should long: shes\noboundary\ell
619
620 {\adobecaslonwashit Some swash italics.}
621
622 Swash caps: {\adobecaslonwashcaps SQT}.
623
624 Ornaments: {\adobecaslonornaments 123ABCabc}.
625
626 18th-century mode: {\adobecasloneighteenth dress, kasbah, shake, sforza, fsork, ska}.
627
628 {/pac-sample-expert, pac-sample-extraligs}
629 {*pac-sample, pac-sample-expert, pac-sample-extraligs}
630 \lipsum[1]
631
632 \end{document}

{/pac-sample,pac-sample-expert,pac-sample-extraligs}

```

## References

- [1] Philipp Lehman. *The Font Installation Guide*, December 2004. <http://mirrors.ctan.org/info/Type1fonts/fontinstallationguide>.

## Change History

v2.0	v2.1
General: Expert fonts added (Reuben Thomas) ..... 7	General: Bug fixes, TS1 encoding added for a number of fonts (Reuben Thomas) ..... 7

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