m32

MIDAS

MIDAS—40 Years of Legendary Performance

For over four decades, MIDAS has enjoyed a long history of innovation and leadership in the world of audio mixing consoles—a legacy that continues on today.

Formed in 1970 by Jeff Byers and Charles Brooke, MIDAS originally designed and manufactured musical instrument amplifiers. Jeff soon became fascinated by the concept of improving and refining professional audio systems, and so MIDAS went on to develop the first fully integrated modular audio system, comprising consoles, crossovers, amplifiers and speaker systems. Indeed the powered mixers built by Jeff in his flat in West Hampstead, London can be regarded as the very first MIDAS consoles.

A fortuitous collaboration came about in 1972 when MIDAS found new premises near Euston Station in London, which just happened to be next to already-established speaker manufacturer Martin Audio. The two co-located companies became synonymous in the minds of many live sound customers and the calibrated MIDAS / Martin modular PA systems became a regular fixture

on concert tours in the 1970s, with Martin Audio responsible for the loudspeaker cabinets, whilst MIDAS manufactured the electronics.

The first MIDAS console to achieve major success was the modular PR04 system, which came about through Jeff Byers' time on the road with Supertramp on their 1974 "Crime of the Century" tour. The PR series, named after the modules available for the consoles, found fame with acts including Billy Joel, Yes, The Beach Boys and on Pink Floyd's 1977 and 1979 world tours.

1980 saw MIDAS supplying the legendary Frank Zappa with a custom PRO5 console. This innovative console changed the way a generation of engineers approached the art of mixing and opened new creative possibilities, and led to the PR 40, generally referred to as the "PRO40" becoming the console of choice throughout the 1980's.

MIDAS found new success at the start of the 1990's with the XL3 monitor console, which set the scene for the greatest analogue console ever built— the XL4.

MIDAS the professionals' choice

Robbie Williams, Nigel Taylor, and James Guthrie with Britannia Row's 105 channels of MIDAS used to mix "THE WALL" concerts by Pink Floyd.

MIDAS the professionals' choice

Frank Zappa with his split 36 into 8/2 MIDAS Live Sound Console on the 1980 Zappa World Tour. Impressed by MIDAS performance and reliability on that tour, he then ordered a 36 into 8/8 Theatre Sound Console with special modifications to allow every concert to be recorded on 24, 8 and 2 tracks simultaneously. Why MIDAS? Because MIDAS experience and design philosophy provide highest quality signal processing in a compact and rugged modular frame built to withstand years of use. Frank Zappa is a professional. MIDAS is the professionals' choice.
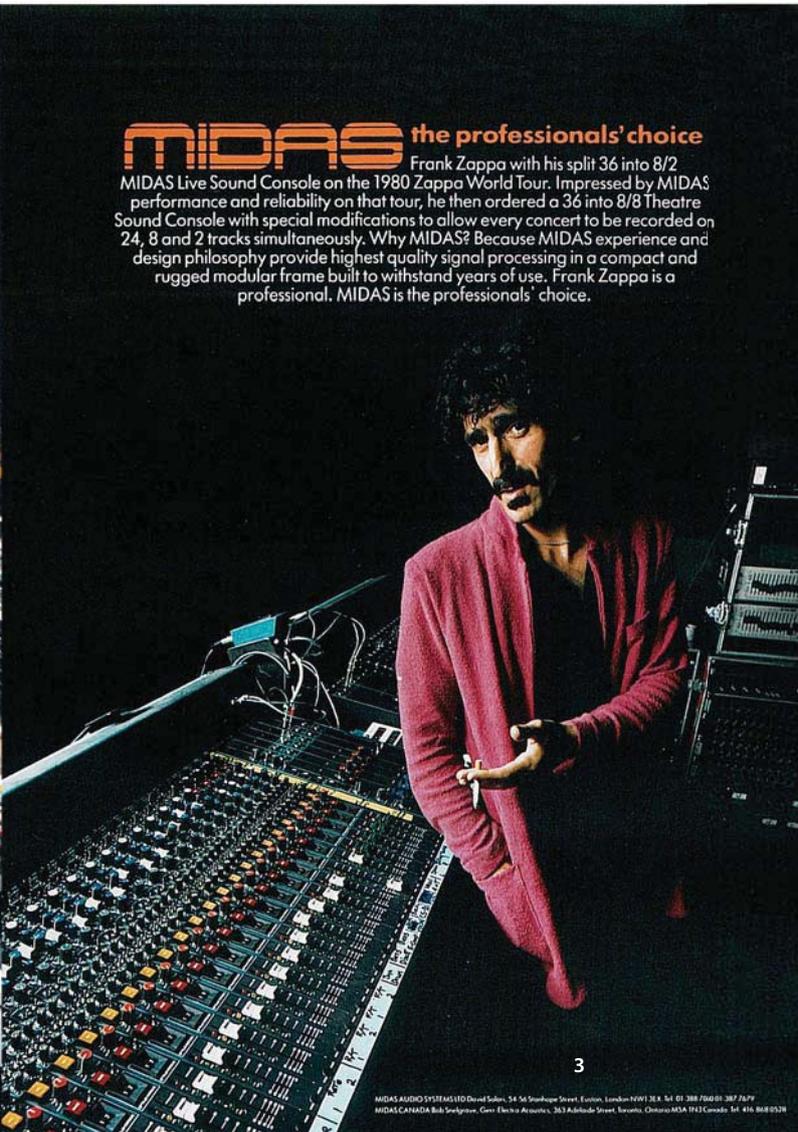
The XL4 went on to set the benchmark for live performance consoles in the 1990's. Audio engineers were amazed by what they were able to achieve using the XL4's unbeatable combination of audio performance and comprehensive moving-fader automation. Many elements of this legendary console are still available to today's engineers in the current range of MIDAS digital mixing systems.

Always seeking to redefine the boundaries of audio performance and flexibility, the turn of the century saw the launch of the ubiquitous HERITAGE 3000. MIDAS employed the ultimate distillation of design and experience in creating the perfect roadworthy touring console. The HERITAGE 2000 and the theatre-orientated HERITAGE 1000 completed the line up.

Over the next decade, the HERITAGE 3000 became the touring concert standard and formed the focal point, along with the XL4, for most major tours for the following decade including acts such as Bon Jovi, Alanis Morrisette, AC/DC, Coldplay, Kid Rock, Metallica, Alicia Keys, Foo Fighters, Christina Aguilera, Sir Paul McCartney, Pearl Jam, and more.

Innovation continued into the new millennium with the LEGEND 3000—the world's first tri-purpose console—as well as the Verona and Siena, which revitalised and redefined the market for medium format consoles.

