

UnicoCDPrimo

Those who already know the **Unico** series will immediately notice the new chassis and the new aluminium cover that will be available in natural satin aluminium or black anodized finish according to the current aesthetic trends.

The new look has been chosen to give our products a new appealing style and also to make them more suitable to be integrated in hi-fi systems which can include components from other brands.

At the same time, we are aware of how recognizable and appreciated is the “*Unico-style*” all over the world and we believe in the importance to preserve the identity of our products maintaining some winning elements and distinctive details like the sand blasted aluminium and the general layout of the front panel.

Also in this new series, the front panels will be treated with sand blasting and anodizing processes. The sand blasting consists in hammering the aluminium plate with microscopic ceramic balls at room temperature: it gives the surface a homogeneous and opaque finishing; the successive anodizing allows the growth of a thin film of aluminium oxide which enhance the mechanical resistance and hardness of the surface.

The user interface adopts a wide 128x64 LCD display which dynamically shows useful information on the reproduction status in a clear and intuitive way. Together with the automatic brightness adjustment, in the **UnicoCDPrimo** the possibility to switch off the display backlight LEDs from the remote handset has been added, so to make the presence of the CD player even more discreet during the listening sessions.

All the player functions can be accessed through only four buttons located in the front panel or from the remote handset. Operation is now faster and more comfortable thanks to the new software release: developed in our laboratories, it has been tested and refined for months.

As far as concerning the technical improvements, let us begin mentioning the new toroidal power supply transformer: the power it can transfer, 100VA, in some cases is large enough for a small integrated amplifier and leaves space for future upgrade of the audio stage even if more power requiring designs will be adopted.

Considering now the printed circuit board in detail, it can be noted how the old single motherboard has been substituted in the **UnicoCDPrimo** by two separated boards, one dedicated to the power supply and digital signals circuits, the other to the output stage circuit.

The power supply structure follows closely that successfully used in other models: eight voltage regulators mounted on independent heatsinks ensure excellent control of the voltage levels, good efficiency and reliability.

The management and control of all the CD player functions are entrusted to a versatile microcontroller and to several other interface integrated circuits which coordinate the data exchange between the CD drive, the LCD display, the front panel, the IR receiver and the DAC.

The analogue to digital conversion of the S/PDIF signal has been completely re-designed after a careful research of the best components available. It includes a WolfsonMicro WM8804 digital receiver which controls the incoming data and reduces the jitter, a sample rate conversion stage to 96kHz performed by a BurrBrown SRC4192 (this DIR+SRC stage can be found in much more expensive units) and a D/A conversion stage performed by the brand new WolfsonMicro WM8524 24-bit DAC.

In order to predispose the **UnicoCDPrimo** to future upgrade of the conversion circuit, the motherboard has a special socket where different DAC boards can be inserted; as a part of a more complex and overlooking design **UnicoCDPrimo** is compatible with all the DAC board designed also for the higher level player **UnicoCDE**.

Moreover, the will to design a device as versatile as possible has led also to the construction of the separate board for the output stage, leaving open in this way the possibility for eventual future replacement with new circuits available.

The current audio stage is designed around a single 12AU7/ECC82 double triode operating in pure class A thus characterizing the sonic performance of the unit, followed by a solid state discrete buffer still operating in class A for a low impedance output and ideal audio behaviour.

The possibility of upgrading both DAC and audio stage ensures the **UnicoCDPrimo** never to get old and offers the customer a way to get his beloved component to enrich its offer and satisfy his desires.

But what makes the **UnicoCDPrimo** a new CD player is a digital USB input.

With the feet firmly on the tradition but glancing at the future (actually a future so near to become present) **Unison Research** developed a player with a higher integrability but with usual great sonic quality.

The USB digital input is designed to be connected with any streaming device such as a PC or a laptop and accept isochronous audio data, an auto recognizing IC then perform a pure conversion to standard S/PDIF format feeding the DAC circuit. The audio information suffers no manipulation and is handled by internal hi-fi conversion circuits thus offering a very high quality listening experience.

During our long test we found that with a careful setup every computer can be a hi-fi audio source with all the advantages it offers.

The same care dedicated to the audio amplification circuit design has also been reserved to the control and safety systems of the **UnicoCDPrimo**.

The remote controller body, constituted by one solid wood block and a satin aluminium cover, has been completely designed in our laboratories to ensure the best comfort of use and a pleasant look.

The package, thanks to the cloth case, the stratocell elements and the double external carton, ensures an excellent protection to the device during transportation.

As we have tried to express in this presentation, every ***Unison Research*** product is the sum of our decennial experience in designing and producing fine high fidelity audio devices, our passion and our commitment to offer to the music lovers the possibility to live beautiful moments.

Technical characteristics

Transport:	TEAC CD5010A
Digital Interface Receiver:	Wolfson Micro WM8804
Sample Rate Converter:	Burr Brown SRC4192
D/A Converter:	Wolfson Micro WM8524
Conversion:	24bit / 96kHz
Digital Standard:	AES3, IEC60958 (S/PDIF) and EIAJ CP-1201
Digital Input:	Isochronous-Out 16bit / 32-48kHz (USB-B)
Digital Output:	IEC60958 (S/PDIF) / 44.1kHz
Output Stage:	Solid State Class A
Outputs connectors:	1 RCA stereo
Gain Stage:	Single Triode Class A 1 x ECC82 (12AU7)
Power consumption:	100W max
Dimensions:	17.1in x 3.5in x 17in
Net weight:	22lbs