PRODUCTION RIP
USER MANUAL

Brain INDUSTRIES

brother at your side

PRODUCTION RIP SETUP/CONFIGURATION FILE

CONFIG FILE LOCATION

RipConfig file

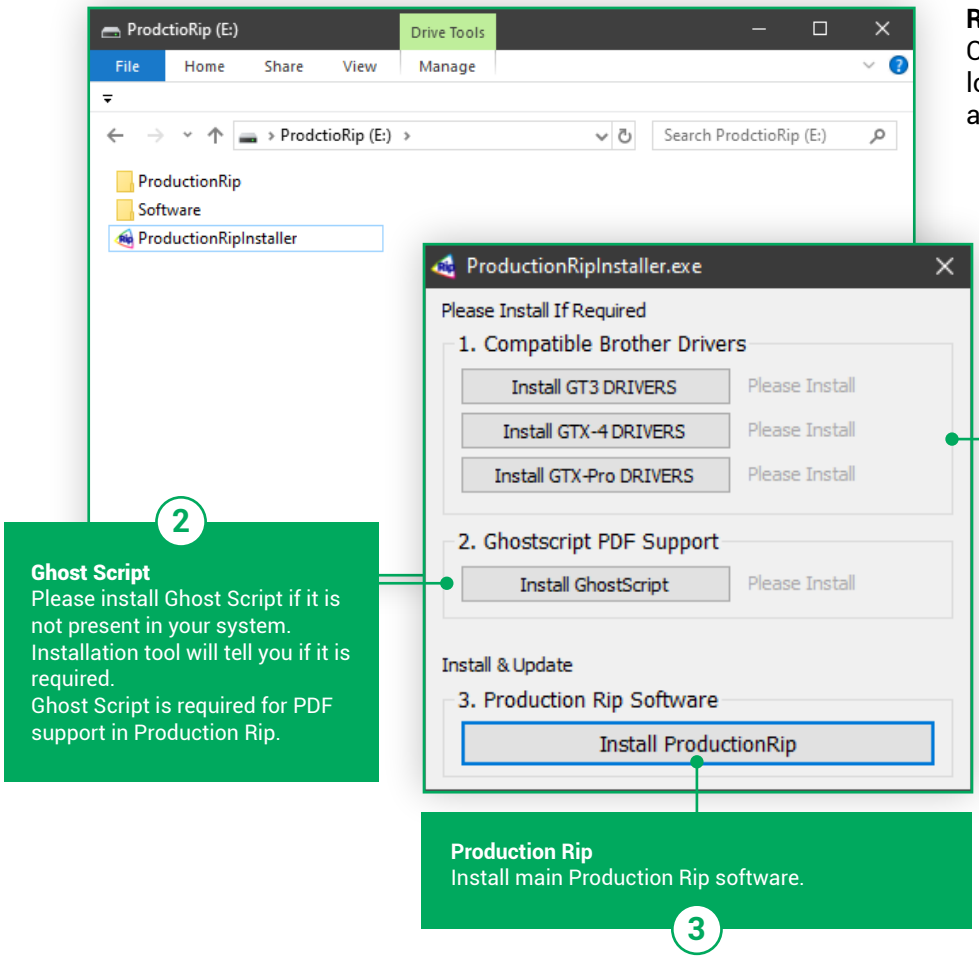
C:\Users\UserName\AppData\Roaming\ProductionRip\RipConfig.ini

PRODUCTION RIP INSTALLATION/INSTALLATION

PRODUCTION RIP SOFTWARE INSTALLATION

Plug in the Dongle > Run Installation > Install Driver > Install Ghost > Install Production Rip

Plug in the dongle
As a first step of installation, please plug the Production Rip Dongle into the USB port of your pc.



Run Installation
Open the Production Rip Drive, locate ProductionRipInstaller.exe and Run it.

1

Driver installation
Please install the drivers depending on the connected machine.

It is very important to install drivers from the dongle because Production Rip has been developed for the exact driver version in particular.

Installation tool will tell you if it is needed to install or reinstall the current driver.

During reinstallation it will handle uninstall of the old drivers, clean previous versions and install the correct driver by using the standard Brother driver installation.

2

Ghost Script
Please install Ghost Script if it is not present in your system.
Installation tool will tell you if it is required.
Ghost Script is required for PDF support in Production Rip.

Production Rip
Install main Production Rip software.

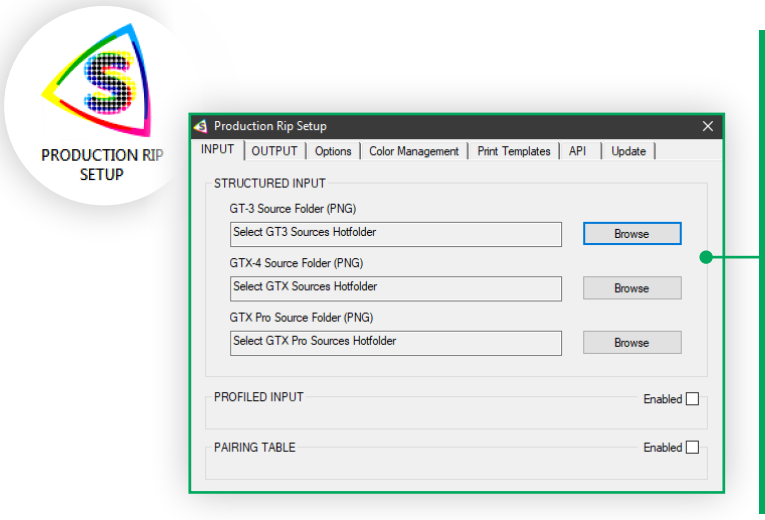
3

The Production Rip Setup will be started automatically once the installation has been finished successfully.

PRODUCTION RIP SETUP/INPUT SETTINGS

STRUCTURED INPUT

Structured Input is the most easy hotfolder based method of ripping.
Files contained in source folders will be converted to either .arx4 or .ar3.
Select the input folder for GT3 and GTX.



