

TRAJAN® SANS PRO

Presented by John D. Berry

Trajan Sans is a new sans serif companion to Carol Twombly's popular Trajan typeface, first released in 1989. It is a fresh interpretation by designer Robert Slimbach, a complement to his recent extension of the Trajan Pro family. Like Trajan Pro, Trajan Sans is an all-caps typeface (it has no lowercase), derived from the famous inscription at the base of Trajan's column in Rome. Slimbach set out to create "a distinctly modern sans-serif display type family that retains the elegance and versatility of the original Trajan family."

The Trajan Sans family comprises six weights, ranging from Extra Light to Black (matching the weight range in Trajan Pro 3), with language coverage for Pan-European Latin, Cyrillic, and Greek. Maxim Zhukov advised on the design of the Cyrillic portion of the family, and Gerry Leonidas advised on the Greek, while Frank Grießhammer provided technical production support.

TRAJAN SANS PRO

Α Β Γ Δ Ε Ζ
Η Θ Ι Κ Λ
Μ Ν Ξ Ο
Π Ρ Σ Τ Υ
Φ Χ Ψ Ω

A B C D E F
G H I J K L M
N O P Q R S T
U V W X Y Z

EXTRA LIGHT · LIGHT · REGULAR · SEMIBOLD · BOLD · BLACK

A B C D E F
G H I J K L M
N O P Q R S T
U V W X Y Z

А Б В Г Д Е
Ж З И Й К
Л М Н О П
Р С Т У Ф
Ц Ч Ш Щ Ъ
Ы Ь Э Ю Я

TRAIANO HADRIANO AUGUSTO

ROMAN INSCRIPTIONAL CAPITALS

The classic Roman "square" capital (*capitalis monumentalis*) was the grandest of the lettering styles developed by the Romans; it was inscribed on stone monuments, temples, arches, and public buildings throughout the empire, as a visible mark of the power and glory of Rome. The inscription on the Trajan column is generally considered to be the finest example of this style, and it has served as a model for the design of capital letters in the Latin alphabet for nearly two millennia.

Aside from their classic proportions, two of the defining characteristics of the Trajan capitals are their small but elegant serifs and the subtle modulation of the weight and curve of each stroke. In developing a sans-serif version, Slimbach couldn't just hack off the serifs and be done; he had to re-think the essential nature of these letters, and find a way to express their beauty and dignity in a modern, serifless form – and in several weights.



stroke modulation



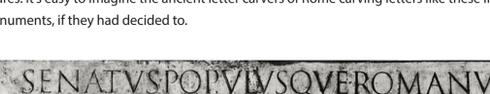
symmetrical serif



asymmetrical serif

SERIFLESS MONUMENTAL CAPITALS

Since the Latin alphabet grows out of the Greek, it might seem to make sense to look to ancient Greek inscriptions as a model for a sans-serif monumental style. But the Roman inscriptional tradition is quite different from the Greek, according to Gerry Leonidas, Adobe's Greek type design consultant. "All Greek epigraphy has very small letters," says Leonidas. "The documents are fairly pedestrian, in both senses of the word: regulations, lists of slain soldiers, and so on. And at a scale to be read up close, on dense tablets. The smallest ones are so tiny that the length of the chisel's edge is the total height of the main stroke. In short, there is nothing 'theatrical' in Greek lettering, which sets them apart from Roman examples." The most prominent Roman inscriptions were literally monumental: an expression of Rome's might and culture carved into large-scale public monuments.



Inscribed Greek capitals, circa 410-408 B. C. Athens Epigraphic Museum. photo Gerry Leonidas.

Some of those Greek inscriptions served as models for Carol Twombly's other highly popular display typeface, Lithos™, but they weren't appropriate as a starting point for a sans-serif companion to Trajan.

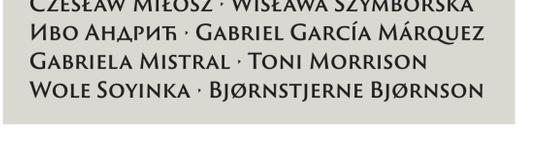
Although the standard in ancient Roman inscriptions was capital letters with serifs, in the classical revival during the Italian Renaissance, a number of monuments and tombs were built that used serifless inscribed capitals. These more modern-looking letters have strong thick-and-thin contrast and elegant modulated strokes, sharing the best features of Roman letters and their serifs. This Roman-inspired lettering style has been the basis for a number of well-known typefaces over the last eighty years or so, perhaps most notably Hermann Zapf's Optima™.

