ANALOG WAY®

QUICK START GUIDE

Thank you for choosing **Analog Way** and the **OPS300.** By following these simple steps, you should be able to setup and use your powerful Multi-Layer Hi-Resolution Mixer/Matrix Seamless Switcher within minutes. Discover the **OPS300** extensive capabilities and intuitive interface while configuring your first show, and unleash your creativity for a new experience in show and event management by **Analog Way**.

What's in the box

1 x **OPS300** (OPS300)
1 x **Power supply cord**
2 x **DVI male to HD15 female and DVI-D female breakout cable**
1 x **HD15 to 5 BNC cable**
1 x **Ethernet cross cable (for device update)**
1 x **DB9 to 4 BNC + mini-Din 4 (video breakout cable)**
1 x **Set of 3 audio 10-pin screw terminals**
4 x **Screws for handle removal (M4x12mm)**

1 x **User Manual (PDF version) ***
1 x **Quick Start Guide (PDF version) ***
1 x **RCS - Remote Control Software (PC only) ***

** Download on our website: **www.analogway.com***

WARNING !

If required, front handles of the device can be dismantled, but with caution.
The original screws removed must not be reintroduced to their location without handles in place.
Substantial damages can occur, including risk of electric shock from the mains voltage.

Only **M4x12mm** screws can be used.
(They are supplied with the unit)

Quick install and setup

Getting started:

You may wish to reset the unit to factory settings to get started. Go to: Menu --> Control --> Default Values --> Yes.

1. Select the Output resolution that matches the native resolution of your display. You will next be prompted to choose enable follow mode if desired and output rate.

   Menu --> Output --> Output format --> 1024x768 --> Internal Ref --> 60 Hz.

2. Inputs can be configured automatically using the *Auto Set All* function.

   Menu --> Intputs --> AutoSet All --> Yes.

   It will scan each input and detect the sync type that is plugged in. You can still do an *Autoset* or manual setup per input.

The OPS300 has 6 layers available called: [BACKGROUND FRAME], [BACKGROUND LIVE], [PIP1], [PIP2], [LOGO1] and [LOGO2]. Each layer will obscure your view other layers below.

3. To display a source, Select the [BACKGROUND LIVE] layer (it will begin to blink) then, select a source (it will also blink). Press [TAKE] to transition your source from preview to program output.

There will always be a layer selected (blinking) and a source selected (blinking) to the selected layer (blinking). To view on preview or change the contents of a different layer, simply select it. Only 1 layer can be seen on the preview at a time.

4. To display a PIP, select the PIP layer (it will begin to blink) then select your source (it will also blink). Press [TAKE] to display the PIP on program output.

To see the layer beneath, you will need to clear or move the layers that are on top.

5. To clear the PIP or any other layer, select the layer (it will blink) then, select [BLACK]. Press [TAKE] to remove the layer from the program output.

TIP If you would like the Program and Preview to toggle/flipflop during each Take, enable this feature by going to Menu --> Control --> Preset Toggle.

Once enabled, everything on the Program output will become the Preview during each Take.

6. To display a logo or frame (framestore) follow the steps on page 4.

See the next page which describes the button lighting color code and other front panel features.

OPS300 can be used to display (in Mixer Mode):

- sources seamlessly switched in the **Background Live layer**.
- **2 PIPs** and 2 Logos over the Background Live layer.
- **3 PIPs** and 2 Logos over a Background Frame by resizing the Background Live layer**.**

<u>IMPORTANT</u>: **Simply selecting a menu item will not set it to that value. Be sure to press the ENTER button when parametering the menu items.**

OPS300 - Ref. OPS300
Front Panel Description

WORKING WITH OPS300

The features of OPS300 can be controled by the external remote control as:

- Orchestra - Ref. ORC50
- Axion2 - Ref. ARC200
- Remote Control Software - Ref. RCS (supplied)
- Triple Remote Control Keypad - Ref. TRK-800
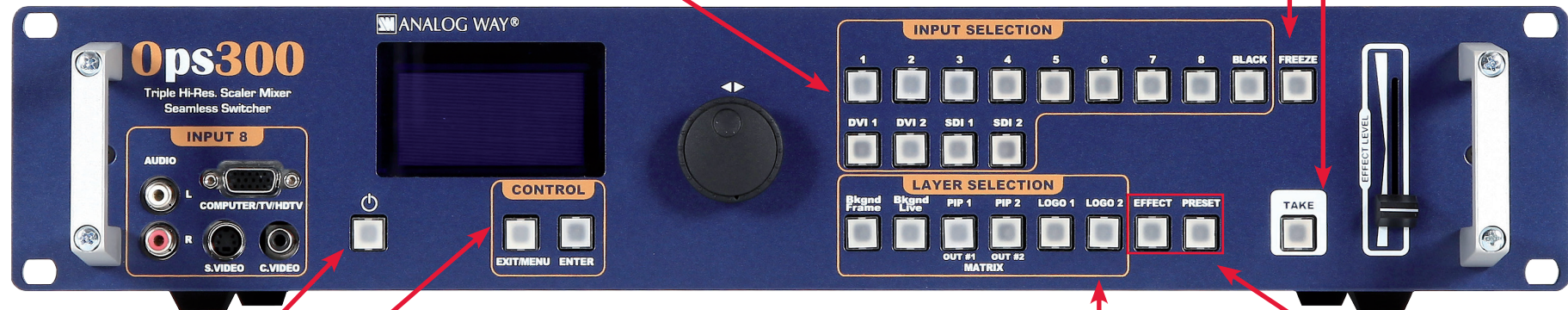- Remote Control Keypad - Ref. RK-300

