

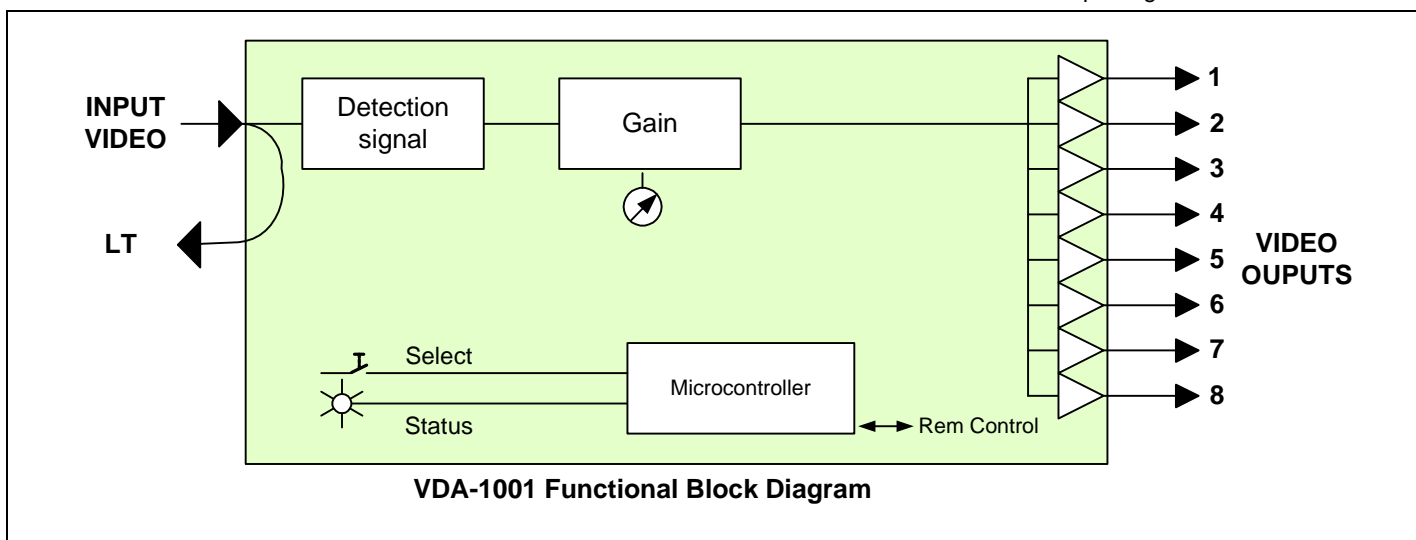
VDA-1001

Introduction

The VDA-1001 is an analogue video distribution amplifier with a differential looping input and 8 outputs. Gain can be controlled from the card edge. An input video signal status is also available indicating the input signal presence. The differential input provides rejection of hum and other artefacts on incoming signals. The VDA-1001 is housed in a DENSITÉ frame and requires a single or double rear connector panel.

Features

- Analogue video differential input with passive loop-through
- 8 x 75 Ohms outputs
- Supports 525/625 lines
- Supports PAL, SECAM and NTSC video standards
- 90 MHz analogue video bandwidth
- Control of gain from the card edge
- Status Led and remote reporting



Technical specifications

Input

Signal: 1 Vpp nominal
Return loss: >45 dB up to 10 MHz
Coupling: DC
Level: 0.3 to 1.5 Vcc
Impedance: 75 ohms
Common mode signal: 28 Vcc
Common mode rejection: >65 dB to 10 kHz

Output

Signal (8): 1 Vpp nominal, ajustable
Return loss: >45 dB up to 20 MHz
Impedance: 75 ohms
Phase match
between outputs: PAL -SECAM .. <0.1 ° @ 4.43 MHz
NTSC <0.1 ° @ 3.58 MHz
Cross talk: > 40 dB @ 10 MHz
Response variation: <0.1 dB,
..... 1 to 8 loads, to 20 MHz

Processing Performance

Gain: ±3 dB
Frequency response: ±0.02 dB up to 5 MHz
..... ±0.1 dB up to 10 MHz
..... -3 dB @ 90 MHz typically
Differential gain: <0.15 %
Differential phase: <0.15 ° with 8 loads
..... <0.1° with 2 load
Horizontal tilt: <0.25% coupling DC
Vertical tilt: <0.25 % coupling DC
S/N : >70 dB up to 15 MHz
..... (rms noise/0.714V, unweighted)
Chroma/luma delay: < ±1 ns
Chroma/luma gain: < ±0.02 dB
HUM: <1 mV
Processing delay 15 ns

