

P R I M A R E



Primare Delay Box

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Issue: Delay Box

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FCC Warning: This equipment generates and can radiate radio frequency energy and if not installed and used correctly in accordance with our instructions may cause interference to radio communications or radio and television reception. It has been type-tested and complies with the limits set out in Subpart J, Part 15 of FCC rules for a Class B computing device. These limits are intended to provide reasonable protection against such interference in home installations.

EEC: This product has been designed and type-tested to comply with the limits set out in EN55013 and EN55020.

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Modern displays, such as plasma screens, LCD screens and projectors use sophisticated imaging processors to produce the best picture possible. This processing takes time and produces a delay in the picture display. In bad cases sound can be heard before the image. This is called a lip-sync error.

Welcome to the Primare Delay Box

The Primare Delay Box corrects lip sync errors in home cinema systems by using a digital audio (S/PDIF) signal. The Primare Delay Box is connected between the digital audio (S/PDIF) of your DVD (or similar). The unit delays the digital audio signal by a time of your choice. This results in a perfect sound and picture synchronisation.

Intuitive user interface

In keeping with the philosophy of the Primare range of systems, the Delay Box can be controlled through a very simple and intuitive set of front panel controls.

Alternatively all the functions of the Delay box can be controlled by the Remote Control supplied with the Delay box.

Technical performance

The Delay Box is capable of full conversion between a coax and an optical signal.

E. g. any input signal to coax will be available from both outputs (coax and Toslink), as any input signal to Toslink will be available from both outputs.

You choose the type of input signal that will be available by means of button 1 and 2 on the front panel.

Note! No conversion is carried out when the delay box is in BYPASS mode.

CONNECTING THE DELAY BOX

This chapter provides a quick overview of how to connect the Delay Box to other components in your system.

Power connection



Warning: Before connecting power, check that the required supply voltage, indicated on the AC/DC-adaptor, corresponds to your local AC supply. If a different voltage is stated on the type plate do not connect the Delay Box to the mains power, and seek advice from your dealer.

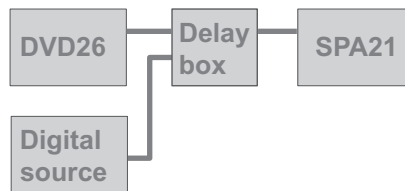
Connect the mains power using the enclosed mains cable (transformer).

NOTE: Always disconnect the Delay Box and all other units in the system from the mains power before connecting or disconnecting any of the cables. This might seriously damage the unit.

Safety instructions

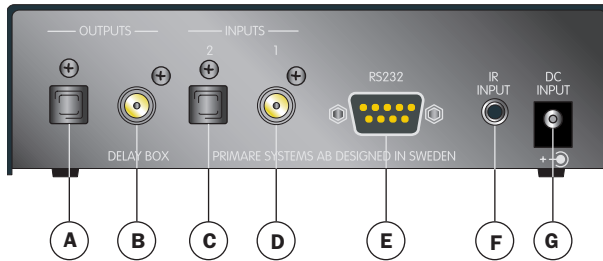
To prevent fire or shock hazard, do not expose this appliance to dripping or splashing. No objects filled with liquids, such as vases, should be placed on the Delay Box.

Connecting the Delay Box in your system



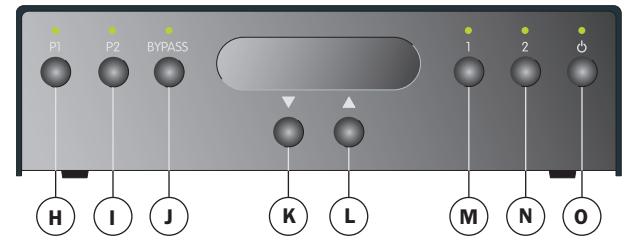
- Connect the digital audio coax cable (S/PDIF) or optical cable (TOSlink) from the DVD or other source into the **INPUT** of the Delay Box.
- Connect another digital audio (S/PDIF) coax cable or optical cable (TOSlink) from the Delay Box **OUTPUT** to the amplifier.

Back panel connections



- A. Optical, TOSlink, output
- B. Coax, SPDIF, output
- C. Optical, TOSlink, input
- D. Coax, SPDIF, input
- E. DATA (RS232) input for home installation
- F. IR/input
- G. Main power input (12V)

Front panel display




- H. Preset 1
- I. Preset 2
- J. Bypass
- K. Decrease delay time in milliseconds
- L. Increase delay time in milliseconds
- M. Input 1 (coax digital audio)
- N. Input 2 (TOSlink)
- O. Standby

Mains ON

- Plug the lead from the power adapter into the Primare Delay Box and the other end into a wall socket.

The stand by indicator will light up and the Delay Box is ready for operation.

To switch on from standby or to standby



- Pressing  on the front panel or on the remote control, will change the standby mode.

Infra-red remote control

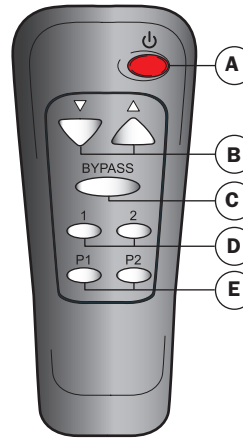
The Delay Box is fully controlled by an infra-red remote control.

IR-back

The Delay Box can also be controlled by using the IR-input at the backpanel. Make sure that the Delay Box is in standby mode.

- Hold down button **2** on the front panel and press . The standby indicator will blink **-2-**.
- Hold down button **1** on the front panel and press  to restore the IR-input to the front. **-1-** is displayed for a couple of seconds.

The Remote Control



- A. Standby ON/OFF
- B. Increase/decrease delay time in milliseconds
- C. Bypass
- D. Input 1 and 2
- E. Preset 1 and 2

To dim the front panel display

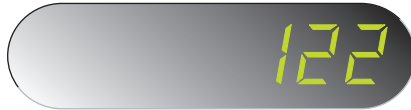
- Simultaneously press button **1** and **2** on the front panel for two seconds. The display will dim.

When adjusting any values the display will temporary light up for a couple of seconds.

- Simultaneously press button **1** and **2** on the front panel for two seconds to restore the Delay Box from dim mode.

Determining a delay value

The amount of delay is presented on the front panel display as soon as the Delay box is connected in the system.



- Press button 1.

Use the buttons ▲ and ▼ on the front panel or the remote control to select a required delay time.

- Press button 2.

Use the buttons ▲ and ▼ on the front panel or the remote control to select a required delay.

The delay time value steps one millisecond at a time until the nearest ten. Then it steps 10 milliseconds at a time until the nearest hundred and thereafter it steps a hundred at a time up to 600 milliseconds. The time delay value counts down in the same way.

Presetting a delay value

- Press button **P1** for 3 sec. The indicator will blink three times and the preset value is stored.
- Press button **P2** for 3 sec. The indicator will blink three times and the preset value is stored.

Bypass

Automatic bypass

The unit detects 44,1 kHz sampling rate from a standard compact disc and switches automatically into bypass mode.



Manual bypass

If delay is wanted for 44,1 kHz sampling rate:

- Press and hold the **BYPASS** button on the front panel for a couple of seconds. The indicator will flash three times.

Use the buttons ▲ and ▼ to increase or decrease the delay time.

- To restore automatic bypass, press and hold the **BYPASS** button on the front panel again. The indicator will flash two times.

