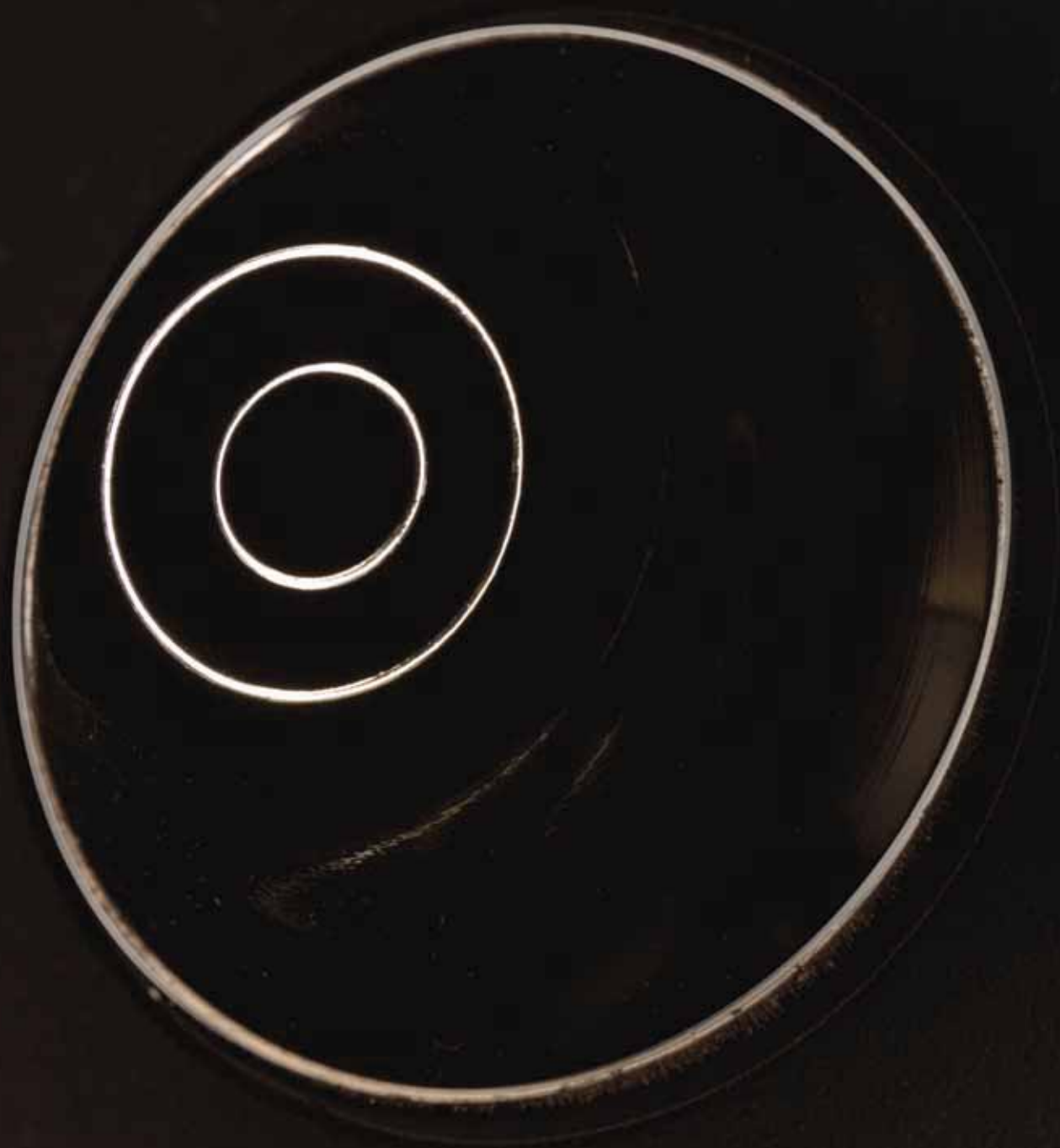


**TANNOY®**

**professional  
range  
catalogue**

**2010/11**



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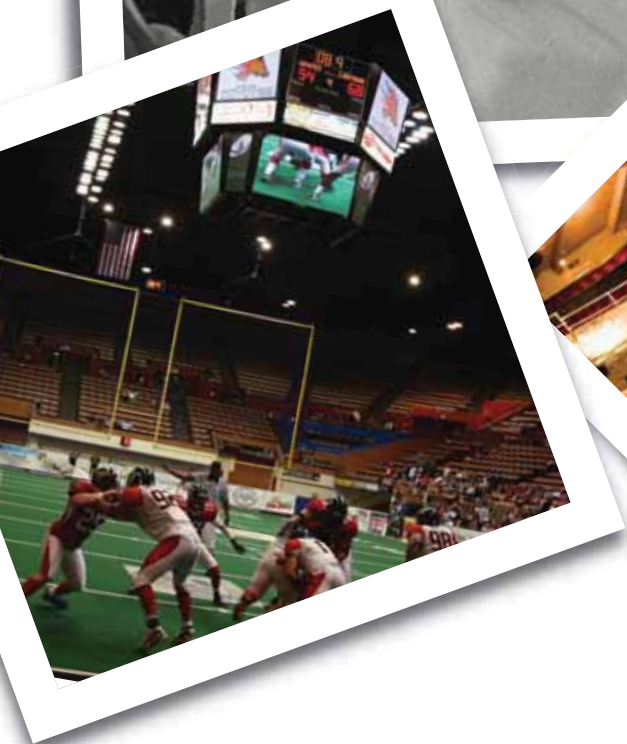
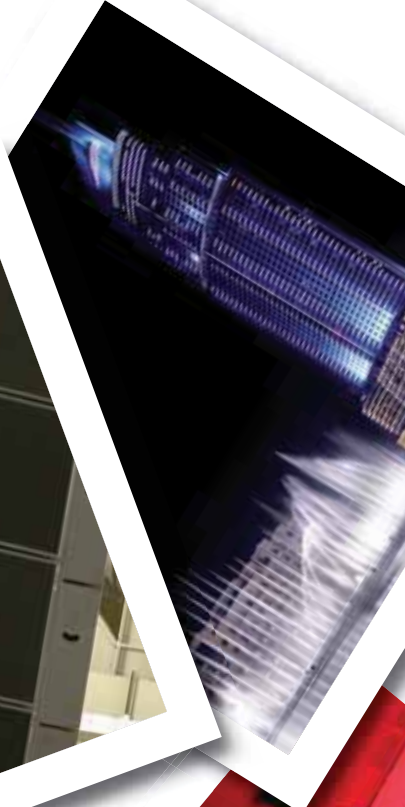
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WARRANTY

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TANNOY STANDS ALONE FOR ITS SUCCESS IN DEVELOPING EARLY PUBLIC ADDRESS SYSTEMS AND THEN CONTINUING ITS REPUTATION FOR PIONEERING AUDIO SOLUTIONS. TODAY, TANNOY IS THE BRAND NAME THAT CAN BE FOUND ON MANY OF THE MOST PRESTIGIOUS SOUND INSTALLATIONS THROUGHOUT THE WORLD