INPUT SELECTION

#1 to #8: Press to access analog source #1 to #8
DVI 1 to DVI 2: Press to access DVI #1 or DVI #2
SDI 1 to SDI 2: Press to access SDI #1 or SDI #2
BLACK: Change the active layer to Black

FREEZE

FREEZE: Freeze the input linked to the current layer on MAIN

TAKE

Display the pre-selected sources onto the MAIN output with the selected effects

STAND-BY

STAND-BY: Hold for 3 seconds for stand-by Mode

CONTROL

EXIT/MENU: Home Menu or back one level
ENTER: Validate the menu or command

LAYER SECTION

Press to select a layer, then choose an input.
LOGO2: Display a partial screen Logo
LOGO1: Display a partial screen Logo
PIP2: Display a live source
PIP1: Display a live source
Bkgnd Live: Display a live source
Bkgnd Frame: Display full screen frame in this layer

LAYER HIERARCHY

LOGO2
LOGO1
PIP2
PIP1
Background Live
Background Frame

EFFECT/PRESET

EFFECT: Select a custom transition
PRESET: Recall a custom stored preset (4 memories available). To store a preset, use Menu --> PRESET.

BUTTON COLOR USAGE

Solid red:
#1 = Source is on the main outputs
#2 = Freeze enable
#3 = Stand-by button
#4 = Preset Selection

Solid green:
#1 = Source is on Preview
#2 = Function available for modification

Blinking red:
Layer/source selected, and is currently active on the main output

Blinking green:
Layer/source selected, and is not currently active one the main output

OPERATIONS OVERVIEW

WORKING IN MIXER MODE

1- Select a layer then select an **INPUT**.
2- On the preview screen, the input appears
3- Select an **[EFFECT]** (open/close)
4- Press **[TAKE]** to view the result on the Main screen
5- Try enabling the 'Preset Toggle' from the Control menu to have your preview replaced by program during each Take

WORKING WITH PIPs IN MIXER MODE

1- Press the **[PIP #1** or **#2]** button. On the preview screen, the PIP (layer) appears as a color rectangle
2- Select an input. On the preview screen, the input appears in the layer rectangle
3- Adjust the PIP (layer) with **Layer menu** (Pos & Size or Zoom)
4- Select a transition (open/close) or an effect into Layer menu **[HOME MENU]**
5- Press **[TAKE]** to view the result on the main screen
6- To remove layer, press **[BLACK]** then **[TAKE]**
7- For another PIP setup, repeat from step #1

INPUT SETUP

1- Press the **[EXIT/MENU]** button from the Home menu [all functions must be confirmed by the **[ENTER]** button
2- Select **INPUT** and **AUTOSET ALL** and **YES**
3- If the acquisition has failed, check all connections and perform a manual setup
4- For a comprehensive Input Setup, please refer to user's Manual
5- For a manual input setup, press the **[EXIT/MENU]** button:
   a) Select **INPUT** menu
   b) Select an input from Input #1 up to SDI #2, then
   c) Select **TYPE**.

NOTE: To adjust input Size or Pos, use the [Layer] Menus. To adjust Blanking, use the Auto-Centering or Blanking adjustments in the Image menu.

OUTPUT SETUP

1- Press the **[EXIT/MENU]** button from the Home menu. All functions must be confirmed by the **[ENTER]** button
2- Select **OUTPUT** menu
3- Select **OUTPUT FORMAT**
4- On Format line, select the display's native resolution and select the rate
5- Control or adjust your display device (Monitor or Video Projector)
6- If necessary, select **TEST PATTERN** in the Output menu

OPS300 - Ref. OPS300
Rear Panel Description

RS-232 communication port on a DB9 female connector

IP-LAN connector

SD/HD-SDI/3G-SDI inputs #1 & #2: female BNC

SD/HD-SDI/3G-SDI output and SD/HDTV output (DB9)

3.5mm Jack Stereo Connector input (unbalanced)

MCO Male Connector for unbalanced inputs #5 to #6
DVI #1 and DVI #2: Unbalanced
Input #7 and AUX: Balanced

WARNING : WARRANTY IS NOT VALID IF THE DEVICE HAS BEEN OPENED. MANUFACTURER AUTHORIZATION MANDATORY FOR ANY RETURN.

