## Latin Module for datetime2 Package

Nicola L. C. Talbot (inactive)

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This module is currently unmaintained and may be subject to change. If you want to volunteer to take over maintanance, contact me at http://www.dickimaw-books.com/contact.html

### Abstract

This is the Latin language module for the datetime2 package. If you want to use the settings in this module you must install it in addition to installing datetime2. If you use babel or polyglossia, you will need this module to prevent them from redefining \today. The datetime2 useregional setting must be set to text or numeric for the language styles to be set. Alternatively, you can set the style in the document using \DTMsetstyle, but this may be changed by \date(language) depending on the value of the useregional setting.

I've copied the date style from babel-latin's \today. This is different from polyglossia's Latin \today so there's a check to see if polyglossia has been loaded to make the styles match.

I don't know if these settings are correct. In particular, I don't know if the latin time style is correct. Currently this just uses the default time style. Please be aware that this may change. Whoever takes over maintanance of this module may can change it as appropriate.

The new maintainer should add the line:

The Current Maintainer of this work is Name.

to the preamble part in datetime2-latin.ins where Name is the name of the maintainer(s) and replace the 'inactive' status to 'maintained'.

Currently there is only a regionless style.

### 1 The Code

At the moment there is only the one .ldf file.

#### Main Latin Module (datetime2-latin.ldf) 1.1

```
Identify Module
```

```
1 \ProvidesDateTimeModule{latin}[2015/03/31 v1.0]
                    polyglossia version doesn't implement a font change.
\DTMlatindatefont
                     2 \@ifpackageloaded{polyglossia}
                         \newcommand*{\DTMlatindayfont}[1]{#1}
                     5 }
                     6 {
                     This will need protecting.
                         \newcommand*{\DTMlatindayfont}[1]{%
                           {\tt \{\check@mathfonts\fontsize\sf@size\z@\math@fontsfalse\selectfont#1\}\%}
                     9
                     10 }
  \DTMlatinordinal
                     11 \newcommand*{\DTMlatinordinal}[1]{%
                        \DTMtexorpdfstring
                     13
                           \protect\DTMlatindayfont{\uppercase\expandafter{\romannumeral#1}}%
                     14
                        }%
                     15
                        {\romannumeral#1 }%
                     16
                     17 }
     \DTMlatinyear
                     18 \newcommand*{\DTMlatinyear}[1]{%
                         \DTMtexorpdfstring
                     20
                         {%
                           \uppercase\expandafter{\romannumeral#1}%
                    21
                        }%
                     22
                         {\romannumeral#1 }%
                     23
                     24 }
                    Latin month names.
\DTMlatinmonthname
                     25 \@ifpackageloaded{polyglossia}
                     26 {
                    Match polyglossia month names:
                         \newcommand*{\DTMlatinmonthname}[1]{%
                     28
                           \ifcase#1
                     29
                           \or
                     30
                           Januarii%
                     31
                           \or
                           Februarii%
                     32
                           \or
                           Martii%
                     34
                           \or
                     35
```

```
Aprilis%
36
37
       \or
38
      Maji%
      \or
39
       Junii%
40
41
      \or
       Julii%
42
43
      \or
      Augusti%
44
       \or
45
      Septembris%
46
       \or
47
      Octobris%
48
49
       \or
      Novembris%
50
      \or
51
      Decembris%
52
53
      \fi
   }
54
55 }
56 {
Match babel month names:
    \newcommand*{\DTMlatinmonthname}[1]{%
57
58
      \ifcase#1
       \or
59
      Ianuarii%
60
      \or
61
      Februarii%
62
63
      \or
      Martii%
64
      \or
65
      Aprilis%
66
      \or
67
      Maii%
68
      \or
69
      Iunii%
70
71
       \or
72
      Iulii%
73
      \or
      Augusti%
74
      \or
75
76
      Septembris%
77
      \or
      Octobris%
78
79
      \or
      Novembris%
80
81
       \or
      Decembris%
82
83
      \fi
```

```
84 }
85 }
```

Define the latin style. The time style is the same as the default style provided by datetime2. This may need correcting.