Then, in 2006, Digital went MIDAS

When the MIDAS XL8 was launched, it set unprecedented new standards for audio quality, ease of use, power, flexibility, and creative potential. No other live digital audio console can compete
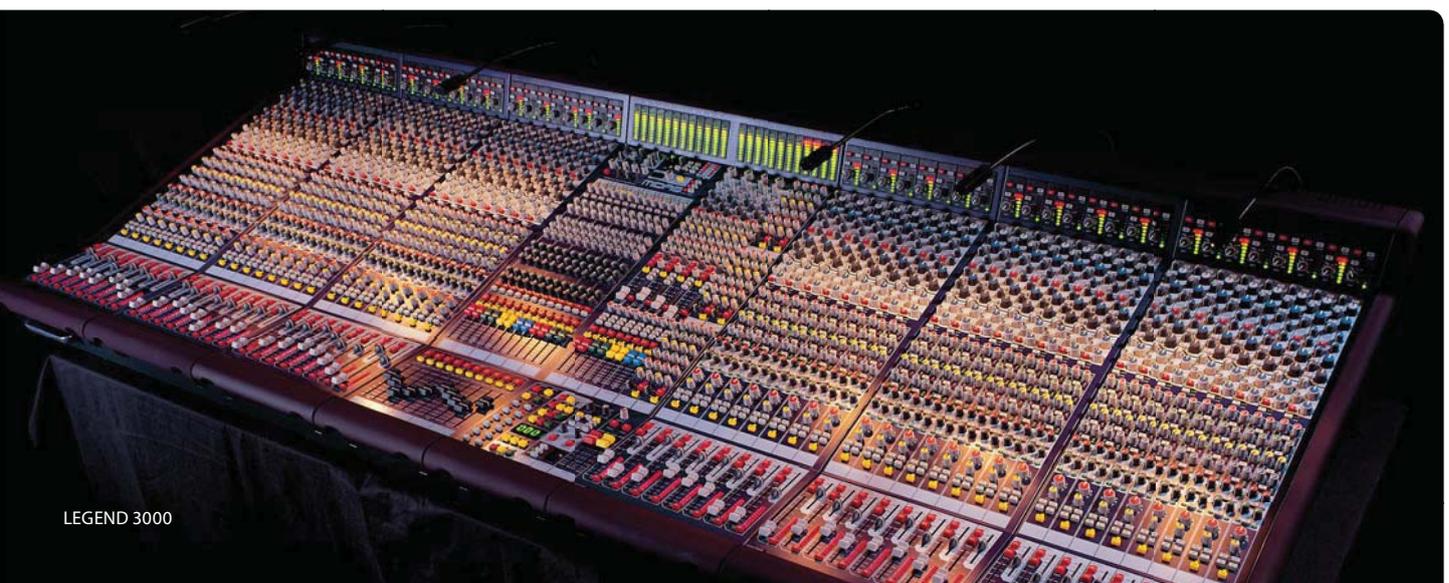
LEGEND 3000

with the sample-synchronous audio performance, expandable network topology, and sheer ease of use that XL8 provides. Since its launch, XL8 has become the system of choice for prestigious installations, major touring performers, theatres, and concert venues the world over, including many unique international events where compromise is not an option.

In 2008, MIDAS released the PRO6 console, which strengthened the company's digital product line. PRO6 shares the same sample-synchronised audio performance and extensive networked audio system as the venerable XL8. The PRO6 has become a common sight at front of house and monitor positions in concert touring as well as global events.

2011 saw the introduction of the PRO2 and PRO2C, offering all the advantages of the large format PROs in a compact footprint. MIDAS has continued to innovate by introducing the MCA—an advanced navigation system allowing increased speed of workflow. The PRO1 introduced MIDAS' first lightweight all-aluminium chassis.

An Exciting New Era

MIDAS releases the mid-format M32 console in 2014, leveraging innovative modern technology and unprecedented manufacturing techniques to introduce legendary MIDAS quality at a previously unheard-of price point.

The M32 continues a 40-year history of excellence and signals an exciting new era for MIDAS.

Designing A Future Classic

Our goal for M32 was to combine the best of classic British console designs with advanced modern technology to completely redefine what a medium-format live console can offer.

We began the industrial design process by drawing inspiration from a somewhat unexpected source - the luxury and high-performance car industry.

Why High-Performance Cars?

Simply because the design teams at Aston Martin*, Bentley*, Rolls Royce*, and other leading manufacturers are skilled at introducing innovative technological advancements while simultaneously maintaining the feel, essence, and intangible qualities of their cherished brands. And in essence, that's the challenge we too faced when creating the M32 console.

So in order to create a future-forward design that took the MIDAS legacy even further, we enlisted the help of Rajesh Kutty, a leading industrial designer known for his work with celebrated luxury auto manufacturers including Bentley.

Kutty started by examining the design elements that have made MIDAS consoles so highly sought after - from the straightforward, logical layout to the unparalleled usability and ergonomics. These are characteristics that live sound engineers around the world have come to rely on, and are key aspects of the MIDAS legacy.

With these design elements in mind, Kutty set forth to create a styling that would be modern, innovative, futuristic, and stunningly elegant.

Many different construction materials were tested. Countless design variations were explored. And in the end, a styling was chosen that represented the perfect marriage between aerodynamic artistry and uncompromising performance. The design is both ultramodern and distinctly classic at the same time.

The Landmark in Console History

A close look at M32 reveals that the styling is completely new in every sense of the word. Rajesh Kutty's automotive-inspired design elements mesh perfectly with a recognisable MIDAS signature, setting the M32 apart from any other console. Its beautifully streamlined and elegant form factor completely revolutionises the experience of live mixing.

Carbon fibre armrest

The MIDAS M32 construction is equally impressive, and is designed to offer you years of reliable performance while withstanding the demanding environment of live performance venues. M32 employs a predominantly space-frame construction, with parts of the sub-frame consisting of durable and lightweight carbon fibre and aluminium. Multiple alloys have been employed throughout to guarantee maximum component efficiency and an improved performance-weight ratio.

The M32 is an innovative, evolved design that brings together modern construction principles and high-tech materials into a styling that's destined to go down as a landmark in console history.
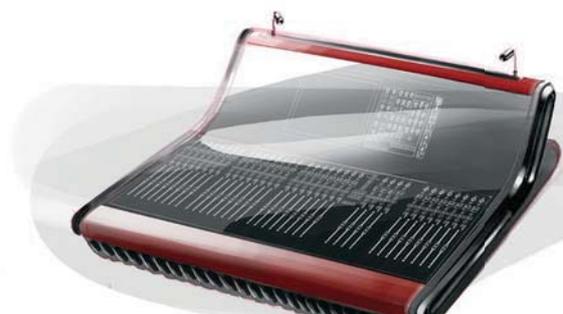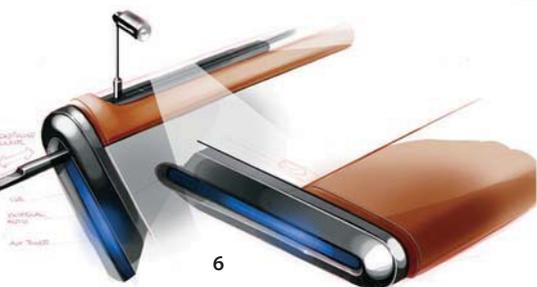
MIDAS is the Epitome of Excellence

In 2013, MIDAS approached me to create a new design language for MIDAS and with it a new mixing console. Having designed for Bentley, I am intimately familiar with the challenge of transforming a brand while retaining the precious heritage -- in this case the 40 year old iconic British mixing console brand MIDAS.

Representing the pinnacle of its industry, MIDAS is the Epitome of Excellence. When it comes to ergonomics, performance and style, the aspects of a high-performance luxury car equally apply to a high-end mixing console. I was given a blank sheet of paper for my choice of materials. This meant considering light weight materials such as carbon fibre and aluminum, while using a sophisticated steel construction, for high-impact structural areas.

High attention was paid to the tactile elements such as fader knobs and the illumination to work under all background conditions.

From the onset the idea was to break the mould! Hence the form study deliberately tried to break away from the static, bulky feel of today's mixing consoles. Instead making it more dynamic, ergonomic, yet luxurious. Colours, size, mobility and hardware where given equal importance to arrive at the M32. A true projection of the brand, today.

I am very happy with the outcome of the M32 and feel honoured to have my name associated with MIDAS.

Rajesh Kutty

Industry-Leading 192 kHz Precision

The groundbreaking M32 console combines legendary MIDAS sound quality with advanced digital technology, future-proof 96 kHz capable open architecture design and industry-leading 192 kHz ADC and DAC converters, creating a revolutionary mid-format live console. M32 features ultra-sleek styling, offering you a truly luxurious mixing experience. High-end construction materials including carbon fibre provide unparalleled durability and strength, plus substantially lower weight than comparable consoles.

The M32 utilises award-winning MIDAS PRO Series microphone preamplifiers and the custom-designed MIDAS PRO motorised faders that are rated for 1 million life cycles—three times more than other leading consoles.

The MIDAS M32 is a future-forward console that completely raises the bar for live mixing.

