1   mtf_generate_test_chart

mtf_generate_test_chart — generate test charts for evaluating lens sharpness

Synopsis

mtf_generate_test_chart [*OPTIONS*]

DESCRIPTION

mtf_generate_test_chart generates scalable vector graphics (SVG) files containing test charts for evaluating digital camera lens performance (sharpness) as well as autofocus accuracy / fine-tuning. **mtf_generate_test_chart** should be used to generate suitable test charts for use with the **mtf_mapper** tool.

OPTIONS

-o *filename*
  Specify output file name (default is *chart.svg*).

-s *a4\A4\a3\A3\a2\A2\a1\A1\a0\A0*
  Specify page size of the chart.

-t *perspective\grid\halfgrid\thirdgrid\lensgrid\mfperspective\focus*
  Specify chart type. The *perspective* chart is for evaluating autofocus behaviour, and is intended to be photographed at an angle, typically 45 degrees.

  The *lensgrid* chart is intended to evaluate lens sharpness across the focal plane, and should be photographed perpendiculary. This chart type is suitable for many **mtf_mapper** output options, including **-a**, **-s**, **-q**, and **--lensprofile**. The circular fiducial markers also allow this chart type to be used for iteratively adjusting the chart orientation (to position it perpendicular to the camera's optical axis) using **mtf_mapper**'s **--chart-orientation** output mode.

  The *grid* chart is similar to the *lensgrid* chart, but it is an older design, and it is strongly recommended that you use the *lensgrid* chart instead. Similar grid-style charts, but with fewer target rectangles, can be generated using the *halfgrid* and *thirdgrid* types.

  The *focus* chart is a single-purpose chart type designed to measure the position (distance) of peak focus. This chart must be photographed at an angle (45 degrees recommended), and requires manual focusing. The **--focus** output option of **mtf_mapper** is specifically intended for this chart type.

  The *mfperspective* chart is another special chart type designed to visualize the intersection of the "*plane of best focus*" and the test chart, which should be tilted at around 45 degrees. The **--mfprofile** output option of **mtf_mapper** is specifically intended for this chart type.

-d *distance*
  Specify the desired viewing distance from the chart for perspective mode. Distance is in mm, measured from the reference edge on the chart, to the camera focal plane.

-h
  Displays usage information.