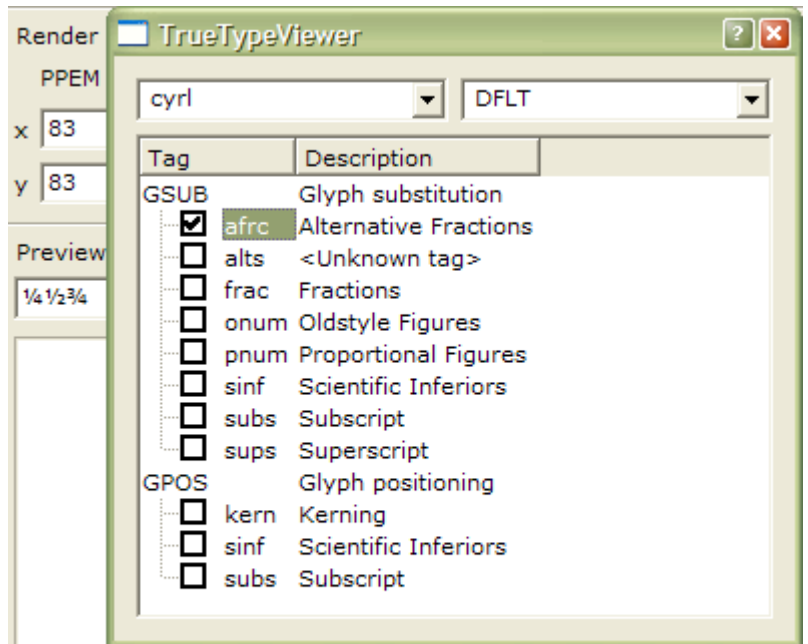


# OpenType Features

There are many high quality free fonts available such as Palatino Linotype (distributed with Windows XP) and Adobe's Minion Pro, that contain some OpenType Features.

Many different OpenType features are possible. The free [TrueType Viewer](#) shows a list of features available in Linotype Palatino. The illustration shows what happens if you type  $\frac{1}{4}\frac{1}{2}\frac{3}{4}$  in the document, and select the Alternative Fractions. Nut-fractions or Stacking fractions will replace the more usual design. Stacking fractions use less space and are preferable for use with measurements using fractions of an inch, for example.

If the user types 123 and selects the Superscript feature, it will display as <sup>123</sup> using superscripts that are designed to match the weight of the font at small sizes. If Format, Character is used to apply superscripts, the numbers will be smaller, but will be too light: 123 not <sup>123</sup> and the vertical position may not be as designed. Small Capitals suffer from similar problems as well as being taller than the x-height.



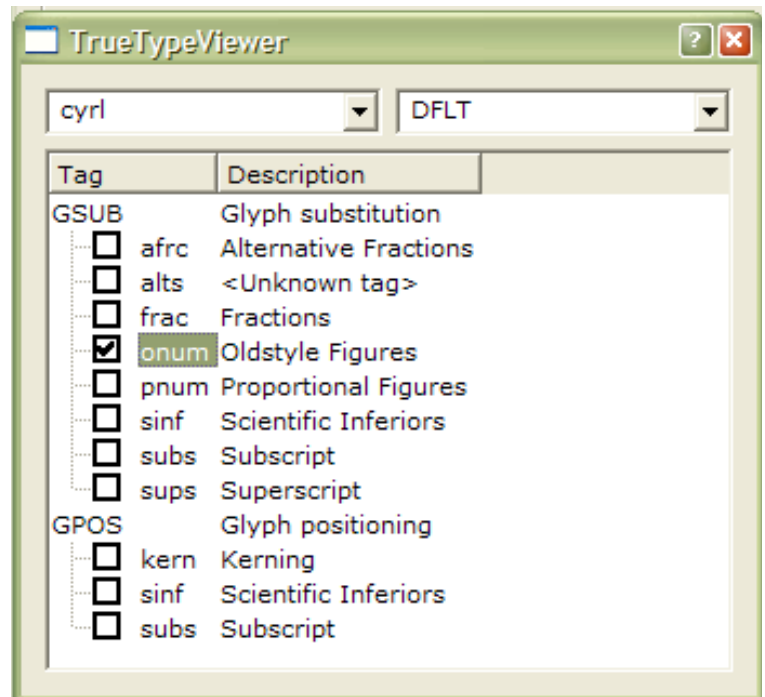
$\frac{1}{4}$   $\frac{1}{2}$   $\frac{3}{4}$

Many modern fonts use lining figures that are a uniform width and that are aligned to the height of capital letters in fonts. A few, like Georgia, use OldStyle Figures, which align with the x-height and so look better when used in text. Linotype Palatino includes OldStyle Figures as well as proportionally spaced figures, either of which can be selected by enabling the appropriate OpenType feature.

In PagePlus, as in many other applications, these alternative designs are not available. You cannot find them in the Insert Symbol dialogue (Control Shift S), although you can find a few special characters like the ligature ſt.

If standard ligatures are enabled, when the user types "first offer" it is automatically changed to "first offer," and if discretionary ligatures are also enabled it is converted to "firſt offer."

