The Treasure Chest

These are the new packages posted to CTAN (`ctan.org`) from October 2022–April 2023. Descriptions are based on the announcements and edited for extreme brevity.

Entries are listed alphabetically within CTAN directories. More information about any package can be found at `ctan.org/pkg/`*pkgname*.

A few entries which the editors subjectively believe to be especially notable are starred (∗); of course, this is not intended to slight the other contributions.

> ⋄ Karl Berry
> https://tug.org/TUGboat/Chest
> https://ctan.org/topic

biblio

`bibcop` in `biblio/bibtex/utils`
   Style checker for `.bib` files.

fonts

`euler-math` in `fonts`
   OpenType implementation of Zapf's Euler.

`gelasio` in `fonts`
   Support for Eben Sorkin's Gelasio fonts, metric-compatible with Georgia.

graphics

`emo` in `graphics`
   Emoji support for all LaTeX engines.

graphics/metapost/contrib/macros

`hershey-mp` in `graphics/metapost/contrib/macros`
   Support for Hershey font file format.

`mpchess` in `graphics/metapost/contrib/macros`
   Draw chess boards and positions.

graphics/pgf/contrib

`fenetrecas` in `graphics/pgf/contrib`
   Display CAS examples.

`outilsgeomtikz` in `graphics/pgf/contrib`
   Typeset geometry tools (compass, . . .).

`pixelarttikz` in `graphics/pgf/contrib`
   Generate pixel art.

`quickreaction` in `graphics/pgf/contrib`
   Typeset chemical reactions.

`sacsymb` in `graphics/pgf/contrib`
   "Sacred symbols" used with the Orch OR theory of consciousness.

`scrabble` in `graphics/pgf/contrib`
   Commands for Scrabble boards.

`tangramtikz` in `graphics/pgf/contrib`
   Tangram puzzles.

`tikz-mirror-lens` in `graphics/pgf/contrib`
   Spherical mirrors and lenses.

`tikz-nfold` in `graphics/pgf/contrib`
   Triple, quadruple, and *n*-fold paths.

`tikzviolinplots` in `graphics/pgf/contrib`
   Draw violin plots from data.

graphics/pstricks/contrib

`egpeirce` in `graphics/pstricks/contrib`
   Draw Peirce's existential graph.

`pst-flags` in `graphics/pstricks/contrib`
   Draw country flags.

info

∗ `drawing-with-metapost` in `info`
   Example-based document for drawing technical diagrams with MetaPost; intermediate to advanced.

∗ `tlc3-examples` in `info/examples`
   All examples from *The LaTeX Companion*, third edition. See excerpt in this issue (pp. 77–86). To order the book, see `tug.org/l/tlc3`.

macros/generic

`crossrefenum` in `macros/generic`
   Smart handling of cross-reference ranges; supports LaTeX and ConTeXt.

`expkv-bundle` in `macros/generic`
   Expandable key=val implementation and friends.

`pdfmsym` in `macros/generic`
   More math symbols, including arbitrarily-extendable accents, arrows, etc.

macros/latex/contrib

`cleveref-usedon` in `macros/latex/contrib`
   Adds forward referencing to `cleveref`.

`cvss` in `macros/latex/contrib`
   CVSS scores for IT vulnerabilities.

`elteiktdk` in `macros/latex/contrib`
   Thesis template for Hungarian TDK conferences.

`exam-lite` in `macros/latex/contrib`
   Simple exam template.

`fistrum` in `macros/latex/contrib`
   150 paragraphs of Lorem Fistrum comedian phrases.

`gfdl` in `macros/latex/contrib`
   Use the GNU Free Documentation License (GFDL).

`gradient-text` in `macros/latex/contrib`
   Decorate text with linear gradient colors.

`hep-reference` in `macros/latex/contrib`
   Adjustments for publications in high energy physics.

`hfutexam` in `macros/latex/contrib`
   Exam class for the Hefei University of Technology.

`hwemoji` in `macros/latex/contrib`
   Unicode emoji support for pdfLaTeX with sequences.