Select Input Hotfolders
Use Browse buttons to select the input folder for GT3, GTX-4 and GTX Pro ripping.

Rip will look for input files (.pdf, .png) inside those folders and subfolders.

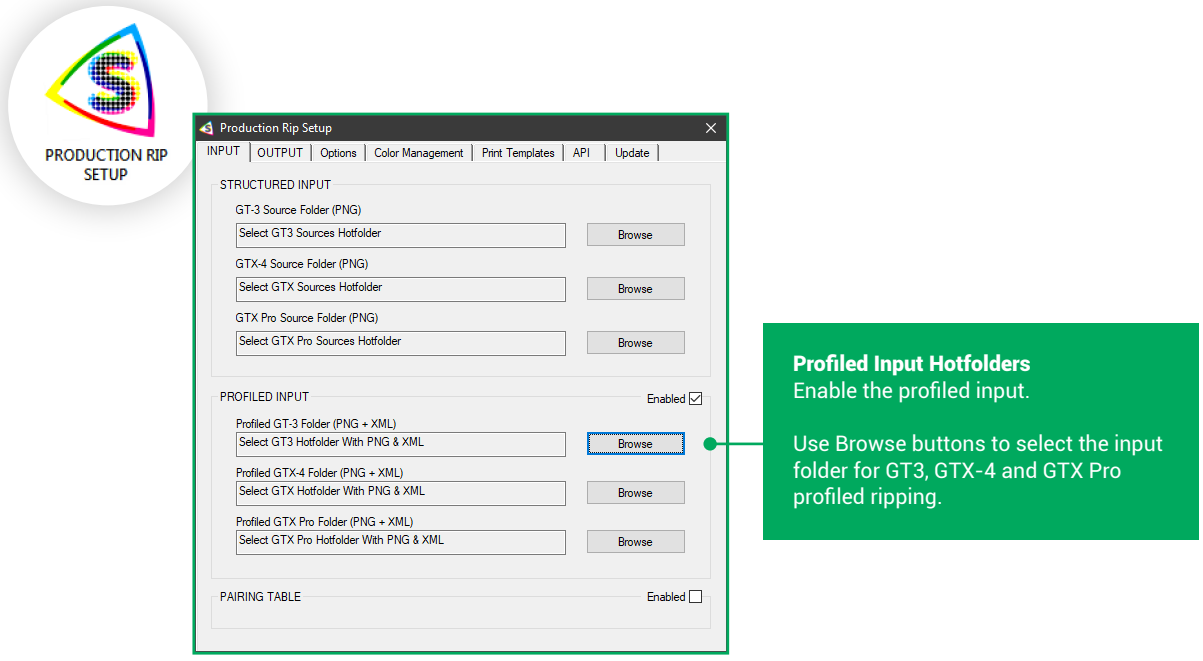
You can use separated folders, or point more inputs to the same location. In this way each contained .png will be ripped into more print file formats.

If you dont want to rip for one of the printers, just point the source to empty folder.

PRODUCTION RIP SETUP/INPUT SETTINGS

PROFILED INPUT

In addition to structured input you can also use Profiled Input.
Rip is expecting to find source graphics as .png or .pdf and a .xml file of the same name for each source file.
Xml file contains exact parameters of ripping. In this way every file is ripped just the right way.

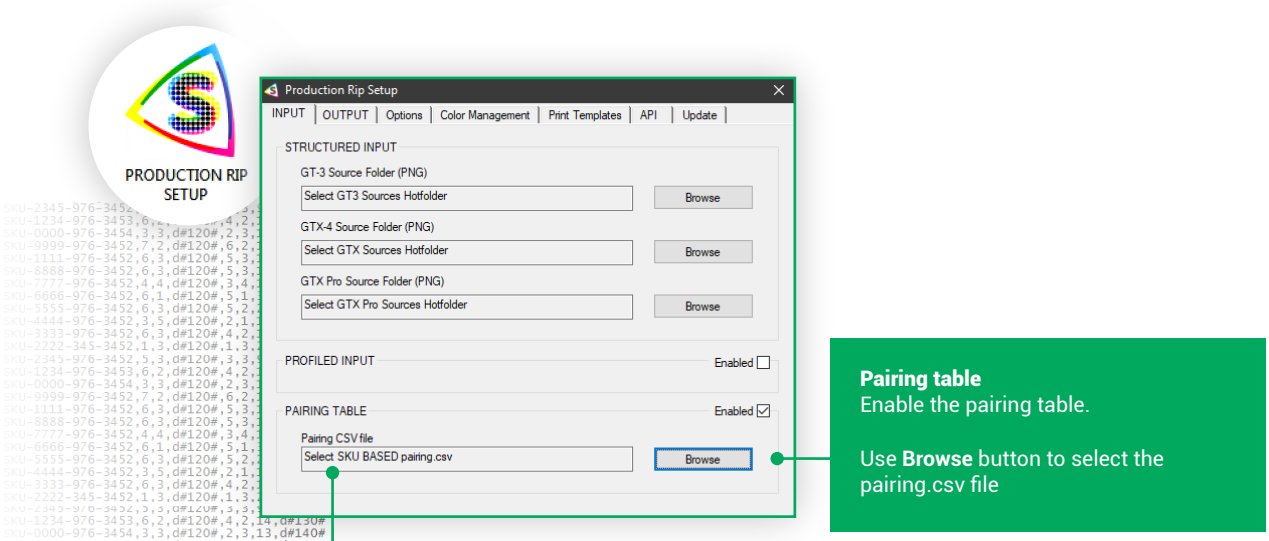


This is an advanced method of data input. Xml structure corresponds with rip settings. This feature is meaned to be used by companies which are able to generate the xml for each graphic file. Each parameter in the xml is bounded to the garment of product on which the print will be printed.