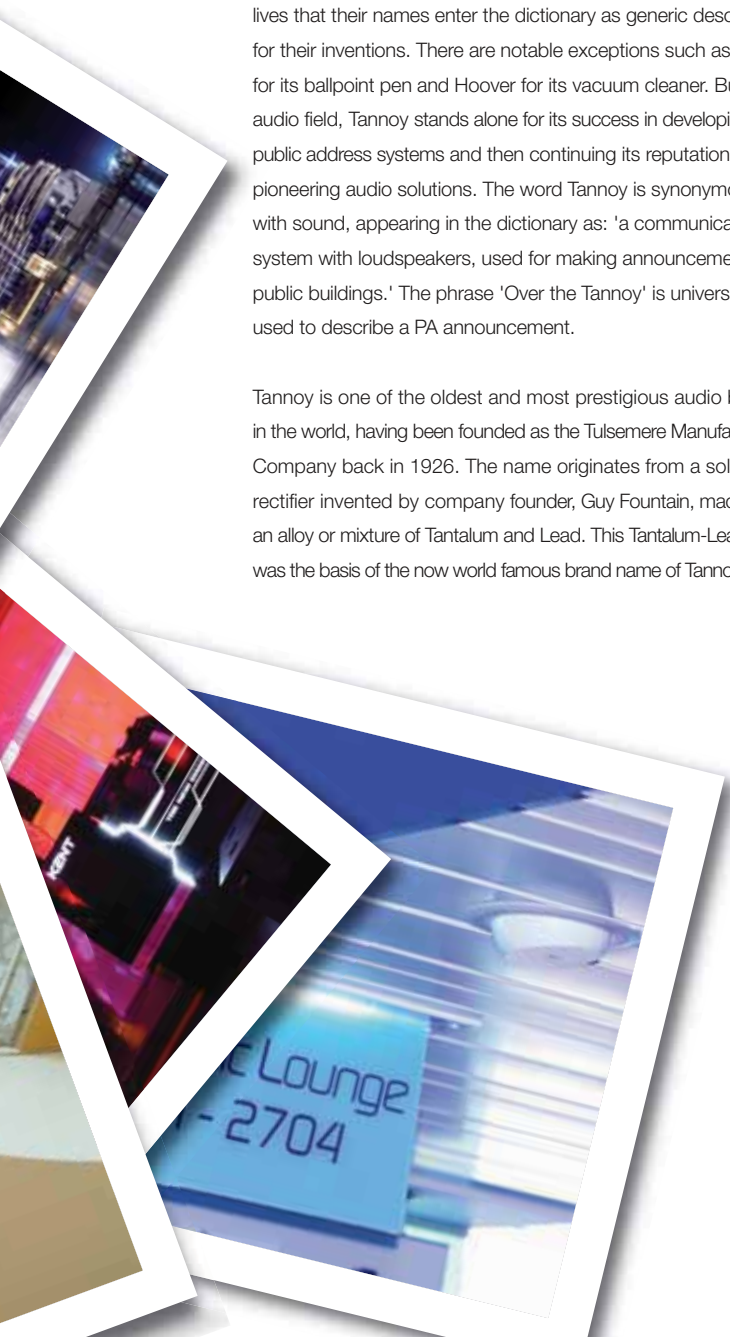
Few companies' products have such a profound impact on our lives that their names enter the dictionary as generic descriptions for their inventions. There are notable exceptions such as Biro, for its ballpoint pen and Hoover for its vacuum cleaner. But in the audio field, Tannoy stands alone for its success in developing early public address systems and then continuing its reputation for pioneering audio solutions. The word Tannoy is synonymous with sound, appearing in the dictionary as: 'a communications system with loudspeakers, used for making announcements in public buildings.' The phrase 'Over the Tannoy' is universally used to describe a PA announcement.

Tannoy is one of the oldest and most prestigious audio brands in the world, having been founded as the Tulsemere Manufacturing Company back in 1926. The name originates from a solid-state rectifier invented by company founder, Guy Fountain, made from an alloy or mixture of Tantalum and Lead. This Tantalum-Lead Alloy was the basis of the now world famous brand name of Tannoy.

Today, Tannoy is the brand name that can be found on many of the most prestigious sound installations throughout the world. Examples include the Hong Kong Convention Centre, the Sydney Opera House, the London Palladium and the Hard Rock Hotel in Las Vegas, and most recently, the Burj Khalifa and Atlantis Hotel Resort in Dubai and Yas Marina Hotel on the Abu Dhabi F1 circuit to name but just a few. The company's Scottish factory HQ is located in Coatbridge, near Glasgow where they've been based for the past 35 years.

Product development has been even more energetic and exciting since Tannoy became part of the TC Group of companies in 2002. TC Group now comprises of several individual audio technology businesses, which includes TC Electronic, a leader in the field of digital sound processors for the MI market, as well as Swedish amplification specialists Lab.gruppen. The combined expertise of Tannoy, Lab.gruppen and TC Electronic is allowing the companies to share research and development and award-winning products like Tannoy's new QFlex range bear testament to this exciting synergy.

Presently, Tannoy remains active in three key audio sectors: Professional/Commercial Audio (the exclusive focus of this catalogue), Residential Hi-Fi and Studio Monitors. In each of these market sectors, Tannoy continues to incorporate highly developed derivatives of the Dual Concentric™ driver into its products maintaining the sound principles behind the original design concept in that it combines transparent, fluid performance with true point source symmetrical dispersion properties. The recent introduction of the highly acclaimed VQ Series sound reinforcement system is a perfect example of this cutting edge evolution of a consistently developed principle.



## DUAL CONCENTRIC™ DRIVER TECHNOLOGY\_\_

Unlike ordinary drive units, the Dual Concentric™ is effectively two drivers properly merged into one. The high-frequency unit is positioned on the back of the low frequency driver so that they are effectively on the same axis. With this system the sound energy is propagated from the same point and delivered through the centre of the low frequency cone – a true point source. The Dual delivers a spherical wave front that ensures even dispersion in the horizontal and vertical planes, providing exceptional off-axis performance.

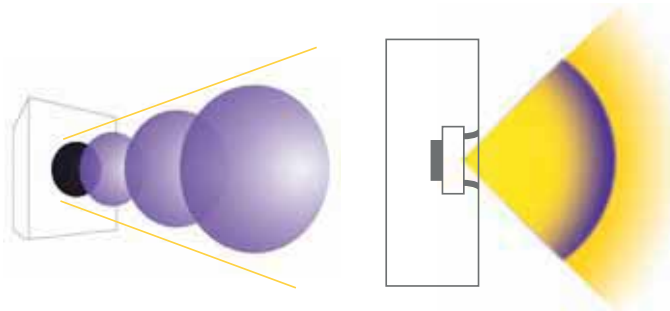
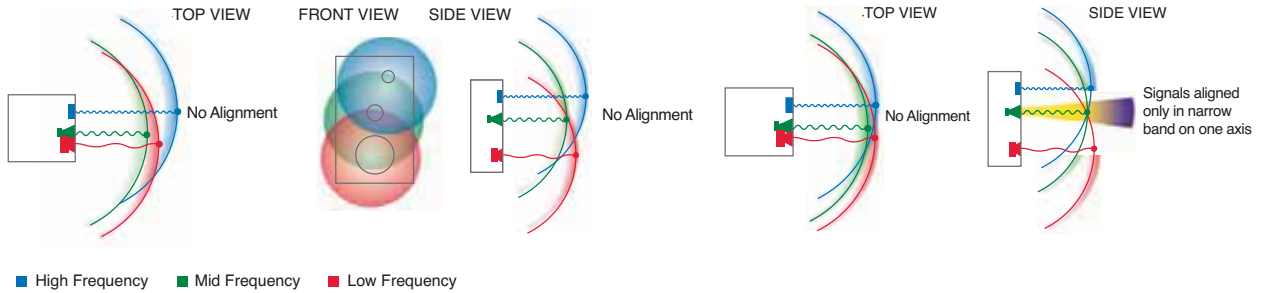
Discrete loudspeakers have an inherent design flaw in that each drive unit is an acoustic source of its own. While the components are physically aligned on the vertical axis they cannot remain so except for at one listening point. Even those discrete systems with rotating horns suffer from a significant 'suck-out' in the crossover region and no amount of DSP processing can correct this phenomenon. The constant directivity characteristic of the Tannoy Dual Concentric™ overcomes such time alignment problems.



# DUAL CONCENTRIC™ EXPLAINED\_\_

Discrete driver speaker systems cannot reproduce signals accurately because their sources are displaced in space.

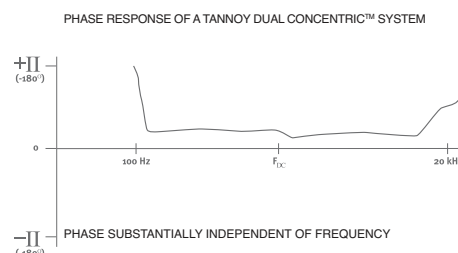
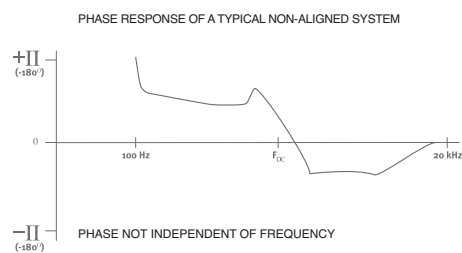
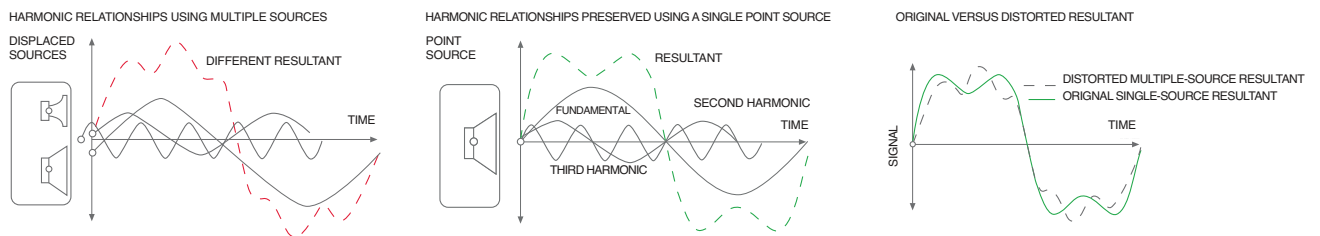
Even when delays are applied to compensate for driver alignment, signals can only be aligned along a narrow listening plane on one axis.