If the Insert Symbol dialogue is used to add ligatures these words will be underlined as spelling errors, but if OpenType features are used they won't be. Also, if OpenType features are used, searching for "first offer" will find the text as usual, but if Insert Symbol is used, the user must search for "first offer," or "firſt offer," which are much less convenient to type in the find dialogue.

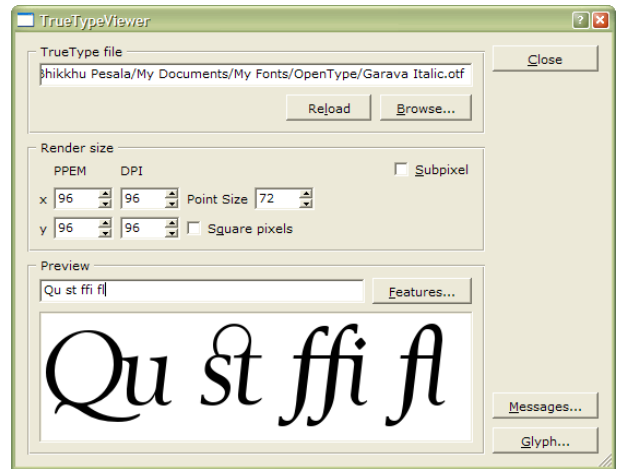


123 456

# Glyph Substitutions

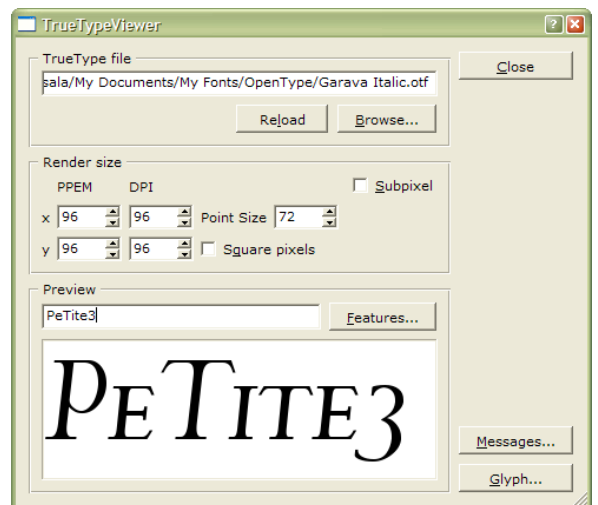
This page uses my own Garava OpenType font, which includes several OpenType features, such as Petite Capitals, Standard Ligatures, and Discretionary ligatures. All of these features use glyph substitutions — that is, if the feature is enabled some letters or combinations of letters will automatically be substituted with another letter (glyph).

**STANDARD LIGATURES** are found in many fonts. Even fonts without OpenType features will often have at least a few glyphs for Alphabetic Presentation Forms such as ff and fl. When the user types combinations like ff or fl while using an OpenType font with Standard Ligatures enabled, these Alphabetic Presentation Forms are substituted for the glyphs ff, fl, ffi, ffl wherever they are used, for example, in words like *effect*. In PagePlus this can currently only be done by using the Insert Special Character dialogue. I recommend using standard ligatures if the font contains them, as they are designed to avoid the unsightly clashes that occur when certain letter pairs are adjacent.



**DISCRETIONARY LIGATURES**, as the name implies, are optional. They are stylistic alternative forms. Hand-written manuscripts often contain ligatures, or pairs of letters with connecting strokes. The illustration above shows some examples — the tail of the Q in Qu is extended and the u is connected to form the Qu ligature, the s and t of the st ligature are joined with a connecting stroke. Other letter pairs that have discretionary ligatures in my fonts are: Th ck ct sp and tz.

**PETITE CAPITALS** also use glyph substitutions. If the user enables this feature, lowercase letters are substituted with smaller, but bolder, uppercase glyphs of the same height. Petite Capitals differ from Small Capitals, which are used for headings. Petite Capitals are designed for use in BODY TEXT, and so match the x-height of the font, while SMALL CAPITALS are usually about 80% of the height of capitals.



In my fonts, if the Petite Capitals feature is enabled then the OldStyle figures are enabled automatically, as these are also designed to have look better when mixed with body text.

Compare PETITE CAPITALS with SMALL CAPITALS that are generated by PagePlus automatically by scaling down the uppercase letters by 70%.

## PETITE CAPITALS : SMALL CAPITALS

Scientific Inferiors should be used instead for subscripts in formulae.

Inferiors  $H_2SO_4$   $C_4H_5$  Subscripts  $H_2SO_4$   $C_4H_5$

Stacking fractions or Nut fractions are designed for typesetting measurements in feet and inches:

$1'2\frac{5}{16}''$   $3\frac{1}{8}''$   $4\frac{31}{64}''$   $5\frac{7}{32}''$   $6\frac{5}{6}''$   $7\frac{7}{8}''$   $8\frac{3}{8}''$

Regular fractions don't look so neat and lack the full set:  $3\frac{1}{8}''$   $7\frac{7}{8}''$   $6\frac{5}{6}''$