PRODUCTION RIP SETUP/INPUT SETTINGS

PAIRING TABLE

In combination with structured input you can use SKU based pairing table.
Pairing table contains list of SKUs and some variable machine parameters in CSV format.
Each file should contain target product SKU value in the filename.



SKU	GT3-byHighlight	GT3-byMask	GT3-Pretreat	GTX-byHighlight	GTX-byMask	GTX-byMinWhite	GTX-Pretreat
SKU-2345-976-3452	5	3	d#120#	3	3	9	d#120#
SKU-1234-976-3453	6	2	d#120#	4	2	14	d#130#
SKU-0000-976-3454	3	3	d#120#	2	3	13	d#140#
SKU-9999-976-3452	7	2	d#120#	6	2	12	d#100#
SKU-1111-976-3452	6	3	d#120#	5	3	11	d#080#
SKU-8888-976-3452	6	3	d#120#	5	3	15	s#120#
SKU-7777-976-3452	4	4	d#120#	3	4	10	s#120#
SKU-6666-976-3452	6	1	d#120#	5	1	30	s#120#
SKU-5555-976-3452	6	3	d#120#	5	2	20	s#120#
SKU-4444-976-3452	3	5	d#120#	2	1	15	s#120#
SKU-3333-976-3452	6	3	d#120#	4	2	10	d#100#
SKU-2222-345-3452	1	3	d#120#	1	3	22	d#120#
SKU-2222-9736-3452	10	30	d#120#	10	30	32	d#120#

All parameters wich are paired with the source file based on SKU will become priority over the Structured Input folder based settings.

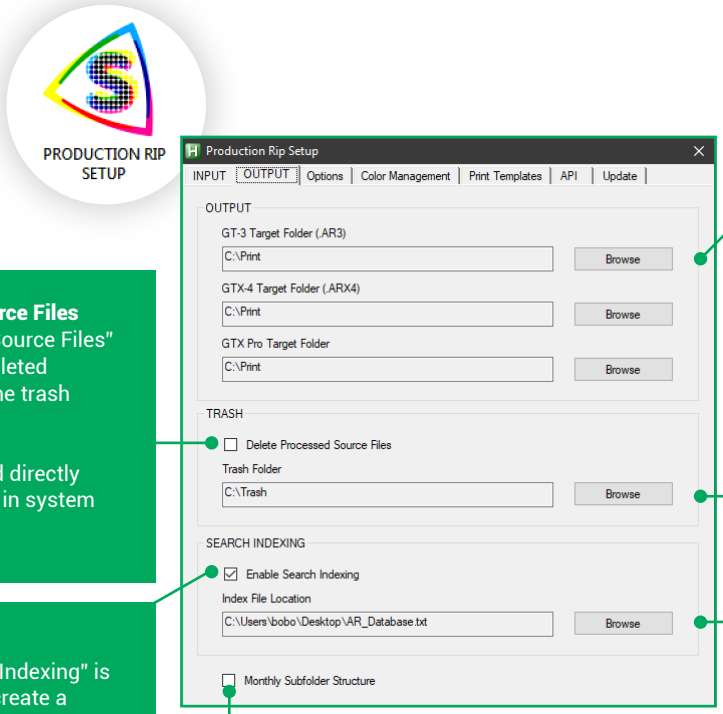
Pretreat value is defined as a combination of direction (D-Double, or S-Single) and a speed (#120#).
Special Metafile is created containing the precalculation of spray zone, driection and speed settings
This way you can use with our Pretreat Optimiser for Pretreat Maker IV.

Pairing table method is an extension of structured input and a compromise to profile input.
You can edit the xml file in excel manually or make it generated by your backend system or e-shop.

PRODUCTION RIP SETUP/OUTPUT SETTINGS

PRINT FILES OUTPUT

Setup output location for your print files. You can set separate location for GT3, GTX4 and GTX Pro print files.
Set what should happen with source files which are already processed. If to delete, or move them to trash folder. Trash can be considered also like Processed source files location.
Serach Indexing will help optimise the barcode scanning process (if you are Search And Execute user).



Print Files Output
Use Browse buttons to select the output location for your print files.

Trash Processed Source Files
Source Files which are processed are moved to Trash folder in set location.

To set the location press Browse button, then select target directory.

/Trash is added automatically.

Delete Processed Source Files
If "Delete Processed Source Files" is enabled, files are deleted instead of moved to the trash folder.

These files are deleted directly and you cannot find it in system recycle bin.

Search Indexing
When "Enable Search Indexing" is checked. the Rip will create a record in the file database of Search and Execute tool.

This allows you to search for each ripped file right after the print file is made.

Database File
Press Browse button and locate the directory where is or should be the S&E database file saved.

Monthly Subfolders
If Enabled, an Year-Month subfolder will be created in all output directories (including trash - if enabled). Print files are saved to this subfolder.

Especially usefull if you are printing thousands of files monthly. You will be able to manage your files and clear them month by month.
It also shortens the network storage load time.

PRODUCTION RIP SETUP/OPTIONS

PRODUCTION RIP OPTIONS

Setup many different settings, affecting application behaviour.

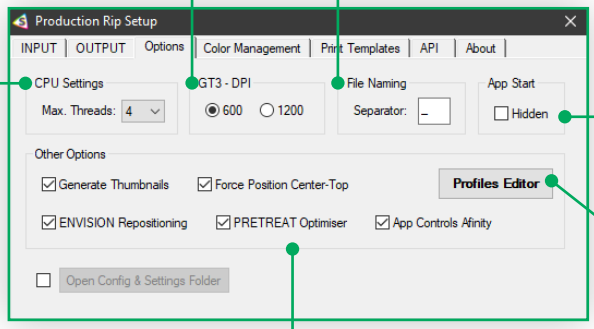
GT3-DPI
Set the DPI mode of ripping for GT3. This setting is currently global.

File Naming
Set the file name components separator. Production Rip is able to analyse file and folder names and process the files according to it. Set the separator of components in here.

CPU Settings
Production Rip supports mutliple computer cores. You can set the maximum amount of cores to be used by the rip. If you have computer dedicated for ripping, just use maximum number of cores to get the best performance of ripping.