Legendary MIDAS
Sound Quality

While the MIDAS M32 design, styling, and construction will surely turn a lot of heads, it's the sound that matters most to engineers and performing artists. And that's where M32 shines even brighter – as the latest in a long line of pristine-sounding MIDAS consoles, it descends from a celebrated lineage that literally set the standard in electrical design and sound quality. Ever since MIDAS consoles first found fame 40 years ago with acts like Billy Joel, Yes, The Beach Boys, Pink Floyd and others, the MIDAS legacy has always been about uncompromising quality and the ultimate in sound reproduction.

Backing the analogue input section are audiophile Cirrus Logic* multi-channel 192 kHz capable A/D converters, which boast a 114 dB dynamic range, ensuring impressively low distortion and low noise performance.

Built for Tomorrow

The M32 is a console built for today, and tomorrow - its future-proof 96 kHz capable open architecture design and industry-leading 192 kHz 24 bit ADC and DAC converters provide outstanding state-of-the-art audio performance.

Award-Winning MIDAS Mic Preamplifier

The MIDAS mic preamp is considered by leading live sound and recording engineers to be the very essence of the famous MIDAS sound. More than 40 years of design experience paired with the finest choice of premium-grade components lead to the acclaimed warmth and depth, bring out subtle ambience, maintain spatial positioning, and more effectively capture a precise image. The acclaimed sound of the award-winning MIDAS microphone preamplifier has inspired generations of live sound engineers to their best work, creating sonic landscapes that have captivated audiences worldwide.

## Creating Sonic Landscapes

The MIDAS preamplifier design eliminates typical imbalances of gain-setting stages, thereby improving the common-mode rejection ratio (CMRR) and harmonic distortion to an almost immeasurable level. The constant high-frequency bandwidth topology assures excellent stability, RF rejection and noise performance at all gain levels, contributing to its transparent, open and dynamic sound. But it doesn't end there, over the years many mix engineers have found that this robust and overload-tolerant design takes on a whole new dimension of sound when driven hard, the pristine audiophile reproduction giving way to just the right combination of harmonics, a warm and organic sound heard by millions of concertgoers and recorded for posterity on countless live albums over the years.

Since pristine sound always begins with the microphone preamplifier, the first point where your signal enters the console, M32 features genuine MIDAS microphone preamplifiers which faithfully reproduce every sonic detail so no part of a performance will ever be missed. Transparent and pristine sound, low noise and high common-mode rejection are all hallmarks of this classic design.

In MIDAS' relentless pursuit for the ultimate in audio performance, the microphone preamplifier used in

MIDAS PRO Series is an enhanced version of the classic design found in the XL4 and HERITAGE series consoles, which many consider to be the greatest analogue live consoles ever built. Over the past decade the XL4 and HERITAGE 3000 have been utilised by countless top artists including Bon Jovi, Alanis Morrisette, AC/DC, Coldplay, Kid Rock, Metallica, Alicia Keys, Foo Fighters, Christina Aguilera, Sir Paul McCartney, Pearl Jam and many more.

The M32 draws from this same legacy to bring you an elite professional level of audio quality and performance.
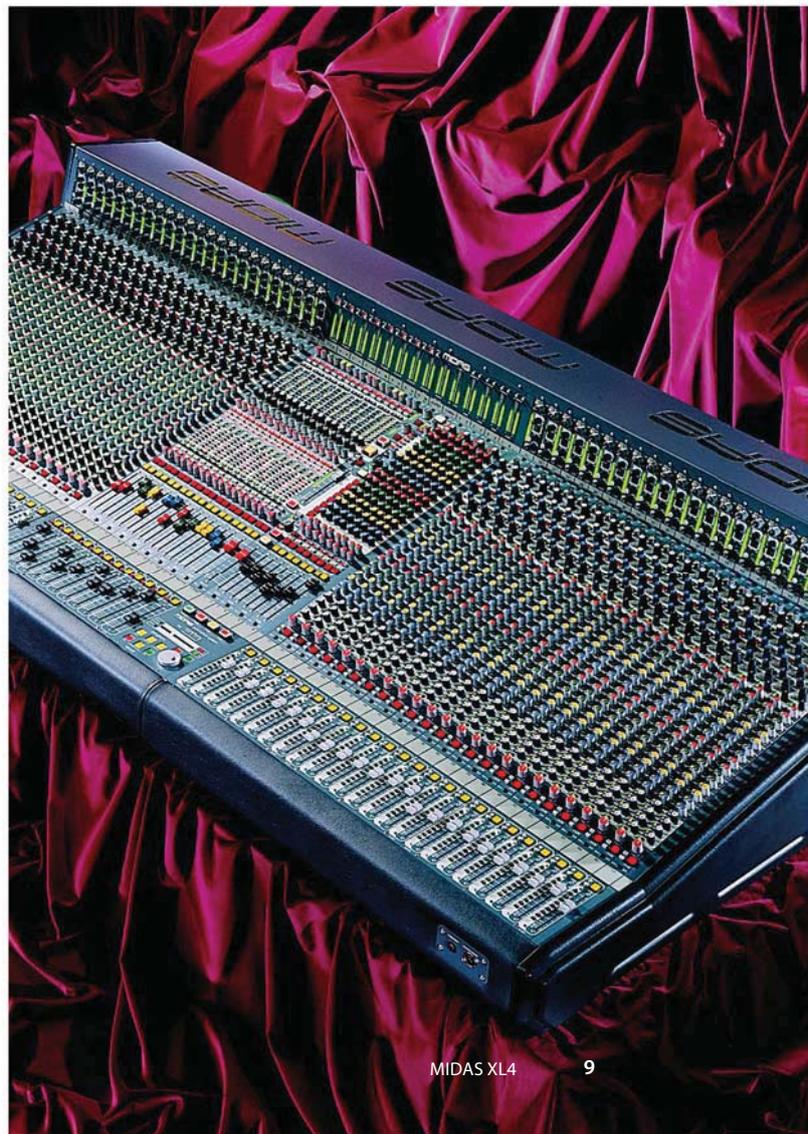
What Makes the M32 Possible is – Everything

Whether you come from an analogue mixing background, or are accustomed to using other digital consoles, your first experience with M32 has been engineered to be intuitive, fluid and straightforward.

The brilliance of the M32 is its simplicity and workflow. Tactile controls allow smooth adjustments to critical elements as the mix progresses while the TFT screen keeps you informed every step of the way. This integration of tactile controls, motorised faders and the array of LCD and TFT displays makes the M32 experience the premiere solution for Live Sound, Broadcast, Studio Recording and Post Production applications.

M32 changes the game by completely rethinking what is possible in a digital mixer. An intuitive workflow coupled with a fully interactive user interface ensures immediate familiarity and instills confidence. Advanced engineering and meticulous design deliver stellar sonic performance

Queen's Award 1986

at an extremely affordable price - changing the game entirely.

What Makes the M32 Possible is – Everything

MIDAS' experience spans over 40 years at the very top end of the live audio industry on countless world tours by the greatest artists and the most prestigious events. 40 years of relentless research, development with 300 of the world's best engineers plus complete control over the manufacturing process. This is what powers the M32.

Above all, M32 is designed to put the power of digital in your hands, without compromise. MIDAS' singular focus on a matchless value proposition means M32 integrates advanced features such as motorised faders, LCD scribble strips, integrated personal monitor mixing and true high-speed digital audio networking as standard features.

Your "Mind-to-Sound" Interface

M32 is your "mind-to-sound" interface - the intersection of creativity and production.

Whether you're accustomed to digital mixers or not, the M32's intuitive user interface offers a fluid mixing experience that instantly feels like home.

From the first moments of use, the workflow unfolds in a way that strips away obstacles, distractions, and hesitation.

THE LIVE! AWARDS 1993
Live Mixing Console
AWARD
Midas for the XL3
LIVE!

The Live Award 1993

COMP
CLIP
-6
-12
-18
-30
-60
GATE

COMP
CLIP
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COMP
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COMP
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GATE

SOLO

SOLO

SOLO

SENDS
ON FADER

14
MixBus

15
MixBus

16
MixBus

1
DCA

MUTE

MUTE

MUTE

10
5
0
5
10
20

GROUP
DCA 1-8

BUS
1-8

BUS
9-16

10
5
0
5
10
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30
40
50
70
∞

MAIN C

Elements of Flow

Channel Strip

The M32 Channel Strip puts the most important channel processing parameters into one section so that no matter which channel you are working on, the controls are always the same.