Power: single 1.5 W
..... double 2W

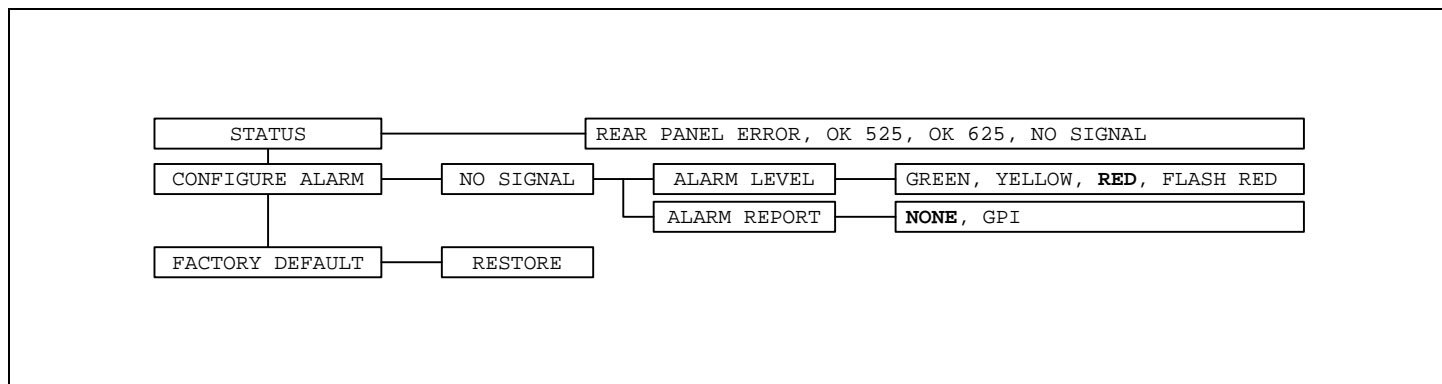
Specifications are subject to change without notice..

Exploitation

Menu Introduction

Parameters are accessed and changed via an easy-to-use menu. The flow chart below outlines the entire VDA-1001 menu path. Each menu is described throughout this section.

The procedure and the operation mode are described in the common paragraph of the DENSITÉ Manual. The menu organisation is made out of a main menu and several sub-menus. A press on the [SELECT] front panel push button accesses to the menu. A lack of activity turns off the display. Default values are written with bold characters.



Menu Description

{STATUS}

Displays status of the different board alarms. The higher-level alarm is displayed, even if not configured to activate the *STATUS* Led..

REAR PANEL ERROR Indicates an absence of the rear panel or an incompatibility between the module and the rear panel. The *STATUS* led turns on flashing red.

OK 525	Indicates the incoming signal is a valid 525 lines signal.
OK 625	Indicates the incoming signal is a valid 625 lines signal.
NO SIGNAL	Indicates an absence of incoming signal

{CONFIGURE ALARM}

It is possible to associate the *STATUS* Led colour and/or a GPI relay activation to each detected error.

Alarm relay activation depends of the *ENABLE* selection of the controller board menu GPI REPORT.

ALARM LEVEL Associates to each error the *STATUS* led colour: GREEN, YELLOW, RED and FLASH RED. This selection has no influence on the {STATUS} menu display.

ALARM REPORT The default value NONE is assigned to errors. Alarm relay activation will be associated to an error when GPI is set.

{FACTORY DEFAULT}

RESTORE Set the module with the factory default parameters.

Status and Report

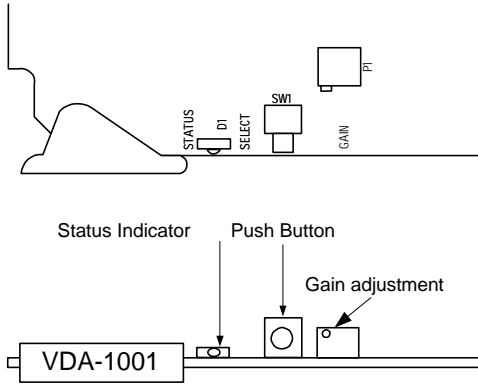
This table shows the front Led colour and the report action according to the level of a given error condition. Notice that the "Flashing Yellow" indicates that the SELECT button on the front panel has been pushed, and the card is being accessed via the communication protocol.

	Non requested messages	GPI Report	Green	Yellow	Red	Flashing Red	Flashing Yellow
No signal detected on Input	☒				☒		-
Card accessed via the communication protocol							Yes
Rear Panel not matching	-	-	-	-	-	Yes	-

Factory default. ☒

Note: The non requested message affectation to an alarm status can only be accessed by the communication protocol (serial port)

Front Edge Presentation

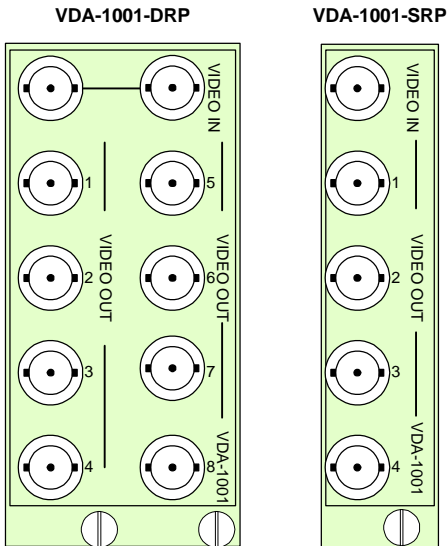


Configuration

P1	GAIN AJUSTEMENT
GAIN	Trimmer for gain adjustment

Connections

VDA-1001 is used with the single rear panel VDA-1001-SRP that includes 1 input to 4 outputs or with the double rear panel VDA-1001-DRP that includes 1 input to 8 outputs



Board Presentation

