GTiff2Tiles.Console

GTiff2Tiles.Console is a simple console application, that implements methods from **GTiff2Tiles.Core** to create tiles. The app is available to download from <u>GitHub Releases Page</u> and Docker Images are available on <u>Docker Hub</u> and <u>GitHub Packages Feed</u>.

Supports **only GeoTIFF** as input data and creates **geodetic or mercator** tiles on output in **tms** or **non-tms** (*Google maps like*) structure. Any **GeoTIFF** (with less, than **5 bands**) on input is supported, if it's not **EPSG:4326** or **EPSG:3857**, it'll be converted to your selected target coordinate system and saved inside **temp** directory before cropping.

Requirements

Application runs on **Linux x64** (*tested on Ubuntu 18.04*+) and **Windows x64** (*tested on Win 7 SP1*+) operating systems.

If you're using **Windows 7 SP1**, you can experience weird error with **GDAL** packages. It's recommended to install <u>KB2533623</u> to fix it. You can read about this Windows update on <u>MSDN</u>.

Usage

Short	Long	Description	Required?
-i	input	Path to input file	Yes
-0	output	Path to output directory	Yes
	minz	Minimum cropped zoom	Yes
	maxz	Maximum cropped zoom	Yes
	threads	Threads count, calculates auto by default	No
-e	extension	Extension of ready tiles, .png by default	No
-t	temp	Path to temp directory, current directory by default	No
	tms	Do you want to create tms-compatible tiles? true by default	No
-C	 coordinates	Target tiles coordinate system, geodetic by default	No
	 interpolation	Interpolation of ready tiles, lanczos3 by default	No
-b	bands	Count of bands in ready tiles, 4 by default	No
	tilecache	How much tiles would you like to store in memory cache? [100] by default	No
-m	memcache	Maximum size of input files to store in RAM, 2147483648 by default	No
-p	progress	Do you want to see the progress? true by default	No
	tmr	Do you want to create tilemapresource.xml?	No
	timeleft	Do you want to see estimated time left? false by default	No
	tilesize	Ready tile's size, 256 by default	No
	version	Current version	
	help	Message about command line options	

Minimal example looks like this: ./GTiff2Tiles.Console -i "D:/Examples/Input.tif" -o "D:/Examples/Output" --minz 0 --maxz 12

Take a look at <u>Start.ps1</u> **PowerShell** script for automating and more examples of the work. Note, that running this script requires installed **PowerShell** or <u>PowerShell Core</u> (also available on **Linux/OSX** systems!).

Detailed options description

- -i/--input is string, representing full path to input **GeoTIFF** file. Please, specify the path in double guotes ("like this") if it contains spaces.
- -o/--output is string, representing full path to directory, where tiles in will be created. Please, specify the path in double quotes ("like this") if it contains spaces. Directory should be empty.
- **--minz** is int parameter, representing minimum zoom, which you want to crop.
- **--maxz** is **int** parameter, representing maximum zoom, which you want to crop.
- **--threads** is int parameter, representing threads count. By default (if not set) uses calculates automatically, based on your PC.
- **--extension** is a **string**, representing ready tiles extension. By default is set to **.png**. Currently supported extensions are: **.webp**, **.jpg**, **.png**.
- **-t/--temp** is string, representing full path to temporary directory. Please, specify the path in double quotes ("like this") if it contains spaces. Inside will be created directory, which name is a **timestamp** in format yyyyMMddHHmmssfff. By default the same directory, where application is located.
- --tms is string, which shows if you want to create tms-compatible or non-tms-compatible tiles on output. Can have values true or false. By default is true.
- **-c/--coordinates** is a string, representing ready tile's coordinate system. By default is geodetic (*EPSG:4326*). Supported values: geodetic, mercator.
- --interpolation is a string, representing ready tile's interpolation. By default is [lanczos3]. Supported values: nearest, [linear, cubic, mitchell, lanczos2, lanczos3].
- -b/--bands is fint parameter, representing count of bands in ready tiles. By default is 4.
- **--tilecache** is **int** parameter, representing count of tiles to store in RAM to crop them faster (*that's vips stuff*). 1000 by default.
- **--memcache** is long parameter, representing maximal size (*in bytes*) of input file to store in RAM to crop it faster. By default is 2147483648 (*which equals to 2Gb*).
- **--progress** is bool parameter. If it's set to true you'll see cropping progress in your command line. true by default.
- --tmr is bool parameter. If it's set to true, the program will create tilemapresource.xml after cropping tiles. false by default.
- --timeleft is a bool parameter. If it's set to true you'll see estimated time left before end of cropping after each tile is cropped. false (beware, too much output can slow app down) by default.
- --tilesize is int parameter, representing the size of one side (*tiles should be a square, so specifying 2 side's sizes is redundant*) of ready tiles. [256] by default.

Offline docs

Offline docs are also available as \underline{pdf} and distributed alongside the application.

Build dependencies

- GTiff2Tiles.Core;
- <u>CommandLineParser</u> 2.8.0;