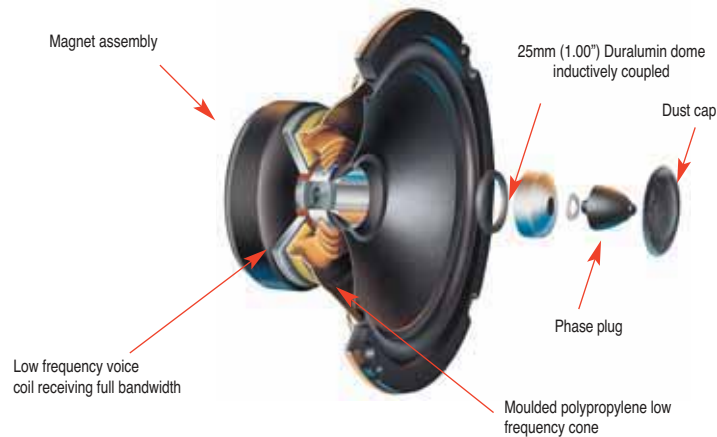
In a Dual Concentric™ driver the signal sources are perfectly aligned, resulting in smooth response and a wide listening area in both horizontal and vertical axes.

Signals remain perfectly aligned over a wide area in both vertical and horizontal axes

The Dual Concentric™ driver exhibits better harmonic alignment, the effect of which is to deliver a more natural sound with superb tonal balance and greater intelligibility. Propagating a spherical wave front aligned on all three axes, Tannoy's point source driver delivers even dispersion into a wide listening field in both the horizontal and vertical planes. Optimal transient performance and sound quality is achieved by the integrated design approach of the Dual. An even response throughout the listening area and a constant time delay over the frequency spectrum provides exceptional off-axis performance.



The controlled even dispersion and greater intelligibility of the Dual Concentric™ constant directivity drive unit ensures that the speaker output can be more accurately targeted to where it is needed.



## ICT™ DRIVER TECHNOLOGY

The point source configuration of the Tannoy ICT™ driver's mid-bass and tweeter sections ensures a wide and controlled dispersion for optimum coverage. By utilising a wireless electromagnetic tweeter that does not require a crossover and cannot be burned out from heavy or abusive use. This (Inductive Coupling Technology) drive unit also addresses the two most common component failures experienced in background music and sound reinforcement systems, the tweeter and the crossover reliability.

The use of an inductively coupled 25mm (1.00") Duralumin domed wireless electromagnetic tweeter means that no crossover is required in the design. The high frequency dome has a deep drawn skirt which sits on the inside of the low frequency voice coil in the same magnetic gap. Like a single shorted turn, it is induced with high frequency information generated by the low frequency voice coil, which is fed a full bandwidth signal.

## VQ DRIVER TECHNOLOGY

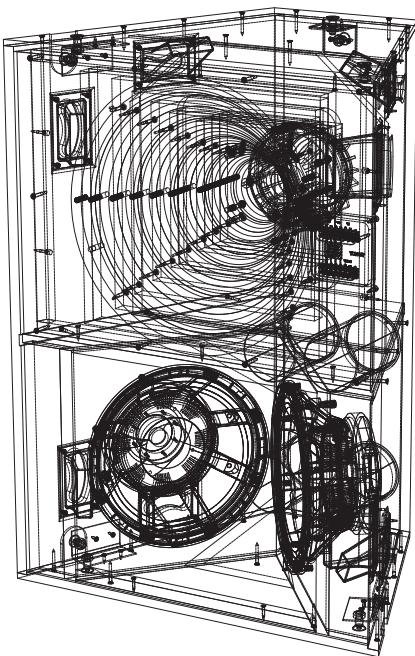
### Cutting Edge Point Source Driver

The VQ products utilize a unique driver technology to radiate a coherent single point source for superior dispersion control when coupled to our single horn. This advanced design aligns the acoustical centres of the transducers providing a single coherent wavefront emanating from the throat. The driver uses two concentric annular ring diaphragms, coupled to a uniquely engineered Point Source Waveguide™. The larger of the two diaphragms has a 3.5" voice coil and reproduces frequencies from 400Hz to 7 kHz. Another major advantage here is that there is no crossover anywhere near the vocal region ensuring the most natural and phase coherent reproduction at this critical area. The 2" HF diaphragm takes over at 7kHz to 22kHz by way of a passive or an active crossover. The external casting features extensive heat-sinking ensuring good heat transfer for high power handling and very low power compression.

### Horn Design Without Compromise

The use of a Dual Concentric™ compression driver results in a wavefront at the throat of the horn being perfectly coherent across its frequency range. The MF/HF transducer loads into a large & proprietary designed common horn. There is a huge advantage here in comparison to acoustic sources hither to used with horns which consist of an HF compression driver and a separate midrange compression driver, each with its own horn. Invariably there is interference between the midrange and high frequency at the crossover. This results in uneven off axis performance, even if the HF horn is mounted in front of the MF horn. This artefact is compounded even further if the sources are displaced on the front baffle – No Exceptions.

For more information on VQ Series technology, see page 041.





## QFLEX DRIVER TECHNOLOGY\_\_

The key to our award-winning QFlex beam-steering technology lies in the unique driver assembly design and the revolutionary software steering algorithms. To achieve the desired level of acoustic control, it's crucial that the low frequency driver elements are densely spaced like the high frequency drivers for effective operation over their pass-band. The 3" and 4" low frequency drivers in QFlex have been optimized with a combination of FEA (finite element analysis), Klippel™ Analysis, and laser interferometry. With a highly efficient neodymium magnet structure and under-hung voice coil, we are able to achieve large linear excursions while maintaining distortion free performance. This affords us the desired low frequency performance while maintaining our dense spacing.

We also developed a very unique high frequency array solution, resulting in an 8 element array with a specially designed neodymium magnet structure allowing for very dense spacing of the sources. The dome centres are only 30mm apart, banishing aliasing (lobing) to frequencies beyond 12kHz. Thermal power handling is further augmented by the inclusion of a common heat-sink on the rear of the high frequency array.

For more information on QFlex technology including the innovative Beam Engine™ software, see page 033.

## VNET™ NETWORKING\_\_

VNET™ is Tannoy's proprietary loudspeaker network protocol, comprising of both software and hardware DSP components. VNET allows for system optimisation and real-time diagnostics of an installed sound system, via standard Ethernet network. The technology is available as part of many of Tannoy's professional sound reinforcement systems including VQ Series, V Series and QFlex.

For more information on VNET™ technology, see page 061.



FOR MORE IN-DEPTH TECHNICAL SPECIFICATION AND PERFORMANCE MEASUREMENTS OF ALL PRODUCTS FEATURED WITHIN, WE STRONGLY RECOMMEND YOU VISIT THE TANNOY WEBSITE AT TANNOY.COM

## TANNOY ONLINE RESOURCES\_\_

This catalogue is intended only to give a summary overview of Tannoy's Professional audio solutions. For more in-depth technical specification and performance measurements of all products featured within, we strongly recommend you visit the Tannoy website at Tannoy.com. All Professional product data can be located in the PROFESSIONAL section (navigation bar on left) and is searchable by loudspeaker type (or category), by series name or by application type. Full data sheets, manuals, drawing files and EASE files are available to download where applicable. The dedicated DOWNLOADS section also allows for quick and easy search by sector and product series, and custom selection of the specific files you require, for collation into a handy zip file saved to your computer.

The Professional section of the website also has an invaluable REFERENCE PROJECT LIBRARY resource where you can see Tannoy product in action in a variety of real world application scenarios. We recommend you check this out next time you visit the site.

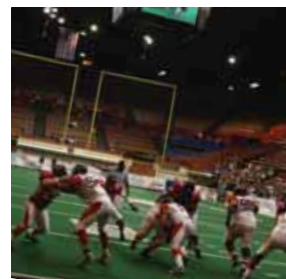
Don't forget to sign up for the regular Over The Tannoy newsletter and join the Tannoy professional community via Facebook, Twitter and Youtube – all links are easily located on the Tannoy homepage.



# APPLICATIONS

## ONE POINT SOURCE, ENDLESS APPLICATIONS\_

Tannoy manufacture professional loudspeaker systems for just about every possible end-use application, ranging from discrete in-wall and in-ceiling installed sound to large scale, clustered arrays designed for high SPL demanding applications such as stadium and arena sound. Many of Tannoy's premium products feature the company's world renowned Dual Concentric™ point source driver technology, delivering class-leading acoustic performance in just about any situation, no matter what the constraints are. Whatever the size and scale or the particular acoustic characteristics of a venue or environment, Tannoy can offer the perfect tool for the job.