Allow the user a way of configuring the latin and latin-numeric styles. This doesn't use the package wide separators such as \dtm@datetimesep in case other date formats are also required.

\DTMlatindaymonthsep

The separator between the day and month for the text format.

86 \newcommand\*{\DTMlatindaymonthsep}{\space}

\DTMlatinmonthyearsep

The separator between the month and year for the text format.

87 \newcommand\*{\DTMlatinmonthyearsep}{\space}

\DTMlatindatetimesep

The separator between the date and time blocks in the full format (either text or numeric).

88 \newcommand\*{\DTMlatindatetimesep}{\space}

\DTMlatintimezonesep

The separator between the time and zone blocks in the full format (either text or numeric).

89 \newcommand\*{\DTMlatintimezonesep}{\space}

\DTMlatindatesep

The separator for the numeric date format.

90 \newcommand\*{\DTMlatindatesep}{/}

\DTMlatintimesep

The separator for the numeric time format.

91 \newcommand\*{\DTMlatintimesep}{:}

Provide keys that can be used in \DTMlangsetup to set these separators.

```
92 \texttt{\DTMdefkey{latin}{daymonthsep}{{renewcommand*{\texttt{\DTMlatindaymonthsep}{\#1}}}}
```

TODO: provide a boolean key to switch between full and abbreviated formats if appropriate. (I don't know how the date should be abbreviated.)

Define a boolean key that determines if the time zone mappings should be used.

98 \DTMdefboolkey{latin}{mapzone}[true]{}

The default is to use mappings.

99 \DTMsetbool{latin}{mapzone}{true}

Define a boolean key that determines if the day of month should be displayed.

100 \DTMdefboolkey{latin}{showdayofmonth}[true]{}

<sup>93 \</sup>DTMdefkey{latin}{monthyearsep}{\renewcommand\*{\DTMlatinmonthyearsep}{#1}}

 $<sup>94 \</sup>DTMdefkey{latin}{datetimesep}{\renewcommand*{\DTMlatindatetimesep}{\#1}}$ 

<sup>95 \</sup>DTMdefkey{latin}{timezonesep}{\renewcommand\*{\DTMlatintimezonesep}{#1}}

 $<sup>96 \</sup>texttt{\DTMdefkey{latin}{datesep}{\#1}} \\$ 

<sup>97 \</sup>DTMdefkey{latin}{timesep}{\renewcommand\*{\DTMlatintimesep}{#1}}

```
The default is to show the day of month.
101 \DTMsetbool{latin}{showdayofmonth}{true}
    Define a boolean key that determines if the year should be displayed.
102 \DTMdefboolkey{latin}{showyear}[true]{}
 The default is to show the year.
103 \DTMsetbool{latin}{showyear}{true}
    Define the latin style. (TODO: implement day of week?)
104 \DTMnewstyle
   {latin}% label
    {% date style
106
      \renewcommand*\DTMdisplaydate[4]{%
107
        \DTMifbool{latin}{showdayofmonth}
108
        {\DTMlatinordinal{##3}\DTMlatindaymonthsep}%
109
110
111
        \DTMlatinmonthname{##2}%
        \DTMifbool{latin}{showyear}%
112
113
           \DTMlatinmonthyearsep
114
           \DTMlatinyear{##1}%
115
        }%
116
117
        {}%
      }%
118
      \renewcommand*\DTMDisplaydate{\DTMdisplaydate}%
119
120 }%
    {% time style (use default)
121
      \DTMsettimestyle{default}%
122
123 }%
124
    {% zone style
      \DTMresetzones
125
      \DTMlatinzonemaps
126
      \renewcommand*{\DTMdisplayzone}[2]{%
127
        \DTMifbool{latin}{mapzone}%
128
        {\tt \{\DTMusezonemapordefault\{\#\#1\}\{\#\#2\}\}\%}
129
130
           \ifnum##1<0\else+\fi\DTMtwodigits{##1}%
131
           \ifDTMshowzoneminutes\DTMlatintimesep\DTMtwodigits{##2}\fi
132
        }%
133
      }%
134
135 }%
    {% full style
136
      \renewcommand*{\DTMdisplay}[9]{%
137
       \ifDTMshowdate
138
        \DTMdisplaydate{##1}{##2}{##3}{##4}%
139
        \DTMlatindatetimesep
140
141
        \DTMdisplaytime{##5}{##6}{##7}%
142
143
        \ifDTMshowzone
```