`ibrackets` in `macros/latex/contrib`
   Intelligent brackets for open intervals.

jeuxcartes in macros/latex/contrib
  Playing cards from poker or French tarot decks.

jourcl in macros/latex/contrib
  Universal cover letter for journal submissions.

jwjournal in macros/latex/contrib
  Writing personal journals.

korigamik in macros/latex/contrib
  Support for academic projects and lab reports.

lgrmath in macros/latex/contrib
  Use LGR-encoded fonts in math mode.

maze in macros/latex/contrib
  Generate random mazes.

naive-ebnf in macros/latex/contrib
  Typeset EBNF from a plain text notation.

namedtensor in macros/latex/contrib
  Macros for named tensor notation.

osda in macros/latex/contrib
  Open-Source Design Automation proceedings.

overarrows in macros/latex/contrib
  Custom extensible arrows over math expressions.

* pagelayout in macros/latex/contrib
  Declarative desktop publishing with LaTeX.

pangram in macros/latex/contrib
  LaTeX package for testing fonts.

physics2 in macros/latex/contrib
  Easier math typesetting.

pythonimmediate in macros/latex/contrib
  Library to run Python code.

recorder-fingering in macros/latex/contrib
  Typeset recorder fingering diagrams.

resmes in macros/latex/contrib
  The measure restriction symbol.

resolsysteme in macros/latex/contrib
  Operate on linear systems with xint or pyluatex.

songproj in macros/latex/contrib
  Beamer slideshows with song lyrics.

tangocolors in macros/latex/contrib
  Use colors from the Tango color palette.

tidyres in macros/latex/contrib
  Multi-column formal resumes.

tramlines in macros/latex/contrib
  Lines above and below titles, for legal documents in the UK.

ukbill in macros/latex/contrib
  Typeset UK legislation.

uol-physics-report in macros/latex/contrib
  Lab reports at the U. of Oldenburg.

uvaletter in macros/latex/contrib
  Unofficial letterhead for the U. of Amsterdam.

writeongrid in macros/latex/contrib
  Grid creation and text positioning on the lines.

zennote in macros/latex/contrib
  Streamline note-taking process.

macros/latex/contrib/babel-contrib

babel-lithuanian in m/l/c/babel-contrib
  Babel support for Lithuanian.

macros/luatex/generic

blopentype in macros/luatex/generic
  Basic LuaTeX OpenType handler.

evangelion-jfm in macros/luatex/generic
  Font metric package supporting many advanced CJK features.

lparse in macros/luatex/generic
  Lua module for parsing key-value options.

lua-tinyyaml in macros/luatex/generic
  Tiny YAML (subset) parser in pure Lua.

tsvtemplate in macros/luatex/generic
  Apply templates to tsv (tab-separated value) files.

macros/luatex/latex

* luacas in macros/luatex/latex
  Computer algebra and symbolic computation system within LuaLaTeX. See article in this issue (pp. 94–98).

luacomplex in macros/luatex/latex
  Perform operations on complex numbers.

luagcd in macros/luatex/latex
  GCD computation.

lualinalg in macros/luatex/latex
  Perform linear algebra operations.

luamaths in macros/luatex/latex
  Perform standard math operations.

luamodulartables in macros/luatex/latex
  Generate modular addition/multiplication tables.

luaoptions in macros/luatex/latex
  Option handling for LuaLaTeX packages.

luaset in macros/luatex/latex
  Perform set operations.

scikgtex in macros/luatex/latex
  Annotate contributions using XMP metadata.

macros/unicodetex/latex

alchemist in macros/unicodetex/latex
  Typeset alchemy and astrological symbols from Unifont

macros/xetex/plain

unimath-plain-xetex in macros/xetex/plain
  OpenType math support in plain XeTeX.

support

digestif in support
  Editor plugin and language for LaTeX, plain TeX, ConTeXt and Texinfo.

* texfindpkg in support
  Install TeX packages via filenames or command/ environment names. Supports TL and MiKTeX.