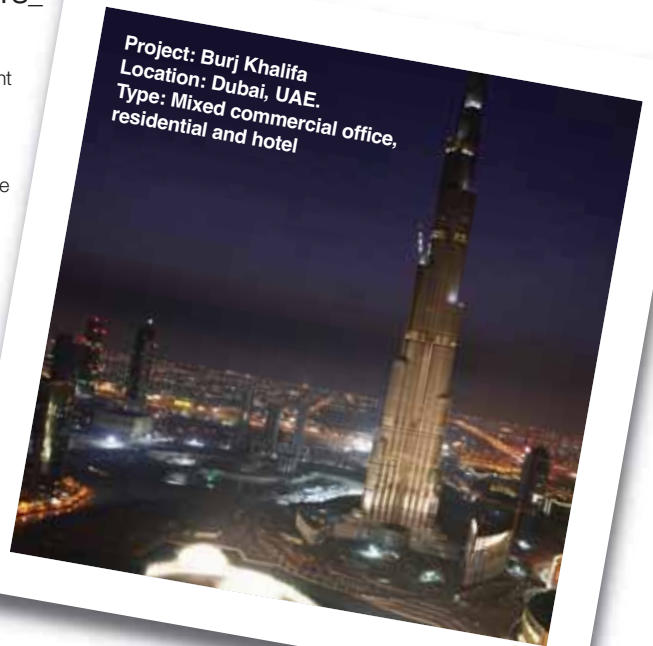


## WHATEVER THE SIZE AND SCALE OR PARTICULAR ACOUSTIC CHARACTERISTICS OF A VENUE OR ENVIRONMENT, TANNOY CAN OFFER A PROBLEM SOLVING LOUDSPEAKER SOLUTION THAT DELIVERS PERFORMANCE AND VALUE

### TAKING SUPERIOR QUALITY AUDIO TO NEW HEIGHTS\_

With such a landmark construction project as Dubai's world famous Burj Khalifa, comes a need to consider every detail carefully and so every component of the development has been specified with the highest quality in mind. This premium specification extends to the installed sound system, and so it's not surprising to find Tannoy's industry renowned range of in-ceiling and in-wall loudspeakers integrated throughout the vast structure, on almost every single one of its 160 habitable floors in fact.

Over 5,000 of the Scottish-based speaker manufacturer's CMS Series in-ceiling loudspeakers have been installed, along with over 1,000 IW Series in-wall speakers, providing an unrivalled standard of audio coverage throughout the many internal spaces of this vertical city including the lobbies, corridors, terraces and reception areas of all publicly accessible floors. The majority of the in-ceiling loudspeakers installed were CMS 501PI, which benefit from being supplied with a separate pre-install back can. These zinc plated, fully wired back cans are designed to be pre-installed into newly constructed, non-suspended ceilings leaving the product to be inserted at the final system commissioning stage of the install. This makes them particularly suited to large scale, potentially complicated new-build developments such as the Burj Khalifa, where the contractor needs to get in and complete installation and commissioning in very strict time frames.



**Project: Burj Khalifa**  
**Location: Dubai, UAE.**  
**Type: Mixed commercial office, residential and hotel**

### QFLEX DELIVERS CLEAR MESSAGE\_

Frankfurt has devoted an entire establishment to the story of how information has been passed around since earliest human history – the Frankfurt Museum of Communication situated on the city's Main riverbank. So it's perhaps a most fitting environment to find Tannoy's QFlex steerable array system installed, being one of the most cutting edge examples of modern communication technology.

The modern, transparent and open 4-storey building invites visitors on a journey of discovery through the ages, looking at how means of communication have developed and evolved. As is typical with examples of modern architecture such as this, extensive use has been made of hard reflective materials such as glass, exposed concrete and expansive hardwood flooring. While this allows for open, well-lit spaces, it often leads to spaces that are acoustically extremely challenging. And so it proved to be, as the initial years of the museum have been blighted by frequent complaints from visitors about the poor intelligibility of both speech and background music – especially where audio program material was part of the various exhibits.

The irony in being faced with a major communication challenge at this particular museum certainly isn't lost. Thankfully, such acoustical problems have been overcome however, thanks to Tannoy's revolutionary QFlex beam-steering array system. Just four QFlex 16 devices were all that was required to cover the majority of the affected areas, installed around the main circulation spaces of the museum, discretely mounted on the concrete structural pillars. The final results here in Frankfurt speak for themselves, not only has QFlex solved a major communication problem for both staff and visitors, it has done so in the most discrete way – with very little impact on the crisp, clean lines of this modern piece of architecture.



**Project: Museum of Communications**  
**Location: Frankfurt, Germany**  
**Type: Museum**



## STADIUM SOUND QUALITY FOR CALIFORNIAN UNIVERSITY SPORTS ARENA

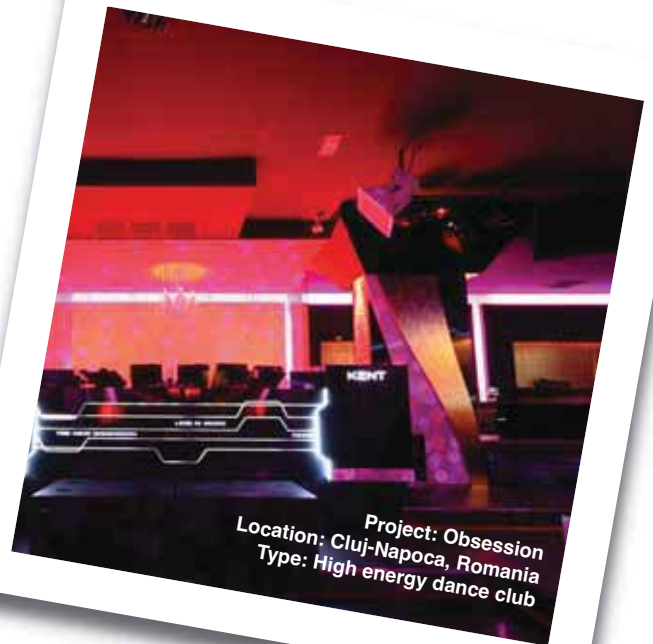
Ranked as one of the largest on-campus arenas in Northern California, the ARC Pavilion is an integral part of campus life for UC Davis' students, and hosts basketball games and other sporting events, as well the school's annual commencement ceremonies. But although the roughly 8000-capacity facility was plenty big enough for any event UC Davis held in it, the sound provided by its pre-existing audio system wasn't.

Where the previous rig relied heavily on a central cluster of speakers, a newly installed Tannoy VQ system is distributed throughout the entire venue in a series of twelve clusters: Four distributed equally along each of the longer east and west sides of the arena – one Tannoy VQ DF apiece in the two inner clusters and one VQ DF and two VQ MB's at each corner – Identical coverage of the north and south bleachers was provided by two more VQ DF's, one mounted above each end of the court, with additional sound reinforcement for the players – and for events in which only the floor of the arena is seated – provided by way of two Tannoy V12 HP's set midway between the inner and outer east/west clusters along the court's centre line. The ability to control and mute individual zones enhances intelligibility further, particularly during events where only a portion of the venue is in play. "Intelligibility goes way up because you're not bouncing all that extra sound around.", explained Ian Hunter of AV design firm Shallick Collaborative Inc., describing the Tannoy VQ's pattern control as "amazing".

## OBSESSIVE ABOUT DANCE MUSIC

Whilst many consider the likes of Berlin, London and Ibiza to be the clubbing hubs of Europe, on the continent's often overlooked peripheries, there are some surprisingly high-end venues being created. One such venue is Obsession, located in the Transylvanian town of Cluj-Napoca. Obsession is a subterranean club entered via a long golden passageway leading directly into the main room. Here interior designers Indestudio have created an intimate space that mixes shiny onyx-black, gold-leaf and cut glass. SGM Idea Series moving heads provide the main dancefloor action while LED cove lighting and illuminated panels allow the Obsession team to subtly alter the club's identity from one night to the next. It is the sound system, however, of which the club is most proud.

The launch of the VQ series in 2008 marked Tannoy's re-entrance into the high energy large scale club market. Whilst it has already been used to great effect in a number of venues (such as Es Paradis in Ibiza), the system at Obsession is by far the most impressive yet. The main room features a stunning eight Tannoy VQ 60s - full range, three-way loudspeakers offering very high output capability with class leading pattern control. With low frequency extension to 90Hz, the VQ 60 can be combined with various subwoofers for extended bandwidth and in the case of Obsession, eight Tannoy VS 218DR were placed around the room. Each VS 218DR subwoofers comprise twin 458mm (18") high efficiency drive units producing 106dB (1W), with a 100mm (4") voice coil. Even the DJ booth has a high quality sound in the form of two Tannoy IQ10s.