S/N : CS460
Accepted by BV
MADE IN E.U.

MAC ADDRESS 00-20-4A-CF-13-4D

VIDEO OUT

SD/HD-SDI

SD/HDTV

AUDIO INPUTS

PRELIST   MAIN OUTPUT

RS-232   INPUT #4   INPUT #5   IP-LAN   SD/HD-SDI   ANALOG   ANALOG

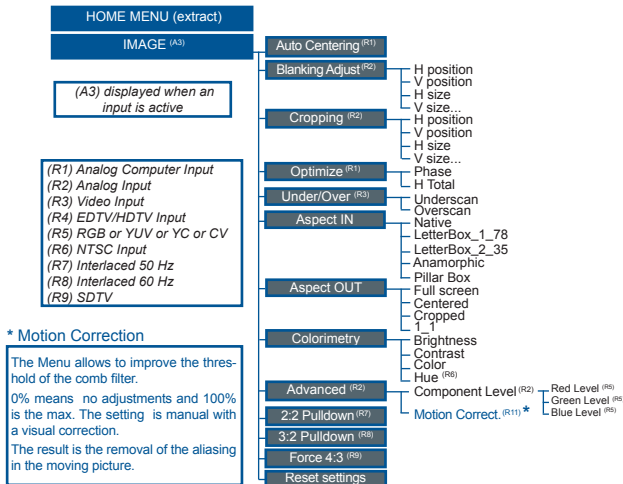INPUT #1   INPUT #2   INPUT #3   DVI-D 1   INPUT #6   DVI-D 2   INPUT #7   DVI-I   DVI-I

100-240 VAC 2A 50/60Hz   MODEL : OPS300   UNIVERSAL COMPUTER/TV/HDTV INPUTS   MAIN / OUTPUT #1   PREVIEW / OUTPUT #2

Universal Analog Computer/TV/HDTV inputs #1 to #5

Outputs #1 & #2: female HD15, DVI-I (simultaneous analog and digital outputs)

AUDIO OUTPUT
Prelist and Main Audio Output

Power supply: IEC/EN/UL/CSA 60950-1, internal, autoswitchable

DVI connectors: DVI-D inputs #1 and #2 on the DVI-I digital pins, and Universal Analog inputs #6 & #7 on the DVI-A analog pins. Use the included break-in cable.

HOW TO ADJUST A SOURCE?

HOME MENU (extract)
IMAGE (A3)

(A3) displayed when an input is active

(R1) Analog Computer Input
(R2) Analog Input
(R3) Video Input
(R4) EDTV/HDTV Input
(R5) RGB or YUV or YC or CV
(R6) NTSC Input
(R7) Interlaced 50 Hz
(R8) Interlaced 60 Hz
(R9) SDTV

Auto Centering (R1)
Blanking Adjust (R2) — H position / V position / H size / V size...
Cropping (R2) — H position / V position / H size / V size...
Optimize (R1) — Phase / H Total
Under/Over (R3) — Underscan / Overscan / Native
Aspect IN — LetterBox_1_78 / LetterBox_2_35 / Anamorphic / Pillar Box
Aspect OUT — Full screen / Centered / Cropped / 1_1
Colorimetry — Brightness / Contrast / Color / Hue (R6)
Advanced (R2) — Component Level (R2) — Red Level (R5) / Green Level (R5) / Blue Level (R5)
2:2 Pulldown (R7) — Motion Correct. (R11) *
3:2 Pulldown (R8)
Force 4:3 (R9)
Reset settings

* Motion Correction

The Menu allows to improve the threshold of the comb filter.

0% means no adjustments and 100% is the max. The setting is manual with a visual correction.

The result is the removal of the aliasing in the moving picture.


HOME MENU

The Home Menu is the system's top level menu, from which all others menus can be accessed. To access a menu, press the [MENU] button. To navigate in the Home Menu, please use the knob. To confirm, please use the [ENTER] button. You can also return to the Home Menu by pressing the [EXIT] button.