If you have computer where you work with photoshop or other applications and besides you would like to rip, then decrease the number of cores.

Production Rip supports up to 32 logical cores.



App Start
Enable hidden rip mode.

The rip will run hidden, just ripping the files without visible user interface.

Profiles Editor
Opens editor where you can setup settings profiles and generate Structured input folders structure.

Other Options
Generate Thumbnails - if enabled the rip will created small preview file of ripped graphics and save it to /Thumbs folder in output directory

Force Position Center-Top - default placement of graphics is Top-Left. Any file found in the input folder will be placed Top Left of the plate and ripped. By enabling this option, each file will be centered on top instead.

Allow ENVISION Repositioning - This option is here for envision users. Source file of the graphics will be copied to /PNG folder in output directory.

Pretreat Optimiser - if enabled the rip will create small metafiles in PTO subfolder of output directory. The file will contain precalculated spray zone. Speed and direction of spray depends input file name or pairing table parameters.

App Controls Afinity - changing the way of CPU cores assigment. If this option is enabled the rip is assigning ripping processes to computer cores, trying to fully use each. Disabling this option will left the process managamen on the operating system.

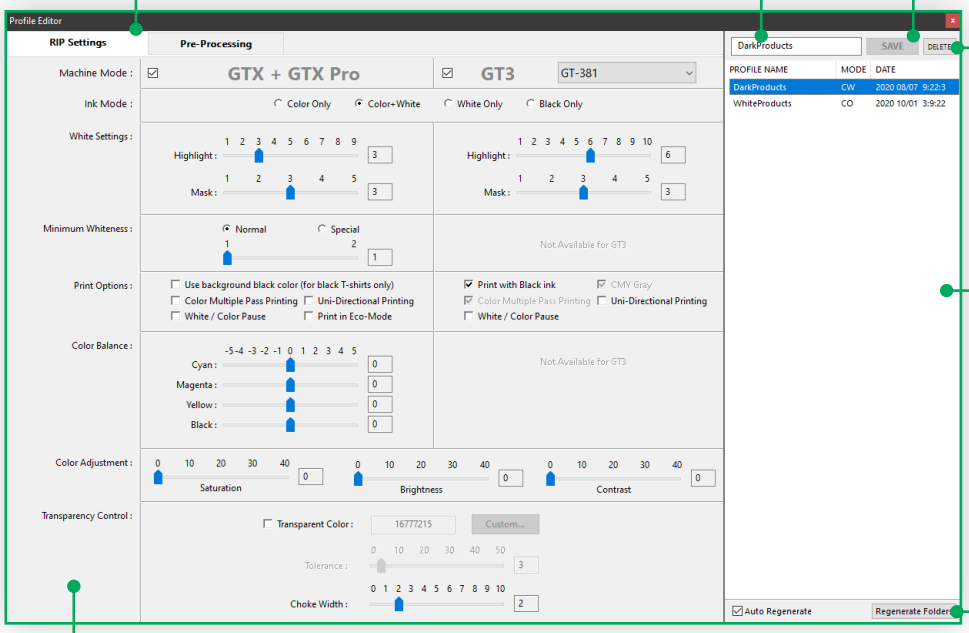
PRODUCTION RIP SETUP/PROFILES EDITOR

PROFILES EDITOR - RIP SETTINGS

RIPPING STEPS
Select options of "Pre-Processing" and "Rip Settings"

Profile Name
Keep the name unchanged to replace existing profile, or type new name to save new one.

Save Profile
Press the button to save profile.
If there are any changes to be saved, or if you type new profile name, the button becomes activated.



Delete Profile
Select profile from the list and click this button to remove it.

Profiles List
All profiles created and supported by the rip are listed here.
Each profile is reffering to XML where the settings are stored.
Profile Name is connected with folder name.

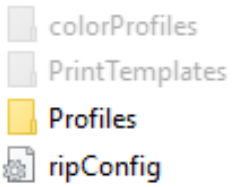
Regenerate Folders
When you are happy with all profiles from the list, just press this button.

It will automatically generate all required subfolders in your input directories. Structured by name settings contained in ripConfig.ini

Auto Regenerate enabled will maintain subfolders automatically when SAVE button is pressed or when new input folder is selected inside rip Setup.

RIP SETTINGS
Set the ripping parameters for GTX 4, GTX Pro and GT3. Settings are stored in Rip Settings Profile and bound to the folders structure.

Production Rip is using the Brother engine for ripping which means that also settings are the same. If you are familiar with PDIP, Graphics Lab or Graphics Lab Basic, you should be already familiar also with those parameters.



Production Rip is delivered with two basic setting profiles one for dark and one for white garments.

C:\Users\UserName\AppData\Roaming\ProductionRip\Profiles

PRODUCTION RIP SETUP/PROFILES EDITOR

PROFILES EDITOR - RIP SETTINGS

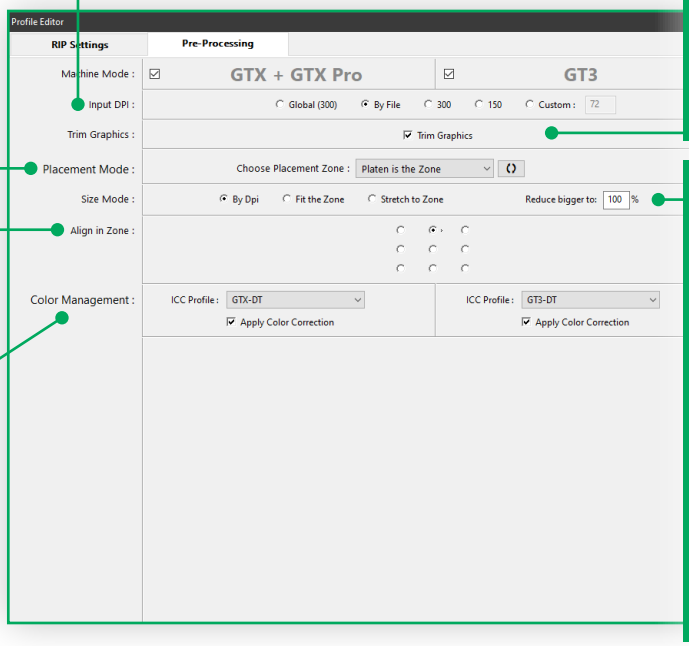
Input DPI
This parameter tells the rip how to read input file. In case of pdf its a parameter of rasterisation. For commonn graphics files its setting printed dimension of image.