**DELIVERING A CLEAR AND CONCISE SERMON WITH QFLEX\_**

Just as All Saints Chapel is the heart of spiritual life at this prestigious Dallas area school, the Chapel's dual manual, twenty seven-stop organ – designed specifically for the school by organ-master, Fritz Noack – is the heart of the chapel. Intentionally designed to have a long, smooth reverberation time, the Chapel favours sonic sources like their magnificent organ and ensemble vocals, but when it comes to speech, small musical ensembles or program music, its stark Greek design and vertical concrete walls become a liability. Happily for the school, Tannoy's QFlex line of digitally steerable, multi-channel, array speakers are also purpose built; not only to provide a total audio solution for extremely difficult acoustic environments, but to do so with a degree of elegance that makes them an ideal solution for The Episcopal School of Dallas' specific needs.

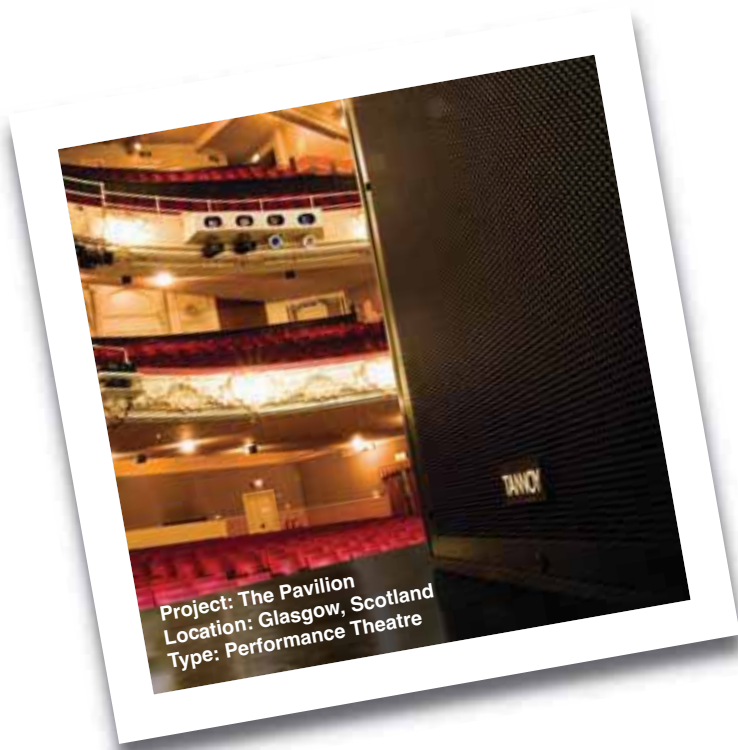
Since the Tannoy QFlex rig went in this past Spring, explains Matthew Noack, Director of Real Estate at the school, a torrent of complaints fielded by the School's Founder, Father Swan, have become a steady stream of compliments. "It's a huge change, he says. "Before, people could not understand the sermon if they were in the back of the chapel. This has brought back the spoken word as a very clear component to our worship."

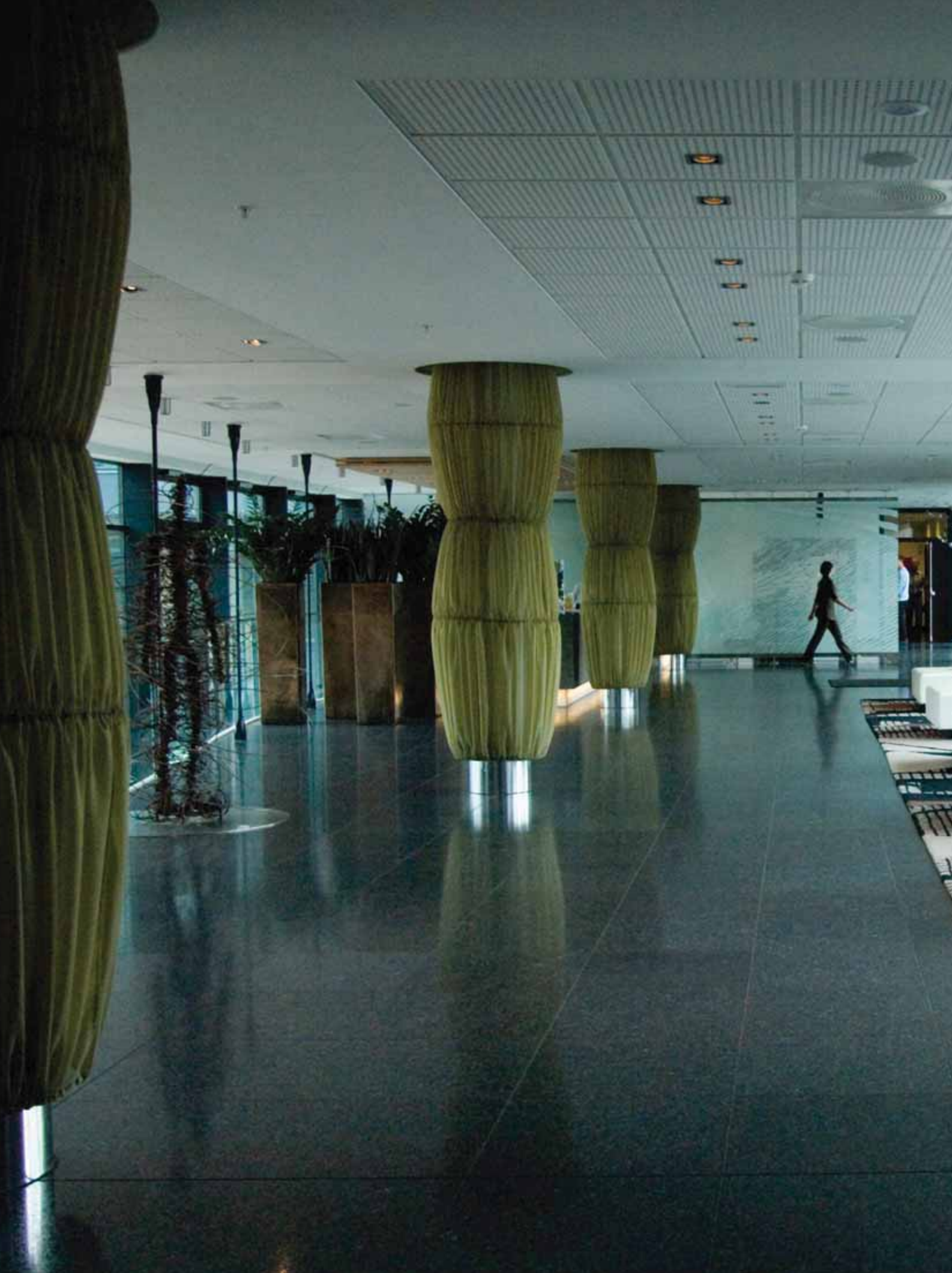


**STAR PERFORMANCE FROM VQ SERIES \_**

The Pavilion, one of Glasgow's oldest and best loved variety theatre venues, has recently overhauled its FOH system with a pair of Tannoy VQ 100 full-range loudspeakers. The new VQ 100s add a new level of clarity, definition and presence to the performances within the historic 1449-seat auditorium and have gone down well with both cast and audiences since they were installed during the summer season.

A single VQ 100 can produce more power and clarity over its 100 degree beamwidth area than many arrayed solutions using multiple cabinets, thanks to Tannoy's latest Dual Concentric driver technology, patented Point Source Waveguide and innovative horn design that are the hallmarks of VQ Series. The class-leading performance characteristics meant that two full-range enclosures were all that was required, minimising the aesthetic impact not to mention the installation cost. General Manager, Iain Gordon, has spent long enough in the industry to have a keen sense of venue acoustics and knows a good system when he hears it. Clearly impressed with the new install he commented, "Tannoy's VQ Series sounds better than anything I've heard in over 30 years of working in the theatre business. The new system really gives our performers a whole new level of presence in our shows and projects truly natural sound across the whole audience."





## IN CEILING / IN WALL

Tannoy has long been associated with premium quality ceiling speakers, having been specified into a vast number of prestigious installations worldwide. The latest products incorporate new developments in acoustic and mechanical engineering to create a class leading range of ceiling speakers to fit all application requirements, while still setting the standard for audio performance at every level.

- Unique Tannoy drive unit technologies deliver point source constant directivity performance
- Blind mount (including back can) or pre-install (back can supplied as an option) configurations
- Separate back can available for PI models
- Quick and easy self aligning clamping mechanism
- Supplied with C ring and tile bridge
- Essential approval certification



CMS PI model



CMS PI back can

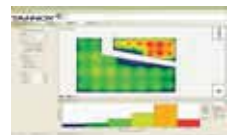


CMS BM model

The full line up of ceiling speakers offered satisfies an exceptionally broad range of applications. High quality, unobtrusive sound systems for commercial installations such as shopping malls, airports, hotels, leisure facilities, cruise ships, pubs, clubs, boardrooms, right through to residential custom installations for multi room systems or home theatre.