- **INPUT:** select to configure the 1 individual input types and resolutions
- **MAIN OUT:** select to set Format and Rate for the Main screeen
- **PREVIEW OUT:** select to Format and Rate for the Preview screen
- **VIDEO OUT:** select to configure video output card settings
- **PRESET:** select to store and use presets
- **IMAGE:** select to change source image settings of an input
- **KEYING/TITLING:** select to access keying and titling controls and parameters
- **LAYER:** select to adjust layer size, position, border, transparency or transitions
- **LOGOS/FRAMES:** select to store (record), manage logos and frames
- **AUDIO:** select to access all audio input and output parameters
- **CONTROL:** select to access device software information, LAN settings, reset factory settings, amongst other user oriented functions (see next page)

AUDIO INPUT/OUTPUT CONNECTIONS

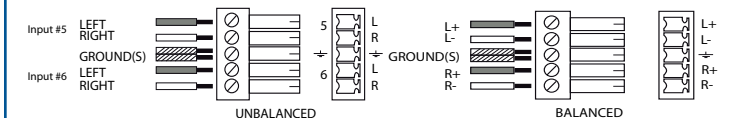**3.5mm Jack Stereo Connector**
Inputs #1 to #4: Unbalanced connection

Right
Left
Ground
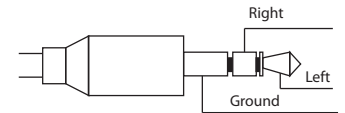
MCO Male Connectors *
Inputs #5 to #6: Unbalanced connection
Inputs DVI #1 & #2: Unbalanced connection

Input #7 & (AUX): Balanced connection
Main Output: Balanced connection

Input #5   LEFT / RIGHT   GROUND(S)
Input #6   LEFT / RIGHT

UNBALANCED

GROUND(S)

BALANCED

* A set of 3 audio 10-pin screw terminals is provided with the device. The figure represents the lower or upper connector.

How to do an AutoTake?

HOME MENU (extract)		
CONTROL	AutoTake	☑ Enabled or disabled

The Autotake function performs a [TAKE] automatically each time an input is selected.

How to record & display a still Frame?

HOME MENU (extract)		
LOGOS / FRAMES	Record Frames	Frame #1 to #8

The [Empty] term appears next to all unused slots

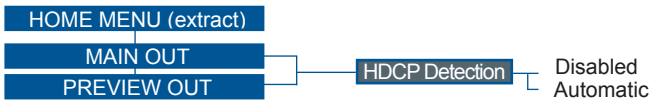**Frame:** Full and individual picture.

Logo: Part of picture like a graphic symbol which represent a company or organisation.

It is possible to store up to 8 frames and 8 logos in the OPS300 non volatile memory.

► Select [RECORD FRAMES] in the Logos/Frames menu.
► A white rectangle will appear on your main display, indicating the Frame which will be captured.
► Select an empty Frame memory to store the Frame into. Your Frame will now be stored.
► To recall a frame: press the [BKGND/FRAME] button, select a Frame number (#1 to #8), then press the [TAKE] button. Your background Frame will appear on your main screen, under any other active layers. Be sure to clear or move any other layers to expose the Background Frame layer.
► To remove the Background Frame, press [BLACK] button, then [TAKE] button.
► Once you have recall a Frame, you can recall live layers on the top of it.

TIP: A long press on the [BACKGROUND FRAME] button will set all other layers to black/clear on the preview. Press [TAKE] to view your selected frame.

How to disable the HDCP encryption?

HOME MENU (extract)			
INPUT	DVI1 or DVI2	HDCP enable	☑ Enabled or disabled

HOME MENU (extract)		
MAIN OUT		
PREVIEW OUT	HDCP Detection	Disabled / Automatic

The HDCP Encryption can be disabled on DVI inputs #1 to #2 or/and Main Output / Preview Output. This can be useful when you have a computer which is detecting the HDCP compliance of your switcher and protecting the content by encrypting the signal from this computer. This feature will disable the HDCP compliance on this specific DVI input only.

If you want to use HDCP content from your sources, be sure to use only HDCP compliant screens or projector. If it's not the case, the output image could be disabled.

Screen will go to black without displaying the HDCP input image, or partially layer out on HDCP content.
The output status can provide you all information about the output in real time. This feature is particularly useful when HDCP is used with long cable to be sure the communication is well handled.

How to use the Auto-Lock Function?

HOME MENU (extract)		
CONTROL	Auto-Lock	☑ Enabled or disabled

[AUTO-LOCK] allows to select an input only if a signal is valid.

Warranty

This **Analog Way** product has a 3 year warranty on parts and labor, back to factory. This warranty does not include faults resulting from user negligence, special modifications, electrical surges, abuse (drop/crush), and/or other unusual damage.

Going further with the OPS300

For complete details and operations procedures, please refer to the **OPS300** User's Manual and our website for further information: **www.analogway.com**