This highly-efficient layout stems from MIDAS' decades of console design and input from our users. Optimized control illumination ensures a clear indication of levels or status from any viewing angle.

Illuminated rotary encoders and switches give you control of preamp settings, frequency shelving, dual dynamics sections, as well as multi-mode fully parametric EQ, bus sends, main, mono and stereo panning.

7" Main Display

M32's 7" day-viewable colour TFT (Thin Film Transistor) display shows the setting parameters you need when you need them.

Selected for its high-contrast performance and outdoor visibility, TFT is ideal for concert and open air festival venues. Flanked by high-precision, context-sensitive tactile encoders, the screen comes to life and immediately reports in high definition all adjustments applied to a wide range of parameters.

Intelligent design puts control of vital functions such as Effects, Metering, Routing and much more, just one or two button presses away.

Live Sound! Tin Ear Award 1994

Sends On Fader

M32 brings the convenience of digital mixing to your Aux and output bus mixes too, thanks to its integrated Sends on Fader feature. This incredible function allows you to build powerful, dedicated sub-mixes for monitor, secondary zone feeds, and much more—all without affecting the front of house mix or levels.

The M32 allows you to send your choice of signals to any Aux or output bus and then dial in the perfect mix via the channel faders.

The console remembers where you set the faders and instantly recalls them when you select a bus for quick adjustments.
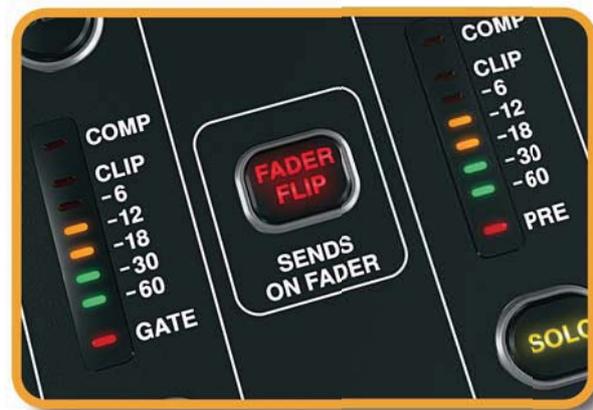
DCA Groups

DCA (Digitally Controlled Amplifier) groups allow control over several signals at once without actually mixing them into a subgroup bus. M32's 8 DCA groups let you control multiple signals via a single fader, such as the entire drum mix, the horn section, or the backup vocalists.

DCA control affects the FOH mix, while allowing the individual buses to remain unchanged. The result is a customisable workflow that provides maximum flexibility, but still allows individual buses and sub groups to serve the purpose they were intended for, such as zone sends and broadcast feeds.

Elements of Flow

View Function

Across the M32 you'll find 11 strategically placed View buttons associated with various functions. These buttons enable immediate access to information about that specific function.

For instance, if you press the View button in the Equaliser section, information for that channel's EQ is instantly shown on the main display, providing in-depth editing of all related parameters.

This direct access to visual fine-tuning gives the engineer a level of control previously available only on consoles costing exponentially more.

Assign Section

While some digital consoles offer a few user-definable controls, M32's Assign section sets a new standard by providing a total of 36 fully customisable controls on three separate layers.

As with channels and buses, individual Scribble Strips are provided for immediate identification. Buttons can be defined to toggle parameters on/off, adjust timing of effects by tapping, or jump to specific screen views.

Rotary encoders with LED collars can be assigned to specific channel parameters, or to additional parameters in the Dynamics section relevant to the current channel selection.
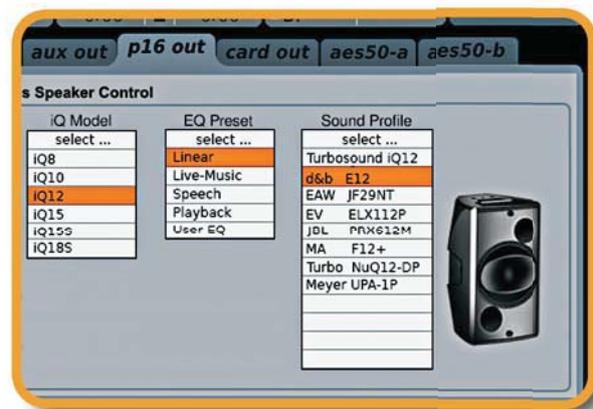
"Acoustic Integration" – the Live Sound Revolution

Legendary 40-year old British company TURBOSOUND, famous for producing some of the world's best speaker systems, have teamed up with MIDAS to seamlessly integrate mixer and speaker systems. We call it "Acoustic Integration".
The M32's ULTRANET bus allows streaming up to 16-channels of pristine digital audio to an array of TURBOSOUND iQ speakers - all on a single CAT5 cable, along with control data to set sound presets remotely.

The iQ Series also features "True Physical Modelling" of some of the most popular speakers which can be easily remote controlled via the M32, allowing

the sound engineer to apply different speaker models in real time from the comfort of the mixing desk. "Acoustic Integration" is the next live sound revolution.

100-Band RTA for all Channel/Bus EQ's

The M32 includes a high-resolution 100-band Real Time Analyser (RTA), with full Bar and Spectrograph views. This high-resolution RTA displays the audio energy distribution in 100 frequency bands over time – capturing a sonogram window of a full 10 seconds.

Switch between the Large RTA view, displaying any available signal in full screen resolution, or the Combined view with the RTA view shown above each of the channel and bus EQ curves. See the results of your filtering choices in the audio spectrum directly. Additionally, the RTA can be displayed on top of the 31 band graphic EQs in the FX rack.

Monitoring and controlling frequencies has never been easier!

Elements of Flow

16 Breathtaking FX "Plug-Ins" Based on True Physical Modeling

We've added 16 new FX "Plug-Ins" to the M32, giving you access to a total of 50+ effects that would otherwise cost tens of thousands of dollars in hardware.

This new generation of high-end FX "Plug-Ins" is based on True Physical Modelling of classic audio hardware. We essentially "rebuilt" classic analog gear in the digital domain and included models of legendary processors such as Urei's 1176*, Teletronix LA-2A* and Fairchild 670* compressors as well as the legendary Pultec* EQP-1a and EQ5 equalizers etc. We also added a cutting-edge 5 band multi-band compressor.

Last but not least, the M32 can now run 4 studio-quality stereo reverbs together with 8 channels of 31 band graphic EQ. This allows you to replace your old outboard gear with a fully recallable onboard solution.

Gain Splitting and Remote Control for FOH and Monitoring

A new Gain Split mode separates channel gain (trim) from the head amp gain, allowing both the FOH and/or the monitor engineer to adjust local trim digitally – and independently of the preamp gain.

Additionally, the new Head Amplifier (HA) Gain Remote option allows console gains to be remotely controlled by an external console, such as when using the M32 as a stage box.
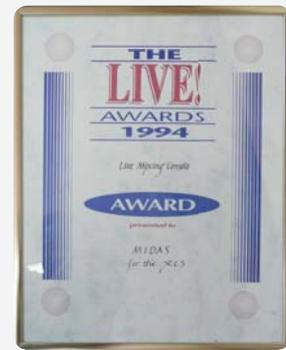
The Live! Award 1994

More Routing and Processing Flexibility

The M32's highly flexible routing allows output signals and XLR outputs are to be treated separately, and signals from AES50 sources or expansion cards to be routed directly to the M32's analog outputs.