### EASE Address

EASE Address is a unique design verification software package that enables system designers to accurately position, model and confirm ceiling distributed speaker systems utilising Tannoy loudspeaker products. Unlike conventional 2D ceiling speaker software, EASE Address allows for complex room shapes with varying ceiling heights



\*see page 021 for information on EASE Address

## CVS RANGE

### OVERVIEW\_

The Tannoy CVS is a full bandwidth ceiling speaker system comprising of a mid bass driver with a coaxially mounted high frequency section in a vented, injection moulded, paintable front baffle manufactured from UV/weather resistant UL94V-0 ABS material.



### DESCRIPTION\_

CVS is supplied with an integral zinc-plated steel back can, with recessed termination box, the removable locking connector has screw terminals for secure wire termination and "loop through" facility. Strain relief is provided by a clamping mechanism for use with plenum rated cable or conduit. Security toggle clamps make for quick and easy installation, while two tile support rails and one C-ring are also included in the package. A plaster (mud) ring is available as an optional accessory. The CVS models are equipped with a low insertion loss line transformer with a front baffle mounted rotary tapping switch.

### TECH BRIEF\_

	CVS 4_	CVS 6_	CVS4 MICRO_
<b>Driver Complement</b>	100mm (4") Coaxial	150mm (6") Coaxial	100mm (4") Coaxial
<b>Dispersion</b>	102 deg	93 deg	102 deg
<b>Freq Range (-10dB)</b>	77Hz - 22kHz	60Hz - 24kHz	90Hz - 22kHz
<b>Sensitivity (1W@1m)</b>	87dB (2.45V @ 6 Ohms)	91dB (2.45V @ 6 Ohms)	87dB (2.45V @ 6 Ohms)
<b>Rated Max SPL</b>	103dB (average) 109dB (peak)	109dB (average) 115dB (peak)	109dB (average) 115dB (peak)
<b>Rec. Amp Power</b>	80W	120W	80W
<b>Weight</b>	2.60kg	4.75kg	2.60kg
<b>Dimensions (Dia x Depth)</b>	213mm x 202.5mm (8.4" x 9.8")	279.5mm x 246.5mm (11" x 9.7")	213mm x 98.3mm (8.4" x 3.9")

## CMS RANGE

### OVERVIEW\_

CMS speakers are full bandwidth; high power and high sensitivity ceiling monitor systems, comprising either an ICT™ or Dual Concentric™ point source transducer. Mounted in a vented, injection moulded, paintable front baffle manufactured from UV/weather resistant UL94V-0 ABS material, the configuration of these driver's mid-bass and tweeter sections ensures a wide and controlled dispersion for optimum coverage.



### DESCRIPTION\_

Suited to high-level music and speech reinforcement applications requiring exceptional sonic quality with uncompromised reliability, the CMS 401 is specifically designed for fast, simple and cost effective installation in new and existing buildings. The driver pod unit can be entirely angled towards the listener within the fixed ceiling mounting ring; the challenge of difficult speaker placement, in less than perfect room configurations, is therefore eliminated by being able to discreetly pivot the loudspeaker towards the desired area of coverage.

#### Model options for CMS 501 / 601 / 801

CMS BM (Blind Mount) - supplied with an integral back can. CMS PI (Pre-Install) - supplied without a back can, optional transformer available. CMS PI back can (Pre-wire back can) - for use with the CMS PI models.

### TECH BRIEF\_

	401e_	401 DCe_	501_	501 DC_
<b>Driver Complement</b>	100mm (4") ICT™	100mm (4") Dual Concentric™	130mm (5") ICT™	130mm (5") Dual Concentric™
<b>Dispersion</b>	120 deg	123 deg	105 deg	109 deg
<b>Freq Range (-10dB)</b>	80Hz - 24kHz	80Hz - 54kHz	74Hz - 24kHz (inc back can)	70Hz - 54kHz (inc back can)
<b>Sensitivity (1W@1m)</b>	88dB (2.83V @ 6 Ohms)	88dB (2.83V @ 8 Ohms)	89dB (2.83V @ 6 Ohms)	89dB (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	105dB (average) 111dB (peak)	106dB (average) 112dB (peak)	106dB (average) 112dB (peak)	107dB (average) 113dB (peak)
<b>Rec. Amp Power</b>	100W	120W	100W	120W
<b>Weight</b>	3.05kg	2.73kg	3.6kg	3.9kg
<b>Dimensions (HxWxD)</b>	205mm x 147.6mm (8" x 5.8")	205mm x 147.6mm (8" x 5.8")	210mm x 189.5mm (8.3" x 7.5")	210mm x 189.5mm (8.3" x 7.5")



OVERVIEW

As with the 100mm (4.00") and 130mm (5.00") models, the CMS601, 601DC and 801DC are mounted in a vented, injection moulded, paintable front baffle manufactured from UV/weather resistant UL94V-0 ABS material. The CMS12 TDC is a large format unit capable of high SPL, superior vocal articulation and musicality.



DESCRIPTION

These compact units are specifically designed for applications requiring the combination of premium sonic quality for music and speech reinforcement and exceptional reliability. The CMS range is equipped with a low insertion loss line transformer easily configurable via front baffle mounted rotary tapping switch.

Blind mount and pre-install versions of the CMS 601 and 801 models are available, as well as a separate back can to satisfy the vast majority of installation application requirements. Spring loaded self-aligning clamps make for quick and easy installation, while all models are also supplied with two tile support rails and one C-ring included in the package. A plaster (mud) ring is available as an optional accessory.

The CMS 12TDC can be used with either of the TEQ1200 or 1200T (inc transformer) optimally tuned back boxes.

TECH BRIEF	601	601 DC	801 DC	12 TDC
<b>Driver Complement</b>	165mm (6.5") ICT™	165mm (6.5") Dual Concentric™	200mm (8") Dual Concentric™	305mm (12") Dual Concentric™
<b>Dispersion</b>	92 deg	111 deg	100 deg	90 degrees
<b>Freq Range (-10dB)</b>	51Hz - 24kHz	50Hz - 30kHz	41Hz - 35kHz	42Hz - 20kHz
<b>Sensitivity (1W@1m)</b>	91dB (2.45V @ 6 Ohms)	91dB (2.83V @ 8 Ohms)	92dB (2.83V @ 8 Ohms)	100dB half space (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	108dB (average) 112dB (peak)	110dB (average) 116dB (peak)	112dB (average) 118dB (peak)	123dB (average) 129dB (peak)
<b>Rec. Amp Power</b>	120W	160W	180W	400W
<b>Weight</b>	6.5kg	7.45kg	6.5kg	24.5kg (inc TEQ1200 Transformer)
<b>Dimensions (HxWxD)</b>	280mm x 258mm (11" x 10.2")	280mm x 258mm (11" x 10.2")	325mm x 310.5mm (12.8" x 12.2")	387mm x 311mm (15.3" x 12.3")

OVERVIEW

The Tannoy CMS 801 subwoofer is a compact unit specifically designed to complement the full range CMS ceiling monitor systems; delivering low frequency extension into applications that require a combination of premium sonic quality and output level for music and speech reinforcement.



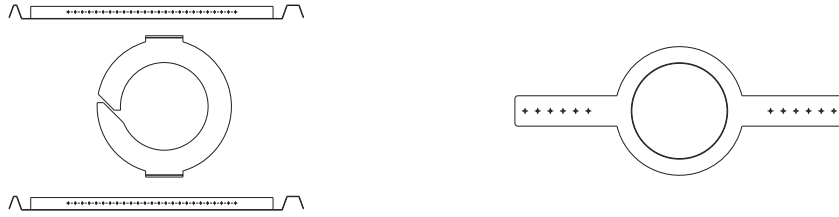
DESCRIPTION

The 200mm (8.00") driver, with long throw multi fibre paper pulp cone, and a 2nd order 160Hz passive crossover are mounted in a vented, injection moulded, paintable front baffle manufactured from UV/weather resistant UL94V-0 ABS material. Two CMS801 subwoofer model versions and a separate back can are available to satisfy the vast majority of installation application requirements; PI (pre-install) with no back can and BM (blind mount) with a fully integrated steel back can including transformer. For the PI model an optional transformer is available, but the recommended option is the accessory PI back can with fitted transformer.

Spring loaded self-aligning clamps make for quick and easy installation, while all models are also supplied with two tile support rails and one C-ring included in the package. A plaster (mud) ring is available as an optional accessory.