144

\DTMlatintimezonesep

```
145
        \DTMdisplayzone{##8}{##9}%
       \fi
146
      }%
147
      \renewcommand*{\DTMDisplay}{\DTMdisplay}%
148
149 }%
    Define numeric style.
150 \DTMnewstyle
    {latin-numeric}% label
    {% date style
152
       \renewcommand*\DTMdisplaydate[4]{%
153
          \DTMifbool{latin}{showdayofmonth}%
154
         {%
155
            \number##3 % space intended
156
            \DTMlatindatesep
157
158
         }%
159
         {}%
160
         \number##2 % space intended
         \DTMifbool{latin}{showyear}%
161
         {%
162
            \DTMlatindatesep
163
            \number##1 % space intended
164
165
         {}%
166
167
       \renewcommand*{\DTMDisplaydate}{\DTMdisplaydate}%
168
    }%
169
    {% time style
170
       \renewcommand*\DTMdisplaytime[3]{%
171
172
         \number##1
173
         \DTMlatintimesep\DTMtwodigits{##2}%
174
         \ifDTMshowseconds\DTMlatintimesep\DTMtwodigits{##3}\fi
       }%
175
    }%
176
    {% zone style
177
      \DTMresetzones
      \DTMlatinzonemaps
179
      \renewcommand*{\DTMdisplayzone}[2]{%
180
        \DTMifbool{latin}{mapzone}%
181
        {\DTMusezonemapordefault{##1}{##2}}%
182
183
        {%
           \ifnum##1<0\else+\fi\DTMtwodigits{##1}%
184
185
           \ifDTMshowzoneminutes\DTMlatintimesep\DTMtwodigits{##2}\fi
186
        }%
      }%
187
    }%
188
    {% full style
189
      \renewcommand*{\DTMdisplay}[9]{%
190
191
       \ifDTMshowdate
        \DTMdisplaydate{##1}{##2}{##3}{##4}%
192
```

```
193
         \DTMlatindatetimesep
        \fi
194
        \label{localized} $$ DTMdisplaytime{##5}{##6}{##7}% $$
195
        \ifDTMshowzone
196
         \DTMlatintimezonesep
197
198
         \DTMdisplayzone{##8}{##9}%
199
        \fi
      }%
200
201
       \renewcommand*{\DTMDisplay}{\DTMdisplay}%
202 }
The time zone mappings are set through this command, which can be redefined if
 extra mappings are required or mappings need to be removed. This currently has
 no mappings.
203 \newcommand*{\DTMlatinzonemaps}{%
204 }
    Switch style according to the useregional setting.
205 \DTMifcaseregional
206 {}% do nothing
207 \ \{\texttt{DTMsetstyle{latin}}\}
208 {\DTMsetstyle{latin-numeric}}
```

Redefine \datelatin (or \date  $\langle dialect \rangle$ ) to prevent babel from resetting

```
210 {%
211
     \ifundef\datelatin
     {% do nothing
212
     }%
213
214
     {%
215
       \def\datelatin{%
          \DTMifcaseregional
216
          {}% do nothing
217
          {\DTMsetstyle{latin}}%
218
          {\DTMsetstyle{latin-numeric}}%
219
       }%
220
     }%
221
222 }%
223 {%
224
     \csdef{date\CurrentTrackedDialect}{%
225
       \DTMifcaseregional
       {}% do nothing
226
227
       {\DTMsetstyle{latin}}%
228
       {\DTMsetstyle{latin-numeric}}
     }%
229
230 }%
```

\DTMlatinzonemaps

# Change History

1.0 General: Initial release 2	
Index	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	\DTMlatinordinal 2 \DTMlatintimesep 4 \DTMlatintimezonesep 4 \DTMlatinyear 2 \DTMlatinzonemaps 7
$\label{lem:decomposition} $$ \DTMlatinmonthyearsep                                    $	$\mathbf{U}$ useregional