You can use the outputs from an M32 for directly routing back PA or monitoring signals from a main or FOH console. Output tap points can be set as pre- or post-mute for greater usability with your P16 personal monitoring mixers. This is very useful in situations where you don't want mute groups to interrupt your signal flow.
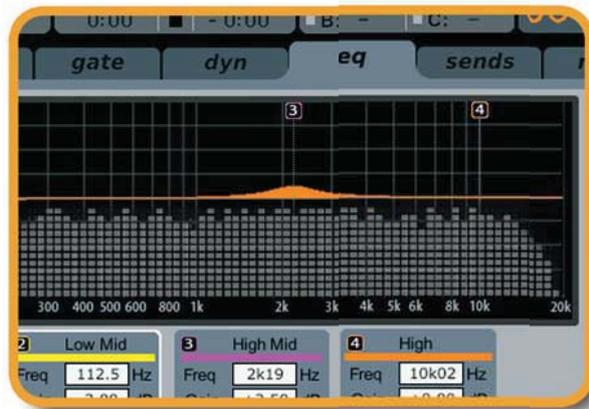
Mighty New Tools for Scene and Show Management

Introducing the Cue List, an innovative way to automate the loading of scenes and new "Snippets" at different points during a show. Each of the 500 Cue entries can load any of the 100 Scenes or Snippets separately or at the same time. This gives you an amazing total of 500 Cues x 100 Scenes x 100 Snippets!

For example, store your favourite EQ settings for drums on channels 1-8 as a Snippet, recallable in an instant as its own preset, completely independent of the console's overall scene. It's like taking a snapshot of a parameter on an input, return, FX slot, bus, Matrix, Main or DCA group – and saving it for quick access whenever you need it.

The MIDAS PRO Fader-
Rated for 1 Million Life Cycles

In our pursuit to lead the industry in every possible aspect, we decided to design the world's most reliable motor fader. We dove deep into materials science, employing semi-precious metals that offered the durability we desired. We took painstaking care to design a motorised fader that would provide continuous performance night after night, year after year.

After spending a great deal of time working with metal vendors, we developed precision components that offer high linearity, robustness, and smooth feel during operation. We needed ultra-straight high-grade steel guide rods with smooth polished surfaces—and we got them. We worked closely with our manufacturing partners to maintain the tolerance of our parts, always choosing the most
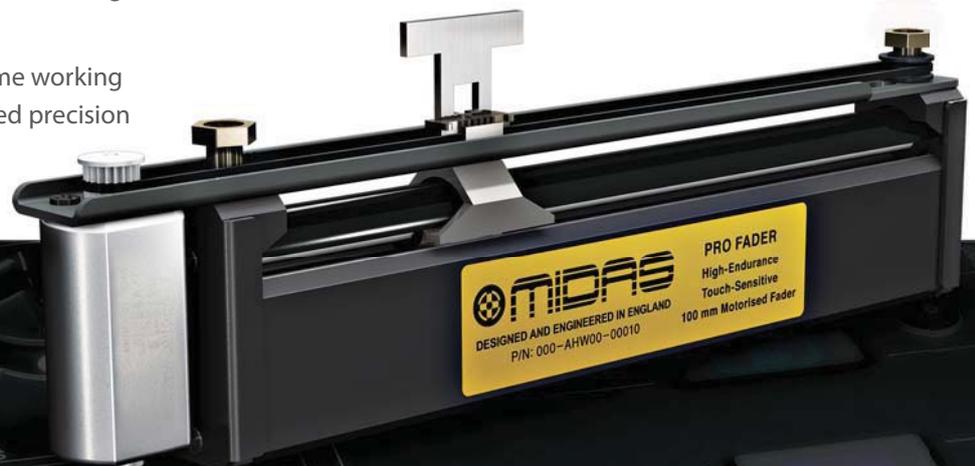
LCD Scribble Strips

Live Sound! Tin Ear Award 1995

suitable materials and controlling the processes to ensure consistent moulding quality and eliminating the warping and deformation caused by shrinking as the parts cool.

True, none of this was easy—we spent many long hours developing the MIDAS PRO Fader design. However the results speak for themselves.

MIDAS PRO Faders are rated for up to 1,000,000 cycles—three times that of other leading manufacturers.

Total Visibility - Total Control

A total of 29 programmable LCD Scribble Strips offer channel/bus identification that mirrors what is being controlled.

Use them to enter input/output tags, plus add icons you recognize at-a-glance. Then assign colours to create visual groups for immediate, on-the-fly recognition of similar inputs.

Simple, elegant and effective – plus you'll never need masking tape again.

Virtual Effects Racks

M32 includes an extensive array of onboard effects, rendering outboard processing racks a thing of the past. The Virtual FX rack features 8 true-stereo, studio-grade effects engines each assignable to any input, group or output mix bus. Choose from high-end FX modules including a range of reverbs, delays, EQs, dynamics and much more.

Each FX algorithm has been completely re-imagined for stunning performance – and offering immense value, the combined cost of the original hardware reference models exceeding the price of the M32 many times.

Custom-designed, and physically modelled after some of the most iconic and sought-after processors, all effects run inside the low-latency environment of the M32 mix engine, ensuring flawless performance, flexible routing and the end of cable faults forever!

The immaculate tube signal path in Teletronix' LA-2A Leveling Amplifier has left its exceptional clarity and rich and warm compression on countless albums of the past decades.

Our **LA COMPRESSOR** models this ultra-smooth optical attenuator, producing natural and effortless musical compression. (Inspired by the Teletronix LA-2A*)

When Urei released the 1176LN Limiting Amplifier in the late 60's, it broke new ground. Field Effect Transistors had just been invented and the 1176 was one of the first audio processors to benefit from this new technology.

Our digital reincarnated **ULTIMO COMPRESSOR** is based on the early Rev. E model and authentically captures the smooth character of the original class-A output stage and the legendary fast attack of the FET transistors. (Inspired by the Urei 1176LN*)

The Fairchild 670 tube compressor achieves record bids in high-end vintage gear auctions, due to its highly musical colouration, which makes it a classic in the history of compressors. Two small trimming potentiometers set the control side chain action, a six-step switch determines the timing, and the two large Input and Threshold knobs adjust the levels.

Our **FAIR COMPRESSOR** model is true to the original signal path, and conveniently provides models for dual, stereo-linked or M/S operation. (Inspired by the Fairchild 670*)

The **COMBINATOR** is an amazing 5 band compressor that emulates famous broadcasting and mastering compressors.

A highly complex processor, the COMBINATOR utilises automatic parameter control that produces stunning and "inaudible" results. Makeup-gain for each frequency band is automatically adjusted by the Spectral Balance Control (SBC) function to maintain a balanced audio spectrum.

The **XTEC EQ1** is based on one of the undisputedly best passive studio equalisers ever manufactured. Virtually indescribable, recording engineers claim the Pultec EQP-1a to be the "secret sauce" of sound enhancement.

We analysed this classic at component level and created an exact physical model that reproduces the multi-faceted sound in painstaking detail. Even the transformers and tube output stage have been faithfully modelled! (Inspired by the Pultec EQP-1a*)

Pultec wrote the book on passive equalisation. By digitally "rebuilding" every aspect of the original Pultec classic, we captured the very essence in our **XTEC EQ5** parametric equaliser. Our digital re-incarnation is based on the original model and authentically emulates the smooth character of its rather unique components. (Inspired by the Pultec MEQ5*)

Virtual Effects Racks

The new **SUB OCTAVER** provides two channels of earth-shattering sub-harmonic generation, one or even two octaves below the input signal. While originally designed for bass players, the effect can be adjusted for High, Mid and Low frequency tracking to apply to a wide range of applications. This is your secret weapon for beatboxing...

The **EDISON EX1** is the re-incarnation of one of our own analogue classics. This remarkably-effective tool allows manipulation of the stereo field. Selectable M/S input/output modes allow the processing or creation of M/S recorded sound sources.