Placement Mode
Select prefered placement template. By default the complete platen is the zone in which the image will be placed.

You can choose some predefined placement zones or make your own placement templates.

Aling In Zone
Alignemnt of graphics inside the placement zone.

Color Management
Select Color Profile which will be applied to render the graphics properly for print. Apply color correction is optional to enhance the result. Choose sRGB to keep original colors.



Trim Graphics
Target graphic can be many times delivered on transparent canvas. Trim will remove all surrounding empty space and continue working just with valid graphics.

Size Mode
Define scaling of graphics inside the placement zone.

By DPI - graphics will be 1:1 to size calculated by input DPI.
Fit to the Zone - graphics will be scaled proportionaly to fit the zone
Stretch to Zone - graphics will be stretched in each direction to fill the zone.
Reduce if Bigger - graphics bigger then the zone will be scaled down to predefined value. (Not applicable in stretch mode)

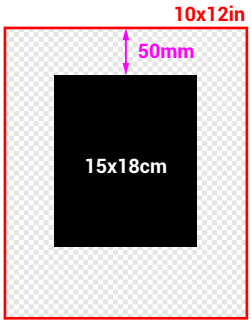
There are several ways to control size and position of artwork during ripping.

Inside the artwork file.
Using Placement Templates.
By file name parameters.

PRODUCTION RIP SETUP/PROFILES EDITOR

PLACEMENT TEMPLATES - CREATE TEMPLATES

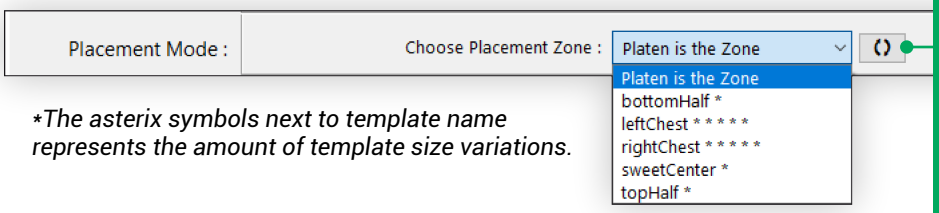
Placement Templates are simple PNG files. Empty canvas with a black rectangle inside. Canvas represents the Platen. Black rectangle represents the Zone of placement. If the template is selected in profiles Editor, the Graphic will be placed inside this zone during ripping, aligned and scaled to respect the settings.



- Use graphical editor to create your own templates.
- Create empty canvas in size of the platen (let say 10x12in @72dpi).
- Draw black (0,0,0) rectangle inside (Lets say 15x18cm)
- Place it centered 50mm from the top.
- Very important is the file name structure - **TemplateName_PlateSize.PNG**
  Example: myTemplate_10x12.png, myTemplate_14x16.png...
- Save the template as PNG into **Placement Templates** folder.

Production Rip is delivered with several Placement Templates. It is easy to make your own.

C:\Users\UserName\AppData\Roaming\ProductionRip\Placement Templates

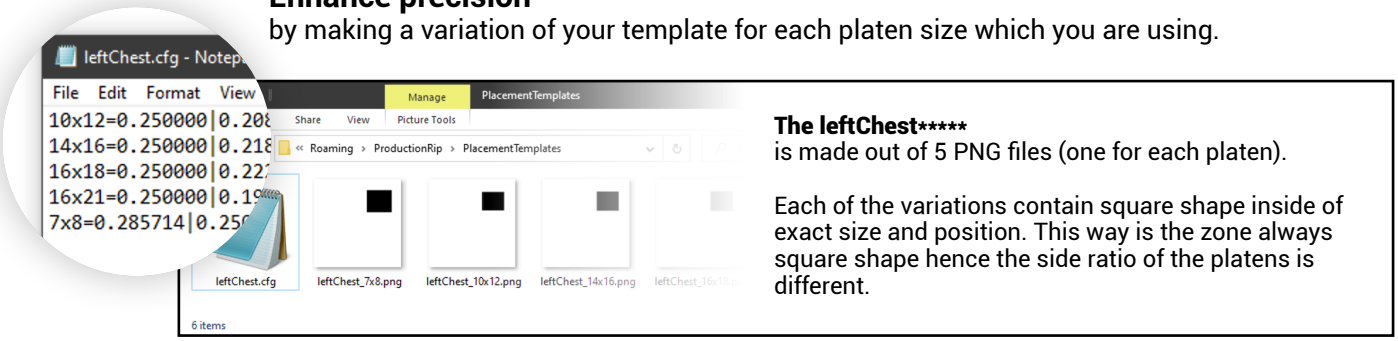


**The asterix symbols next to template name represents the amount of template size variations.*

Refresh Templates
Press this button every time when new template is added. Rip will analyse template PNGs and save precalculated dimensions into configuration file. Values of this analyse are relative. Your templates wil appear in the dropdown list.

Enhance precision

by making a variation of your template for each platen size which you are using.



The leftChest***
is made out of 5 PNG files (one for each platen).

Each of the variations contain square shape inside of exact size and position. This way is the zone always square shape hence the side ratio of the platens is different.