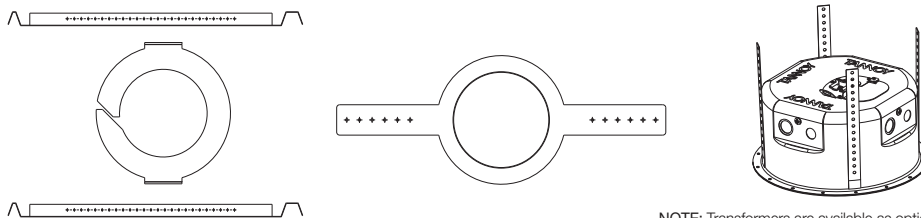
TECH BRIEF	801sub
<b>Driver Complement</b>	200mm (8") Long throw woofer
<b>Dispersion</b>	-
<b>Freq Range (-10dB)</b>	42Hz - 300Hz
<b>Sensitivity (1W@1m)</b>	92dB (2.45V @ 6 Ohms)
<b>Rated Max SPL</b>	112dB (average) 118dB (peak)
<b>Rec. Amp Power</b>	200W
<b>Weight</b>	6.3kg
<b>Dimensions (HxWxD)</b>	325mm x 310.5 mm (12.8" x 12.2")

# CVS HARDWARE



CVS RANGE	SUPPLIED ACCESSORIES	OPTIONAL ACCESSORIES
	C-RING AND TILE BRIDGE	PLASTER (MUD) RING
CVS 4	•	•
CVS 6	•	•
CVS4 MICRO	•	•

# CMS HARDWARE



NOTE: Transformers are available as optional accessories for CMS PI models for the occasions where a back can is not to be used in an installation.

CMS RANGE	SUPPLIED ACCESSORIES	OPTIONAL ACCESSORIES	
	C-RING AND TILE BRIDGE	PLASTER (MUD) RING	BACK CAN
CMS 401e	•	•	
CMS 401DC e	•	•	
CMS 501PI	•	•	•
CMS 501BM	•	•	
CMS 501DC PI	•	•	•
CMS 501DC BM	•	•	
CMS 601PI	•	•	•
CMS 601BM	•	•	
CMS 601DC PI	•	•	•
CMS 601DC BM	•	•	
CMS 801DC PI	•	•	•
CMS 801DC BM	•	•	
CMS 801sub PI	•	•	•
CMS 801sub BM	•	•	
CMS 12TDC		•	•

## OVERVIEW\_

The iC6 DC is a premium quality; compact and low profile ceiling monitor system based around a 165mm (6.50") point source, constant directivity Dual Concentric™ transducer. Combining a long throw, multi fibre, paper pulp bass cone, the reference quality studio monitor driver also delivers extended bandwidth with its high frequency section that utilises a 25-micron titanium dome and neodymium magnet system.



ACCESSORIES	SUPPLIED	OPTIONAL	
iC6 DC	C-RING	BACK CAN	BACK CAN / TRANSFORMER
	●	●	●

## DESCRIPTION\_

The robust driver construction provides high power handling and the very wide bandwidth, ensuring exceptional intelligibility for music or speech with a smooth, uniform frequency response over a wide area of coverage. Based around a rigid moulded ABS baffle, with excellent structural integrity, the iC6DC uses an ultra-secure, polycarbonate, three-clamp, self-aligning mounting system to ensure a performance enhancing rigid acoustic coupling with the ceiling surface.

A metal 'C-ring' is supplied as standard to enable a very high degree of integrity when fixing to various ceiling materials. An optional shallow back can is available to allow fitting in areas with restricted space whilst also ensuring optimum acoustic performance. The perforated metal grille and low profile mounting frame of the iC6 DC can be painted to blend in seamlessly with any type of décor.

## TECH BRIEF\_

## iC6 DC\_

<b>Driver Complement</b>	165mm (6.5") Dual Concentric™
<b>Dispersion</b>	90 degrees
<b>Freq Range (-6dB)</b>	36Hz - 36kHz
<b>Sensitivity (1W@1m)</b>	91dB (2.83V @ 6 Ohms)
<b>Rated Max SPL</b>	113 (average), 119 (peak)
<b>Rec. Amp Power</b>	20-150W
<b>Weight</b>	3kg
<b>Dimensions (HxWxD)</b>	270mm x 99mm (10.6" x 3.9")

## \_Available in North America Only PENDANT SPEAKER

## OVERVIEW\_

The cabinet of the Tannoy STK II full bandwidth, active, high quality ceiling monitor system, is an inverted pyramid shape, allowing the four 165mm (6.50") point source ICT™ and one 250mm (10.00") low frequency drive units to be aimed for uniform dispersion characteristics.



## DESCRIPTION\_

The STK II cabinet is constructed of 18mm (0.75") birch plywood with a textured black paint finish is fitted with four seismic tether points for attaching cables and/or chains from overhead structures. The compact enclosure provides a quick and easy installation into any free space environment. The active STK II is designed to provide an all in one solution for high fidelity music reproduction where a single cabinet is required to cover large areas, ideally suited for retail, fitness and restaurant and bar applications.

## TECH BRIEF\_

## STK II\_

<b>Driver Complement</b>	4 x 165mm ( 6.5") ICT / 1 x 354mm (10") LF
<b>Dispersion</b>	120 Deg
<b>Freq Range (-3dB)</b>	35Hz - 20kHz
<b>Sensitivity (1W@1m)</b>	94dB (2.83V @ 6 Ohms)
<b>Rated Max SPL</b>	105dB (average), 105dB (peak)
<b>Rec. Amp Power</b>	145W (LF), 60W (Satellites)
<b>Weight</b>	33kg
<b>Dimensions (HxWxD)</b>	527mm x 603mm x 603mm (20.8" x 23.8" x 23.8")

# CEILING SUBWOOFERS

## OVERVIEW\_

The CMS110 TB Tile Bridge ceiling subwoofer is a 250mm (10.00") drive unit in a compact down-firing, vented cabinet capable of 31Hz @ -3dB (26Hz @ -10dB). Easy to install and with no special construction requirements, the CMS110 TB drops into a 2' x 2' ceiling tile space; integrating invisibly into the installation environment by using a standard air conditioning vent cover as a speaker grille.



## DESCRIPTION\_

The CMS110 TB features a resonance decoupling system and additionally each corner of the cabinet is fitted with a seismic tether point. The four corner flying points allow the unit to be flown in free space via a 3/8" threaded rod, a chain or aircraft cable. Fire rating is NFP-A Grade A.

Incorporating a 200mm x 250mm (8.00" x 10.00") input module located on the side of the cabinet, ensuring that controls are easily accessed by lifting the adjacent ceiling tile. The CMS110 TB can be ordered with a passive input module (110 TB-P) connected via barrier strip, or with a passive internal crossover (CMS110 TB-PX). Both passive modules can be powered by a THP 60 Watt / 70 Volt line transformer for distributed systems (CMS110 TB-P70V and CMS110 TB-PX70V).

## TECH BRIEF\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Rec. Amp Power**  
**Weight**  
**Dimensions (HxWxD)**

## CMS110 TB-P\_

250mm (10") direct radiating sub  
-  
26Hz - 150Hz  
-  
105dB (average) 111dB (peak)  
110W  
18.1kg  
251mm x 598mm x 598mm  
(9.8" x 23.5" x 23.5")

## CMS110 TB-PX\_

250mm (10") direct radiating sub  
-  
26Hz - 150Hz  
-  
105dB (average) 111dB (peak)  
110W  
18.1kg  
251mm x 598mm x 598mm  
(9.8" x 23.5" x 23.5")

## CMS110 TB-A\_

250mm (10") direct radiating sub  
-  
26Hz - 150Hz  
-  
105dB (average) 111dB (peak)  
110W  
18.1kg  
251mm x 598mm x 598mm  
(9.8" x 23.5" x 23.5")

## OVERVIEW\_

A compact, down-firing, vented ceiling subwoofer cabinet with 250mm (10.00") long throw driver capable of 31Hz @ -3dB (26Hz @ -10dB). The CMS110 SR Sheet Rock subwoofer flush mounts into sheet rock ceilings, walls, or overhangs - any position offering adequate clearance and suitable structural support. The unit comes complete with a low profile square grille.



## DESCRIPTION\_

The CMS110 SR cabinet is fitted with seismic tether points and comes with a sturdy pre-installation ring (CMS110 SR-Ring) for safe and secure installation of the unit. (The pre-installation ring is available separately for new construction where the sheet rock installers arrive before the contractor.) Fire rating for the 110 SR is NFPA Grade A.

The CMS110 SR incorporates a 200mm x 250mm (8.00" x 10.00") input module located on the side of the cabinet. The input module controls are easily accessed by removing the grille and the unit remains serviceable and fully removable from below after installation. The CMS110 SR can be ordered with a passive input module (CMS110 SR-P) connected via barrier strip, or with a passive internal crossover (CMS110 SR-PX). Both passive modules can be powered by a THP 60 Watt / 70 Volt line transformer for distributed systems (CMS110 SR-P70V and CMS110 SR-PX 70V).