The **SOUND MAXIMISER** restores natural brilliance and clarity to any audio signal by adjusting the phase and amplitude integrity to reveal more of the natural texture of the sound, which is often hidden when using some effects and equalisers. (Inspired by the Sonic Maximizer 482i*)

The **DIMENSIONAL CHORUS** is the perfect emulation of what has been referred to as "the best analog chorus unit ever created". Four simple Mode preset buttons activate amazing effects, best described as "space" and "dimension". Absolutely faithful to the original, multiple preset buttons can be pressed simultaneously. (Inspired by the Roland Dimension D Chorus*)

Live Sound! Tin Ear Award 1995

MODULATION DELAY combines three of the most used time modulation effects into one easy-to-operate unit. Enjoy true-stereo delay with a lush and spacious chorus, topped off with three reverb models to choose from.
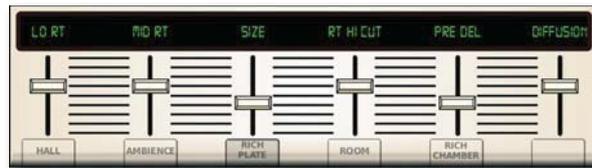
The Lexicon 480L* has been recognised as the gold standard of digital reverb. We have included three of the finest reverb models - Rich Plate, Room and Rich Chamber. The M32's models precisely capture all nuances based on our "True Physical Modelling" and our algorithms even incorporate the unit's AD/DA gain stepping converters — nailing the entire analogue and digital circuit paths right down to the last detail. (Inspired by the Lexicon 480L*)

EXCITERS increase presence and intelligibility in live sound applications and are indispensable for adding clarity, air and harmonic overtones in the recording studio. **ENHANCERS** let you emphasize the Bass, Mid-range and High frequency output at selectable frequencies.

You can generate maximum punch, clarity and detail, without turning up the overall volume. (Inspired by the Aphex Aural Exciter* and SPL Vitalizer*)

Our **TruEQ STEREO GEQ** delivers musical and responsive signal processing—perfect for general room equalisation, indispensable for monitoring. M32 provides up to 16 mono graphic EQs, in addition to the multi-band parametric EQs in all channels and buses, to cope with the most demanding stage monitoring situations.

Plus, the M32's motorised faders can be switched to control the filter bands of the graphic EQ, with the channel LCDs showing the corresponding filter frequencies—and you can even put this on a user defined hot-key for immediate access. (Modelled after the KLARK TEKNIK DN360)

Virtual Effects Racks

VINTAGE ROOM stands head and shoulders over other reverberation techniques in the way it models sound propagation in air and room resonances. Invented in the early '80s, the original role model delivered authentic room character from an algorithmic reverb long before convolution-based processing was available.

It is an ideal reverb for mixes or sub-groups, as it adds space to complex signals—highly valued in classical music and broadcasting environments. (Inspired by the Quantec QRS*)

PLATE REVERB emulates the characteristics of a plate reverb chamber with control over the damping pad, modulation depth and speed and crossover. PLATE REVERB will give your mix the sound heard on countless hit records since the late 1950's. (Inspired by the Lexicon PCM70*)

The **3-TAP DELAY** in the M32 records the input signal and then echoes it back after a user-definable period of time and number of repeats. What makes the stereo and triple delay useful and outstanding is the linked tap-timing and musical choice of echo patterns.

Use the 3-TAP DELAY to fatten up vocals and instruments, or to add an enhanced spatial dimension to any performance.

The **HALL REVERB** effect provides a broad spectrum of reverberation options, from small room to large, or even to cavernous proportions. At low levels, Hall Reverb can be used to create a warm, more natural sound. (Inspired by the Lexicon 480L*)

Live! Gold Award 1996

The go-to **FLANGER & DELAY** dynamic duo blends the "whoosh" of soaring jet planes with classic Delay, and can be adjusted from mild to wild. This combination effect only takes up one FX slot. (Inspired by the Lexicon PCM70*)

WAVE DESIGNER is a powerful tool for adjusting signal transients and dynamics such as attack and sustain. Use it to make a snare drum really "crack" in the mix or level out volume inconsistencies of slap bass tracks. (Inspired by the SPL Transient Designer*)
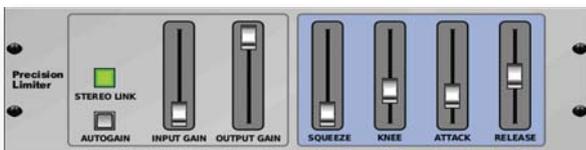
The **STEREO PRECISION LIMITER** is perfect for setting a precise volume limits, ensuring distortion-free and optimal signal integrity. Use the Stereo Precision Limiter to boost quiet signals or reduce the level of "hot" signals to prevent clipping. (Inspired by the Sony Oxford Dynamics*)

The **DE-ESSER** is a "must-have" tool for reducing the amount of sibilance in vocal mics while adeptly preserving the natural voice timbre of a performance. Use it to enhance the smoothness of the upper mid to high frequencies in vocals as well as drum overheads and strings, etc. (Inspired by the SPL 1239*)

Based on the legendary EMT250, the **VINTAGE REVERB** delivers a shimmering, bright reverb that won't drown out or overpower your live/recorded tracks. Use the VINTAGE REVERB to sweeten vocals and snare drums without sacrificing clarity. (Inspired by the EMT250 Plate Reverb*)

Taking up only one FX slot, the **CHORUS & CHAMBER** effect combines the shimmer and doubling characteristics of a studio-grade chorus unit with the sweet sound of a traditional chamber reverb. (Inspired by the Lexicon PCM70*)

You Are Connected

Each M32 comes loaded with all of the connectivity, I/O and functionality you need, right out of the box – but it doesn't end there. Onboard USB 2.0 connectivity delivers a full 32 x 32 channels of audio and MIDI to your DAW. Integrated multi-channel digital audio interfaces connect to remote stage boxes and/or the P16 Personal Monitor System. Native Ethernet control enables remote operation by computer, iPad or iPhone over a wired or wireless network, across the room – or across the planet!

Dual AES50 network ports featuring KLARK TEKNIK SuperMAC technology support up to 96 inputs and 96 outputs over shielded (STP) CAT5 cable, allowing remote stage boxes and sharing signals among several connected M32s and other MIDAS, KLARK TEKNIK and AES50-equipped products.

On-board ULTRANET provides a 16-channel digital mix direct to P16 Personal Monitor Mixers, without added hardware, cost or latency.

Ethernet, USB and MIDI are all standard features on M32.

An additional expansion slot is also included, so that the M32 can connect to current and future digital audio networks and link protocols via a wide range of expansion cards including USB, FireWire*, ADAT*, MADI and Audinate Dante*.

Plasa Award for Product Excellence 1996

POWERPLAY P16

Personal Monitoring System

Easy as a handshake. Plug the P16-M personal monitor mixer into M32's ULTRANET port with a shielded (STP) CAT5 cable, and let the performer dial in their ideal 16-channel personal monitor mix. You can daisy-chain additional P16-M units, or use the P16-D ULTRANET distributor to set up a plug and play monitor system that accommodates up to 48 individual P16-M units.

DL16
Digital Snake

The MIDAS DL16 digital stage box closes the gap between stage and FOH (Front of House) by placing 16 fully-programmable, remotely controllable high-end MIDAS microphone preamplifiers and 8 analogue, balanced XLR returns at the stage end. Connecting over a single shielded (STP) CAT5 cable, up to three DL16 or MIDAS DL150 stage boxes can be daisy-chained to deliver 48 channels in and 24 out to the stage. Dual AES50 ports on the M32 allow up to 96 input channels to be connected and routed in the same system.

- AES50 network ports featuring KLARK TEKNIK SuperMAC technology for ultra-low latency (in-ear compatible)

- Up to 100 m networking capability via CAT5 cable (not included)

- Dual AES50 ports, each for cascading up to three DL16 units – no merger or router required

- Precise LED metering plus 7-segment displays for signal control on stage

- Phones output assignable to any of the inputs/outputs for on-stage monitoring

- Connectivity for P16-M Personal Monitoring System for in-ear applications (not included)

- Dual ADAT outputs for use in splitter mode and stand-alone digital multi-core applications

- MIDI in/out for bidirectional communication between FOH console and on-stage MIDI devices

What are AES50 and SuperMAC?