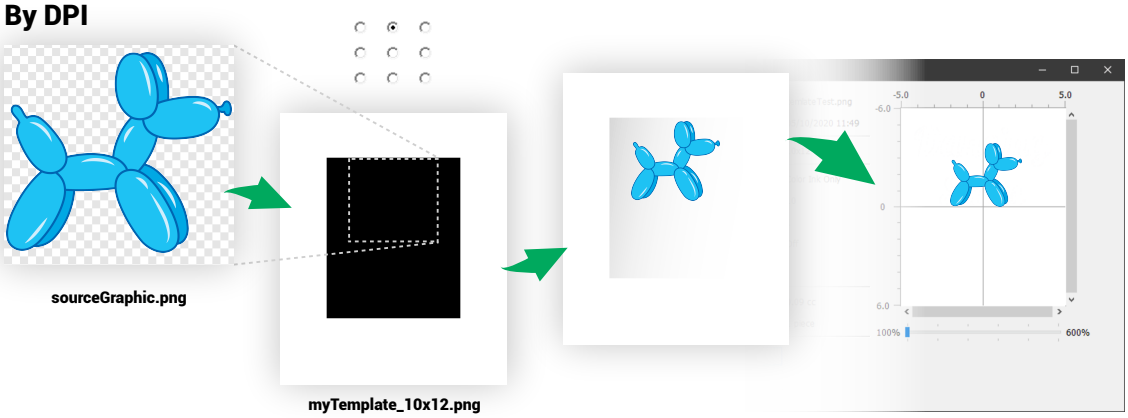
Single star templates are proportionaly matched with platens actually used for ripping.
Double or triple stars templates are matched to closest side ratio of platen actually used for ripping.

Templates of very simple concept like **bottomHalf** or **topHalf** do not need variations.
Their definition is just top or bottom 50% of the platen, therefore it doesnt matter which size was chosen to define the template it will always be relative (0.5) 50%.