OPTIMA by Hermann Zapf

With Trajan Sans, Slimbach did not look to either the Greek inscriptions or the Renaissance sans serifs. "The outlines were produced directly on-screen using the Trajan serif outlines as a starting point," says Slimbach. "What followed was a fairly straightforward process of replacing the serified terminals with stylized stroke endings that give the impression of a serifless incised terminal. I then followed up with a long process of adjusting design elements and stroke contrast." The result closely mirrors the basic design direction of the original serif typeface, but also includes subtle adaptations of line and detail to make the forms balanced and compelling sans-serif forms.

"Trajan Sans exhibits less stroke contrast than Hermann Zapf's Optima," says Slimbach, "but more than a typical neo-grotesque sans-serif type such as Helvetica."

Even at the lightest weights, the strokes of Trajan Sans swell and curve subtly; there are no straight lines in the design. In the absence of serifs, there is perhaps even more modulation to some of the strokes than there is in the serified version. The ends of straight strokes are very slightly cupped, and the swelling sides of the strokes meeting that shallow cup create the sharp, lively impression that keeps Trajan Sans from being just a collection of classical-looking stick figures. It's easy to imagine the ancient letter carvers of Rome carving letters like these into their monuments, if they had decided to.



Top: Trajan inscription, circa 114 A.D. Above: Trajan Pro 3 and Trajan Sans Pro

TRAIANVS TRAIANVS

COMPARING TRAJAN AND TRAJAN SANS

Trajan Sans shows less stroke contrast than its serified counterpart, with stylized flaring stroke endings that suggest v-shaped terminals cut in stone. As Slimbach explains, "The subtle swelling at stroke terminals, along with slightly angled convex stroke endings, not only give otherwise flat strokes a more elegant gesture, they produce the suggestion of a serif and help to visually anchor glyphs either to the baseline or to the letter-height boundary. These treatments also provide a link between the traditional disciplines of brush calligraphy and stone lettercutting from which monumental Roman capitals derive much of their character." Trajan Sans does not go as far as some other humanist sans-serif type designs, based on later serifless inscriptional styles; like the carved capitals that gave it its inspiration, and like Trajan Pro, Trajan Sans is faithful to the extremely subtle effects of the master Roman stone carvers.

In creating the original Trajan typeface, designer Carol Twombly had found that forms which appeared perfect when chiseled into stone were not always suited to printing on paper. The N was a bit heavy, the S too light, the serifs too delicate. To give the characters an even and unified appearance when printed at various sizes and resolutions, Twombly modified serif details, hairline thickness, and stem and bowl weights, while retaining as much of the subtlety and character of the inscriptions as possible. To complete the typeface, she designed letters, numerals, and punctuation for which the inscription provided no models.

With Trajan Sans, Slimbach performed a similar feat, while also imagining how a sans-serif version of Trajan ought to look and feel on paper and on screen. Once again, he had to complete the typeface by creating new glyphs in the style of the old, including punctuation, accented glyphs, and Greek and Cyrillic alphabets, all of which needed to be conceived separately.

Although there is less contrast between thick and thin strokes in Trajan Sans than in Trajan Pro, the diagonal and horizontal strokes of Trajan Sans tend to be thicker, especially in the lighter and middle weights, while the vertical strokes are thinner than Trajan Pro in the heavier weights. There is no one-to-one correspondence of stroke weight or counter shape; Slimbach has modified them to get the effect that he wanted, rather than to be exactly equivalent. The letter fit of Trajan Sans, too, is a little tighter than that of Trajan Pro. Trajan Sans Black is noticeably lighter than the anomalous Trajan Pro Black, and fits into the smooth range of weights more comfortably.

In keeping with the sans-serif nature of Trajan Sans, the ends of strokes like the tail of the Q and the J do not come to a sharp point, as they do in Trajan Pro, but instead have blunter ends.

Although the stroke modulation is not pronounced, Trajan Sans still has a visual effect that is very different from a monoline sans serif. It looks classical rather than industrial.