AES50 simultaneously provides high channel counts, extremely low and deterministic latencies, accurate phase-aligned networked clock distribution, error detection, network redundancy, with simple deployment and ease of use to meet the needs of the live performance industry.

This unique combination also benefits both live and studio recording applications, as well as post-production, broadcasting and audio routing infrastructure. SuperMAC is a proprietary implementation of AES50 owned by KLARK TEKNIK. Originally developed by Sony Pro-Audio Labs in Oxford, UK, it forms the basis of the Audio Engineering Society's AES50 open standard for digital audio networking – High Resolution Multi-channel Audio Interconnection (HRMAI), as published by the Audio Engineering Society, Inc.

- 48 bidirectional audio channels @ 48 kHz over Neutrik etherCON-terminated shielded (STP) CAT5 cable (max. length 100 meters / 328 feet)

- Single cable duplex interconnection for audio and sample clocks

- Ethernet physical layer audio data transmission

- High channel count and ultra-low deterministic latency (2x3 samples = 1/8 ms per node)

- Accurate phase-aligned clock distribution

- Comprehensive error detection and management

- Provision for redundant networking

- Minimal configuration – total ease of deployment and use

- Ethernet TCP/IP protocol-compatible auxiliary data channel

Real-Time Recording

X-USB

A versatile powerhouse of a live console, the M32 also provides robust studio functionality. Record and play back up to 32 tracks which run on Windows XP*, Windows Vista*, Windows 7*, and Windows 8* operating systems or Mac* computers via integrated USB 2.0 connectivity. M32 supports a variety of sample rates, allowing you to record up to 32 tracks of live audio directly to your computer for mixing down later. Take advantage of M32's built-in FX engines to augment your DAW's plug-in collection, or to free up valuable computer resources.

M32's recall capability makes it easy for both project and professional studio engineers to stay organised by storing projects as scenes, either internally or externally on a USB stick.

DAW Ready—MIDI Plus Mackie Control* & HUI* Protocols

Thanks to its onboard MIDI ports, the M32 console can function as a high-level, large-format control surface, similar to Mackie Control and HUI, and integrates seamlessly with most popular DAW platforms. M32's motorised faders can be used to send position information to the onscreen DAW faders, while each bus' mute and solo buttons control their onscreen counterparts. This powerful control surface relationship, which functions bidirectionally between the M32 and your DAW, allows you to work more quickly and attend to the finer nuances of the overall mix. After all, mixing with your hands puts you in "touch" with your project, providing a level of finesse that can mean the difference between a good recording session— and a work of art! Or, would you rather use a mouse?

Optional Expansion Cards

The M32's expansion slot provides flexible and expandable connectivity for many different applications. A wide array of X-Expansion Cards can easily be used in place of the pre-installed X-USB card to release the power of M32 into existing MADI*, Dante* and ADAT networks. Fully compatible with these widely available audio protocols, the M32 delivers a seamless integration in digital live sound, recording and broadcast environments.

Expansion & Networking

X-UF

Hi-Speed FireWire/USB 2.0 Audio Interface for Professional Recordings

The X-UF Expansion Card ensures a stable and fast solution for professional live and studio recordings. It provides 400 Mbit/second throughput to transfer your high-track count session to popular Software DAWs on Mac and PC via FireWire or USB 2.0. Additionally, the X-UF turns your M32 into a sophisticated control surface, and includes remote HUI* and Mackie Control* emulation.

X-ADAT

High-Performance 32-Channel ADAT Expansion Card for M32

The X-ADAT Expansion Card allows you to digitally integrate your M32 with any equipment featuring ADAT I/O. This includes stand-alone recorders, digital audio workstations, and other digital mixers and signal processing gear. The X-ADAT card provides 32-channels of ADAT inputs and outputs on its 8 fibre optic Toslink* connectors. The card features 24-bit signal transmission and operates at both 44.1 and 48 kHz sample rates, maintaining your signal integrity. The X-ADAT card also has a BNC word-clock in/out capability allowing it to sync with an external clock, or provide the clock signal for other devices. External clock synchronization is possible through the BNC connection, as well as any of the 4 Toslink ports.

X-MADI

High-Performance 32-Channel MADI Expansion Card for M32

The X-MADI Expansion Card brings even more I/O options to the M32 by instantly enabling it for MADI networking. The MADI or AES10 protocol is quickly becoming an industry standard in many broadcast applications. X-MADI provides optical duplex SC-plugs (IEC874-19) to connect with fibre optic MADI devices, with multimode fibre optic cable lengths of up to 2 km supported. Dual BNC terminals are also provided for transmission via standard 75-Ohm coaxial cable of up to 100 m length. The BNC and fibre optic connectivity can also be used simultaneously, creating a reliable redundancy network with fibre optic installations. X-MADI card is the perfect solution for integrating the M32 into current installations using the MADI protocol.

X-DANTE

High-Performance 32-Channel Audinate Dante Expansion Card for M32

By installing the X-DANTE card in place of the X-USB card, your M32 will interface with Dante networks using virtually any 100Mbit/s or Gigabit Network infrastructure with DSCP-based QoS – providing dependable multi-channel audio that coexist with other IP-based data traffic on the same network. The X-DANTE card utilizes 24-bit signal transmission with sample-accurate synchronisation and low latency, ensuring the highest audio integrity. And a secondary input allows you to set up a seamless, redundant network. Full remote control of the M32 is possible using the integrated Ethernet switch. When the X-DANTE card is connected to a computer, Audinate's Dante Controller application gives you full control over configuration and signal routing among your Dante-enabled devices.

Remote Control

M32 EDITOR (PC and Mac)

Just as in life, you can never have too many connections and this applies to controlling the console itself. Simply connect the M32 to a laptop or desktop PC and Mac via LAN, wireless network or Ethernet cable. The M32 EDITOR gives you command of the M32 remotely via computer. Move a fader on the PC, it moves on the M32; press a button on the computer, the button toggles on the M32. You'll find this feature extremely helpful for stage of side monitor control, individual control of multiple installed M32s, as well as multiple remote control stations of the same M32. The M32 EDITOR also lets you create scenes on your PC beforehand to minimise the time required for sound checks.

With the M32 EDITOR software for PC and Mac, your computer becomes your virtual M32.

M32 MIX (iPad)

Front of House is wherever you and your iPad are—thanks to the new M32 MIX App for iPad. Just plug in a wireless router via Ethernet cable to the M32, and then wirelessly connect up to 10 iPad devices, which is especially handy for custom monitor mixes.

The M32 MIX App lets you control all 32 mic inputs, 8 AUX inputs and 16 buses—plus the FX stereo returns and the Matrix, Main, and DCA levels. Select a fader bank on the iPad, slide the virtual faders and M32's motorised faders instantly mirror your action. Plus, with the Sends on Faders functionality, your iPad now controls 16 independent monitor mixes. The M32 MIX App gives you the flexibility and mobility to make running sound a breeze!

Download the free M32 MIX App from the Apple App Store.

Live Sound! Tin Ear Award 1996

M32 CUE (iPhone and iPod touch)

M32 CUE is the perfect tool for setting up your personal monitoring mix with the MIDAS M32 Digital Mixing Console. Compatible with iPhone models and iPod touch devices, each artist can run their own M32 CUE App to adjust and tweak their personal wedge's mix. M32 CUE includes an assignable MCA (Mix Control Association) feature that makes monitor mixing simple enough to be adjusted during performance. Assign any input or combination of inputs to one of the 4 MCA controls inside M32 CUE and instantly get "more me", "less band", "more click track"… with a single sweep of your finger.

Download the free M32 CUE App from the Apple App Store.

M32 CUE (Android)

M32 CUE is also available for Android devices, allowing you to set up your personal monitoring mix with the MIDAS M32 Digital Mixing Console. Compatible with Android (2.2 or higher) mobile devices, each artist can run their own M32 CUE Android app to adjust and tweak their personal IEM or wedge monitor mix with an interface similar to the iPhone app. The app includes an assignable MCA (Mix Control Association) feature for monitor mixing simple enough to be adjusted during performance. Assign any input or combination of inputs to one of the 4 MCA controls inside M32 CUE Android and instantly get "more me," "less band," "more click track…" with a single sweep of your finger.