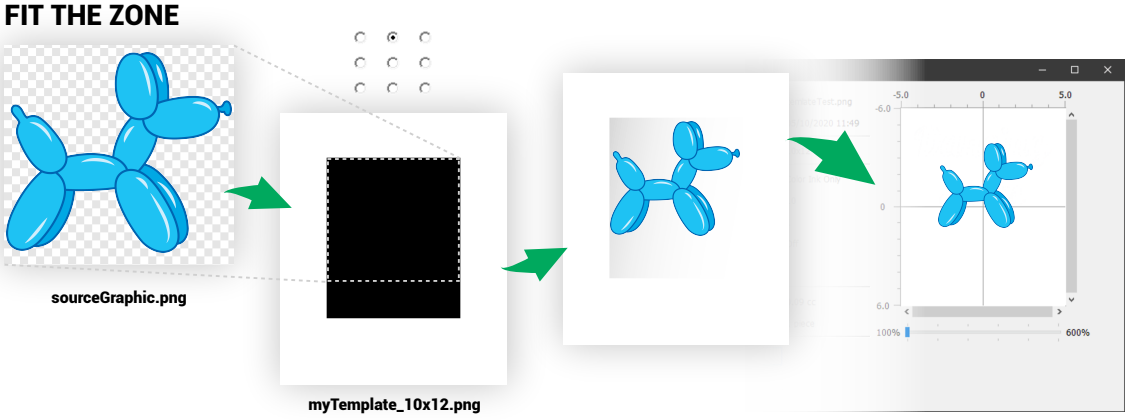
PRODUCTION RIP SETUP/PROFILES EDITOR

PLACEMENT TEMPLATES - USING TEMPLATES

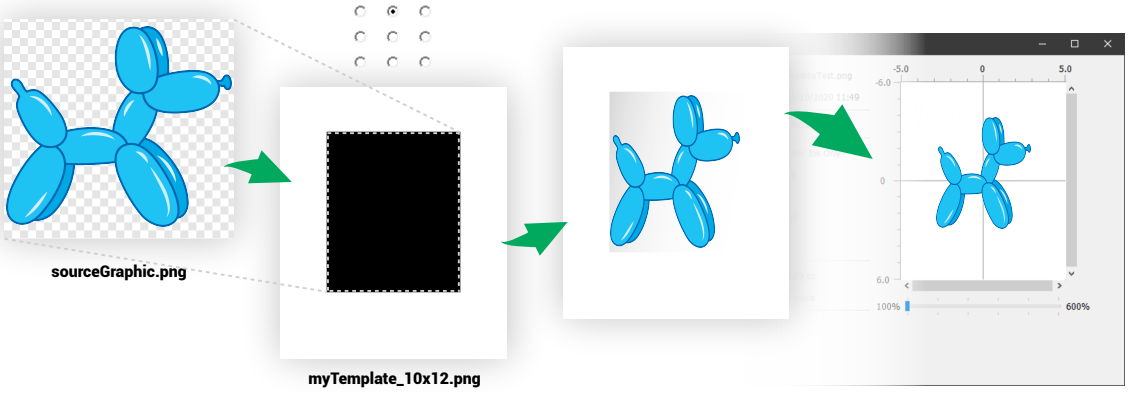
By DPI



FIT THE ZONE



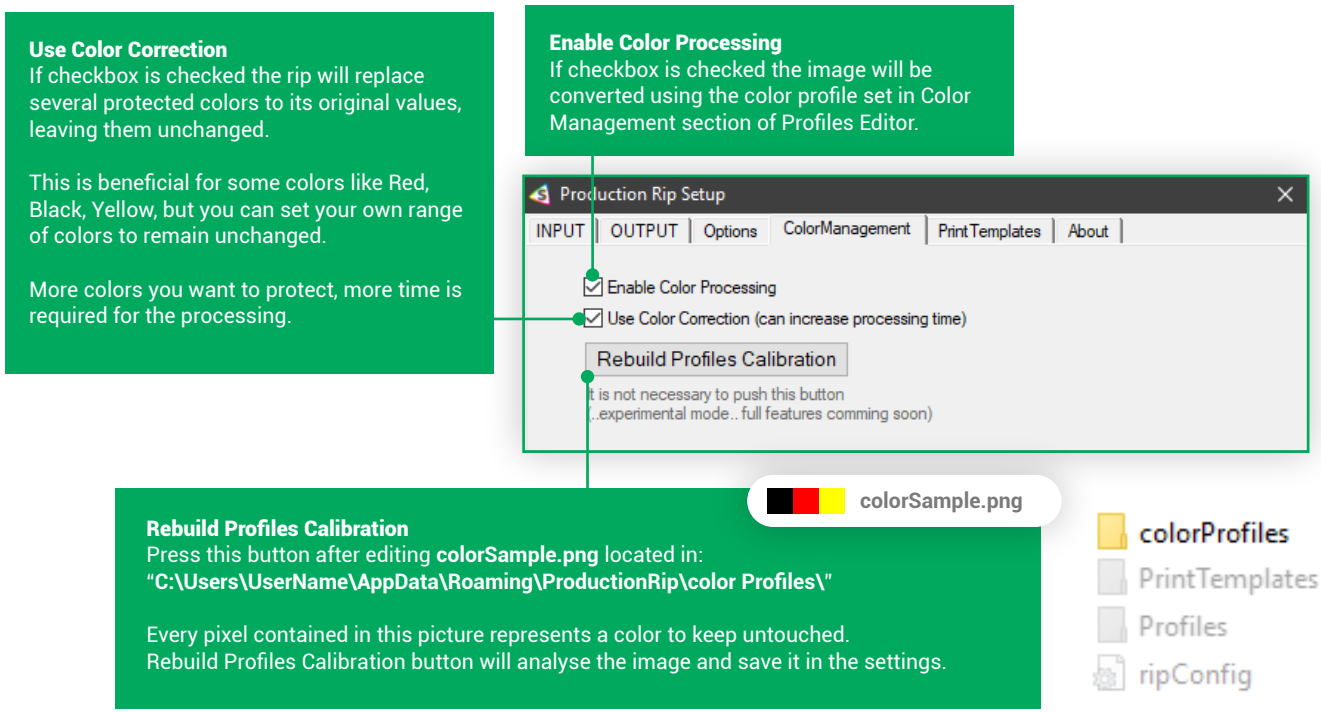
STRETCH TO ZONE



PRODUCTION RIP SETUP/COLOR MANAGEMENT

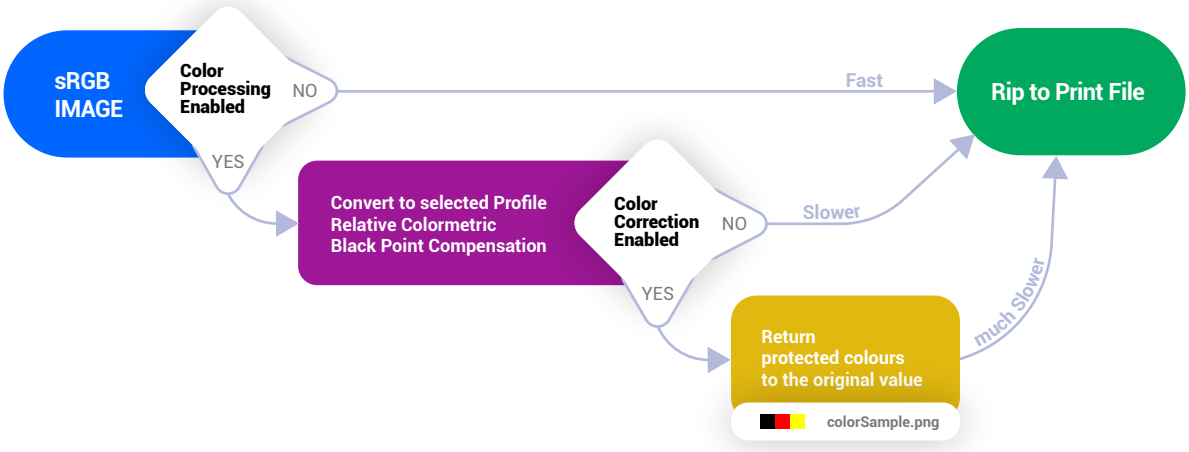
COLOR MANAGEMENT OPTIONS

Production rip supports basic color profile conversion plus additional adjustmets for certain colours. Trying to get technicaly perfect colors, but also breaking the rules of color management to provide more what you see (on monitor) is what you get (in print) by protecting colors which should remain unaffected.



Production Rip is delivered with few basic color profiles for dark and white garments GT3 and GTX. You are free to load your own into:

C:\Users\UserName\AppData\Roaming\ProductionRip\colorProfiles



PRODUCTION RIP SETUP/PRINT TEMPLATES

LABEL PRINTING

Print templates are post processing step of ripping. Once the file is ripped and the template engine is enabled, the rip will generate preview graphics, barcode, file name, date, and other parameters available in predefined template graphics which is then send to printer.

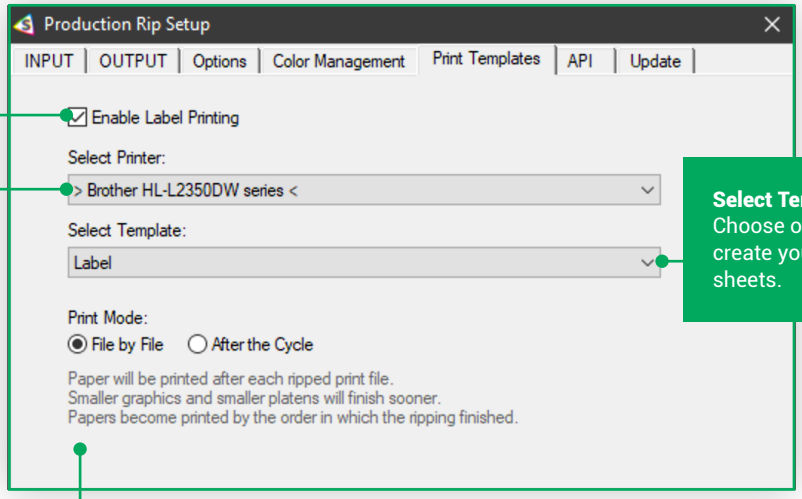
In this way you can get your barcode sheet generated during ripping. Then use it later in production to find and send the files to printer fast.