ALTERNATES AND OPENTYPE FEATURES

As an OpenType family, Trajan Sans Pro includes extensive Latin and Pan European language coverage, and a wealth of OpenType layout features that streamline the process of setting and fine-tuning typographic composition.

АЛЕКСАНДР ИСАЕВИЧ СОЛЖЕНИЦЫН
ΓΙΩΡΓΟΣ ΣΕΦΕΡΗΣ · ΟΔΥΣΣΕΑΣ ΕΛΥΤΗΣ
RABINADRATH TAGORE · ORHAN RAMUK
SAMUEL BECKETT · NADINE GORDIMER
CZESŁAW MIŁOŚZ · WISŁAWA SZYMBORSKA
ИВЪ АНДРИТЪ · GABRIEL GARCÍA MÁRQUEZ
GABRIELA MISTRAL · TONI MORRISON
WOLE SOYINKA · BJØRNSTJERNE BJØRNSON

Trajan Sans Pro, like Trajan Pro, includes slightly smaller forms of each letter in the lowercase position. These "small" capitals are only a little smaller than the regular capitals, but they are drawn precisely to harmonize with the regular capitals' weight and stroke thickness, so that setting a passage in Trajan Sans with upper and lowercase will give it a seamless texture of large and small capitals. The smaller capitals can also be used on their own; they are slightly wider in proportion than the full capitals, and thus give a slightly more horizontal effect than a line of full caps. The small capitals can also be accessed through OpenType's small-caps feature.

The OpenType layout features include tabular and proportional figures (numbers) and automatic substitution of alternate glyph forms in Latin, Greek, and Cyrillic.

PAGEMAKER

LA FOLLETTE

CAMEL CASE

Capitals with small caps

Latin Alternates
CENTENNIAL
STONECUTTER
GROVE & HILL
JONES & JONES
VELASQUEZ

Default Latin Glyphs
CENTENNIAL
STONECUTTER
GROVE & HILL
JONES & JONES
VELASQUEZ

Greek Alternates
ΗΦΑΙΣΤΟΣ

Default Greek Glyphs
ΗΦΑΙΣΤΟΣ

Cyrillic Alternates
ОФИЦИАЛЬНОЙ
БУРЖУАЗИИ
ПРЕДАЮСЬ
ЦВЕТЕТ
ГЛЯДЯЩИЙ

Default Cyrillic Glyphs
ОФИЦИАЛЬНОЙ
БУРЖУАЗИИ
ПРЕДАЮСЬ
ЦВЕТЕТ
ГЛЯДЯЩИЙ

USING TRAJAN SANS

Like the newly extended family of Trajan, Trajan Sans Pro has six weights, from Extra Light to Black. While all the Trajan fonts are intended as display typefaces rather than text, the extremes of this range are especially suited for very big sizes. Trajan Sans Extra Light or Light can make an elegantly simple impression at monumental sizes with generous spacing; Trajan Sans Black, by contrast, with its heavy strokes and tiny counters, makes an emphatic statement, which also wants to be seen large.

STONEHENGE

STONEHENGE

Trajan Sans Pro Black and Trajan Pro 3 Black



ExtraLight, Light, and Regular

As a modern digital typeface, Trajan Sans demands to be used carefully. It is still a set of monumental capitals, which cry out to be arranged in a spacious manner at large size. (Will Trajan Sans turn out to be as popular for movie posters and titles as Trajan has been?) The lighter weights, in particular, will benefit from slightly looser letter-spacing than the font's built-in spacing, under most conditions. Just as the Roman carvers spaced their letters properly to get the right effect, so do modern typographers have to consider how, where, and from what angle their graphic designs will be seen.

TANTAE·MOLIS·ERAT ROMANAM·CONDERE GENTEM·VERGIL

Looser than the default tracking (20 units)

John D. Berry is a typographer, book designer, editor, and design writer living in Seattle. He is the former editor & publisher of *U&Lc* (*Upper and lower case*) and a former program manager with the Fonts team at Microsoft. He has edited several books on design and has won numerous awards for his book designs. He writes and consults extensively on typography. He is president of ATypI (Association Typographique Internationale).

SAMPLE ART AND TEXT SETTINGS

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