Specifications

Processing

Input Processing Channels	32 Input Channels, 8 Aux Channels, 8 FX Return Channels
Output Processing Channels	16 aux buses, 6 matrices, main LRC
Internal Effects Engines (True Stereo / Mono)	8 / 16
Internal Show Automation (Structured Cues / Snippets)	500 / 100
Internal Total Recall Scenes (incl. Preamplifiers and Faders)	100
Signal Processing	40-Bit Floating Point
A/D Conversion Dynamic Range	24-Bit, 114 dB (8-channel, 192 kHz ready)
D/A Conversion (stereo, 192 kHz ready)	24-Bit, 120 dB Dynamic Range

Connectors

MIDAS PRO Series Microphone Preamplifier (XLR)	32
Talkback Microphone Input (XLR)	1
RCA Inputs/Outputs	2/2
XLR outputs	8
Monitoring Outputs (XLR / ¼" TRS Balanced)	2/2
Aux Inputs/Outputs (¼" TRS Balanced)	6/6
Phones Output (¼" TRS)	2 (stereo)
Digital AES/EBU Output, XLR	1
AES50 Ports (KLARK TEKNIK SuperMAC)	2
Expansion Card Interface	32 Channel Audio Input / Output
ULTRANET P-16 Connector (No Power Supplied)	1
MIDI Inputs / Outputs	1/1
USB Type A (Audio and Data Import / Export)	1

Mic Input Characteristics (Mic input to analogue output)

Design	MIDAS PRO Series
THD+N (0 dB gain, 0 dBu output)	< 0.01% unweighted
THD+N (+40 dB gain, 0 dBu to +20 dBu output)	< 0.03% unweighted
Input Impedance (Unbalanced / Balanced)	10 kΩ / 10 kΩ
Non-Clip Maximum Input Level	+23 dBu
Phantom Power (Switchable per Input)	+48 V
Equivalent Input Noise @ +45dB gain (150 Ω source)	-125 dBu 22Hz-22kHz unweighted
CMRR @ Unity Gain (Typical)	> 60 dB

Input/Output Characteristics

Frequency Response @ 48 kHz Sample Rate, 0 dB to -1 dB	10 Hz – 22 kHz
Dynamic Range, Analogue In to Analogue Out (Typical)	106 dB
A/D Dynamic Range, Preamplifier and Converter (Typical)	109 dB
D/A Dynamic Range, Converter and Output (Typical)	109 dB
Crosstalk Rejection @ 1 kHz, Adjacent Channels	100 dB
Output level, XLR Connectors (Nominal / Maximum)	+4 dBu / +21 dBu
Output Impedance, XLR Connectors (Unbalanced / Balanced)	50 Ω / 50 Ω
Input impedance, TRS Connectors (Unbalanced / Balanced)	20 kΩ / 40 kΩ
Non-Clip Maximum Input Level, TRS Connectors	+21 dBu
Output Level, TRS (Nominal / Maximum)	+4 dBu / +21 dBu
Output Impedance, TRS (Unbalanced / Balanced)	50 Ω / 50 Ω
Phones Output Impedance / Maximum output Level	40 Ω / +21 dBu (Stereo)
Residual Noise Level, Out 1-16 XLR Connectors, Unity gain	-85 dBu 22Hz-22kHz unweighted
Residual Noise Level, Out 1-16 XLR Connectors, Muted	-88 dBu 22Hz-22kHz unweighted
Residual Noise Level, TRS and Monitor out XLR Connectors	-83 dBu 22Hz-22kHz unweighted

Display

Main Screen	7" TFT LCD, 800 x 480 Resolution, 262k Colours
Channel LCD Screen	128 x 64 LCD with RGB Colour Backlight
Main Meter	24 Segment (-57 dB to Clip)

Power

Switch-Mode Power Supply	Auto-Ranging 100-240 VAC (50/60 Hz)
Power Consumption	120 W

Physical

Standard Operating Temperature Range	5°C – 40°C (41°F – 104°F)
Dimensions	890.9 x 607.0 x 256.0 mm (35.1 x 23.9 x 10.1")
Weight	24.5 kg (53.9 lbs)

Dimensions

890.9 mm (35.1 in)

607.0 mm (23.9 in)

TOP VIEW

100.0 mm (3.9 in)

85.0 mm (3.4 in)

256.0 mm (10.1 in)

15.0 mm (0.6 in)

SIDE VIEW

256.0 mm (10.1 in)
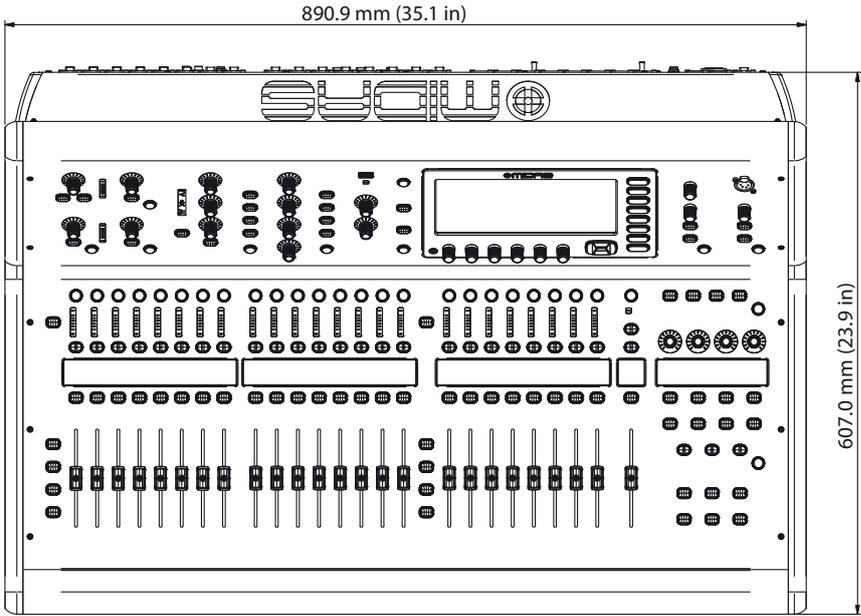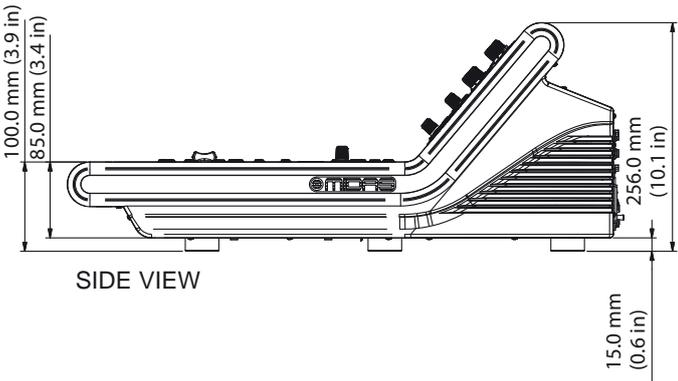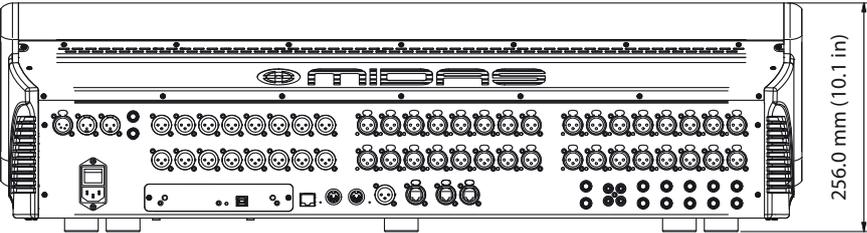
BACK VIEW

MIDAS Care

For service, support or additional information, please refer to midasconsoles.com or contact the MUSIC Group office nearest you.

⊗ ΜΙDAS