Enable Label Printing
If checked, print template will be used to generate and print the label with barcode.

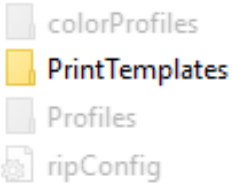
Output Printer
Select the printer on which will be the label printed after generation.

Select some office printer available on the computer where rip is running.

After riping is finished, just take the pile of papers, scan and print.



Select Template
Choose one of default labels or create your own barcode sheets.



Print Mode
Print mode is affecting the order in which the papers come out of the printer.

File by File - Print file is ripped, related label come out of printer. Some files are ripped sooner than the others. So the lables come out in random order.

After the cycle - All files are ripped and all related lables are generated to temp directory. Then all lables are printed in correct order. (by order id, or sku..)

Very usefull feature if you dont have your own barcode sheets.

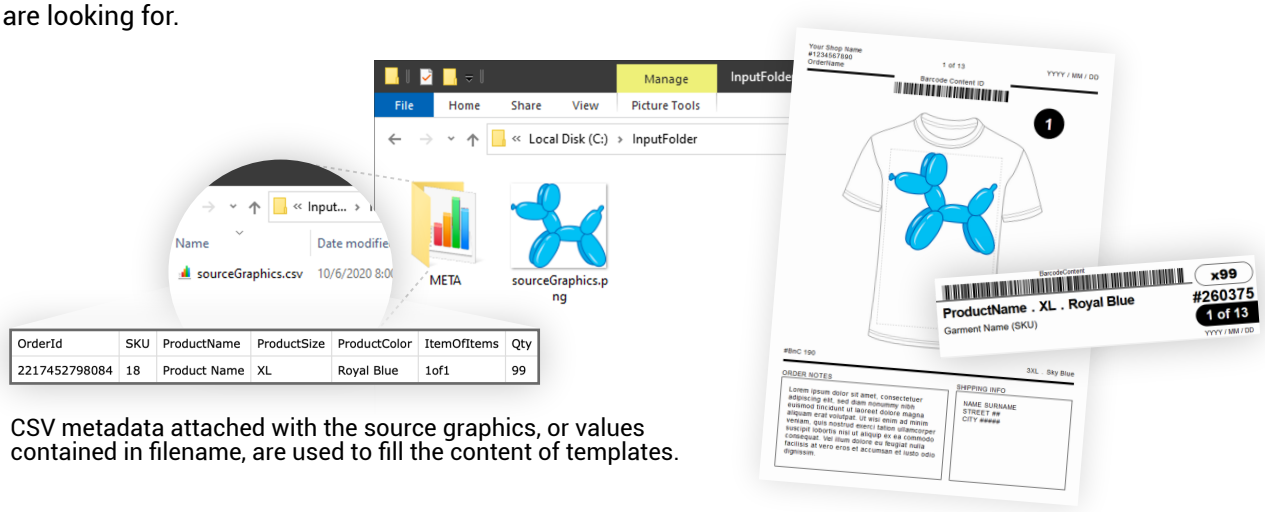
PRODUCTION RIP SETUP/PRINT TEMPLATES

TEMPLATE DEFINITION

Template system is made in HTML to provide required variability of layouts, sizes and contents.

C:\Users\UserName\AppData\Roaming\ProductionRip\PrintTemplates

You are free to duplicate any of the templates contained in PrintTemplates directory. Very basic template without any desing is the one in the "Source" subdirectory. That one can be extended or styled to get what you are looking for.



CSV metadata attached with the source graphics, or values contained in filename, are used to fill the content of templates.

Templates consists of template html file and some assets in the assets directory (images, fonts,css..). Template system uses the HTML DOM to locate elemnts by ID and fill it with the information. To get a content to the template we need to define correct IDs of html elements. Each column of the metadata csv is bounded with the element ID.

Bounded Dynamic IDs

** ** → ** XL **

Our CSV metadata contains "**ProductSize**" column and its value "**XL**". To display the "**XL**" in the html template, we can define the template in this way.

Template engine matches the ID "**ProductSize**" with the same column name and fill in the "**XL**" as it's **content**.

**Only IDs with the suffix -Content are used for dynamic matching with the CSV.*

Static IDs & Specials

Some IDs are specific for this template system, required for correct operation or having a special properties.
PageSetup - required element with this id is wrapping the template. It contains definition of page size in mm.
Barcode-Image - image element with this id is used to display artwork barcode
BarcodeShip-Image - image element with this id is used to display shipping barcode
Preview-Image - image element with this id is used to display artwork.
ProductPreview - image of product dummy.
class="Dark" or cass="White" is assigned automatically based on the print file settings.
CurrentDate-Content: YYYY / MM / DD
ItemOfItems: # of ## - each # is replaced by number

USING PRODUCTION RIP/SOFTWARE UPDATES

UPDATING

There is no automatic update built into the Envision software yet. Automatic updates will never be available for production environment. By the rule “never change working thing”. Each of our tools have build in check for update including the change log.

Usually updates are coming with each new Brother driver version. Production Rip update contains a Brother update as well so its advisable that you do not upgrade your printer drivers alone. Please download Production Rip update, upgrade the dongle and then update the driver from the Production Rip installer.

How to Upgrade the dongle

- Go to http://brain.industries/envision/ and from the menu select the download section.
- Or Click the Download Button after Check for update.
- Download Production Rip Upgrade and save it on your Desktop.
- Keep only the Production Rip dongle in the computer (in case that you have also other software dongles)
- Run a Dongle update and wait.
- Follow the installer.

PRODUCTION RIP MANUAL/CONTACTS & MORE

If you have any questions please use contact formular at
https://brain.industries/envision/

Your Notes

Manual **version 1.0** release date: 20/10/2020