## TECH BRIEF\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Rec. Amp Power**  
**Weight**  
**Dimensions (HxWxD)**

## CMS110 SR-P\_

250mm (10") direct radiating sub  
-  
26Hz - 150Hz  
-  
105dB (average) 111dB (peak)  
110W  
15.4kg  
318mm x 483mm x 483mm  
(12.4" x 19" x 19")

## CMS110 SR-PX\_

250mm (10") direct radiating sub  
-  
26Hz - 150Hz  
-  
105dB (average) 111dB (peak)  
110W  
15.4kg  
318mm x 483mm x 483mm  
(12.4" x 19" x 19")

## CMS110 SR-A\_

250mm (10") direct radiating sub  
-  
26Hz - 150Hz  
-  
105dB (average) 111dB (peak)  
110W  
15.4kg  
318mm x 483mm x 483mm  
(12.4" x 19" x 19")

## EASE ADDRESS\_

EASE Address is the unique design verification software package that enables system designers to accurately position, model and confirm ceiling distributed speaker systems utilising Tannoy loudspeaker products. Unlike conventional 2D ceiling speaker software, EASE Address allows for complex room shapes with varying ceiling heights. EASE Address models the direct sound output of distributed systems in two dimensions, using the acoustical calculation engine behind EASE (Enhanced Acoustic Simulator for Engineers); the industry standard for sound reinforcement modelling.

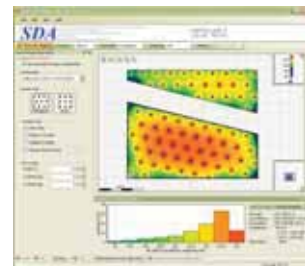
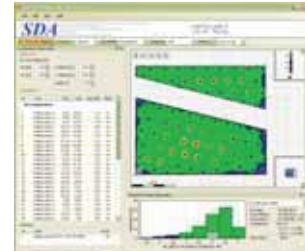
The purpose of EASE Address is to provide both the end user, who needs to quickly develop a simple design for a ceiling loudspeaker system, as well as the sound designer, with a tool that allows the easy and quick prediction of the system performance in a given space. The functionality of EASE Address has been developed from EASE, the professional electro and room acoustic simulation software developed by ADA (Acoustic Design Ahnert) Berlin, Germany.

### Designing distributed systems using Tannoy loudspeakers

Each Tannoy ceiling product is included in the programmes file library as GLL system definition files (.GLL). These files are created by means of the EASE SpeakerLab software and contain the data that defines a loudspeaker with regard to its geometrical and acoustical properties. Tannoy loudspeakers are independently measured at NWAALabs, CA.

### Features

- Constant-Voltage networks like 70 V and 100 V, including tap settings and power sum calculation
- Noise level entry and S/N mapping
- Import and export of EASE project files
- New auto-arrange option for SPL variation over the grid
- Mapping can be saved (after completed) along with the project
- Create print version now supports RTF and PDF
- Cursors can be used to show level values in mapping, also relatively to the reference cursor
- All graphs can be copied to the clipboard or file (use File menu or RMB)
- Allows copying floor/ceiling images from existing room to new room
- English and German program version and help files



UL LISTED

## UL LISTED TANNOY LOUDSPEAKERS\_

Tannoy offers a number of loudspeaker products which have been designed and engineered to meet or exceed the exacting standards for safety required for UL Listed certification, specifically with regards to those standards relevant to commercial loudspeaker installation (UL 1480, UL-2043). These strictly controlled UL Listed marks are a certification of the product's ability to perform safely and to specification in relation to fire safety and installation in air-handling spaces and give the contractor confidence and assurance of delivering a system that meets specific local regulations in North America.

All products that are UL Listed and meet the UL-1480 and UL-2043 standards at time of press are denoted with the UL LISTED logo.

Underwriters Laboratories® is an independent product safety certification organization that has been testing products and writing standards for safety for more than a century. UL evaluates more than 19,000 types of products, components, materials and systems annually with 20 billion UL Marks appearing on 72,000 manufacturers' products each year. The UL Mark on a product means that UL has tested and evaluated representative samples of that product and determined that they meet UL requirements. Under a variety of programs products are periodically checked by UL at the manufacturing facility to make sure they continue to meet UL requirements.



## iw RANGE

### OVERVIEW\_

Built around an immensely strong chassis, the iw6 DS has a main bass and mid-range driver and a WideBand™ high frequency unit. The DC models all use the Tannoy Dual Concentric™ point source driver; this with the addition of an additional SuperTweeter™ extending bandwidth out to over 50kHz.



### DESCRIPTION\_

The compact iw4 DC uses the 100mm (4.00") Dual Concentric™, the iw6 DS a 165mm (6.50") version, while the iw62 TDC uses this and an additional 165mm (6.50") bass driver. The class leading performance is further enhanced by the inclusion of a self aligning clamp mechanism, allowing for simple removal or reorientation of the loudspeaker, but crucially also providing the acoustically optimum bond to the wall surface without risk of distortion to the loudspeaker baffle. Gold plated spring loaded terminals are provided for ease of installation.

### TECH BRIEF\_

#### iw4 DC\_

#### iw6 DS\_

#### iw6 TDC

#### iw62 TDC

<b>Driver Complement</b>	100mm (4") Dual Concentric™	165mm (6.5") Discrete array	165mm (6.5") Dual Concentric™	165mm (6.5") DC / 165mm LF
<b>Dispersion</b>	130 degrees	90 degrees	90 degrees	90 degrees
<b>Freq Range (-10dB)</b>	73Hz - 54kHz	44Hz - 54kHz	36Hz - 54kHz	34Hz - 54kHz
<b>Sensitivity (1W@1m)</b>	88dB (2.83V @ 6 Ohms)	89dB (2.83V @ 8 Ohms)	91dB (2.83V @ 8 Ohms)	92dB (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	106dB (average) 112dB (peak)	108dB (average) 114dB (peak)	112dB (average) 118dB (peak)	117dB (average) 123dB (peak)
<b>Rec. Amp Power</b>	120W	150W	180W	210W
<b>Weight</b>	2.60kg	3.0kg	3.0kg	5.0kg
<b>Dimensions (HxWxD)</b>	238mm x 159mm x 84mm (9.4" x 6.3" x 3.3")	320 mm x 209mm x 93mm (12.6" x 8.3" x 3.7")	473.5mm x 227mm x 99mm (18.6" x 8.9" x 3.9")	473.5mm x 227mm x 95.5mm (18.6" x 8.9" x 3.8")

### OVERVIEW\_

The iw62 TS is a high performance in wall subwoofer. Designed to augment the low frequency output of the system, it uses the same construction and mechanical installation method, to ensure it is a perfect match, both acoustically and visually, to the full range units.



### DESCRIPTION\_

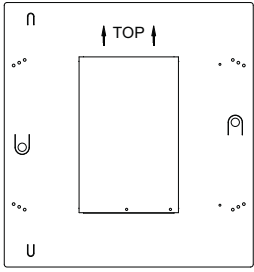
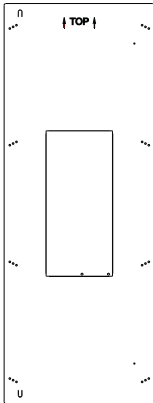
With a continuous power output rated at 200W RMS, this in wall subwoofer is capable of delivering impressive results in large residential and commercial applications; such as small entertainment venues, restaurants, bars, public buildings, board rooms and business music systems.

Complementing any style of decor, the perforated metal grille and discreet moulded ABS baffle panel frame of all the in walls can be painted to blend in seamlessly with any environment.

### TECH BRIEF\_

#### iw62 TS

<b>Driver Complement</b>	2 x 165mm (6.5") LF Subwoofer
<b>Dispersion</b>	-
<b>Freq Range (-6dB)</b>	29Hz - 110Hz
<b>Sensitivity (1W@1m)</b>	94dB half space (2.83V @ 6 Ohms)
<b>Rated Max SPL</b>	117 (average), 123 (peak)
<b>Rec. Amp Power</b>	400W
<b>Weight</b>	6.5kg
<b>Dimensions (HxWxD)</b>	473.5 x 227 x 95.5mm (18.7" x 8.9" x 3.8")



iW RANGE	OPTIONAL ACCESSORIES	
	STEEL BACK CAN (complete)	PRE-INSTALL MOUNTING RING
iw4 DC	•	•
iw6 DS	•	•
iw6 TDC	•	•
iw62 TDC	•	•
iw62 TS	•	•

Available in North America Only iW SUBWOOFER AMPLIFIER

OVERVIEW

The iwSA 500 is a single channel BASH® power amplifier specifically designed to deliver 500 watts (max) of optimally matched power to the Tannoy iw62 TS in wall subwoofer to deliver impressive results in domestic or commercial installations; this in applications such as small venues, restaurants, bars, public buildings and business music systems.



DESCRIPTION

With front mounted control of level, phase and a continuously variable crossover, adjustable from 50Hz – 150Hz, the iwSA 500 amplifier will offer all the control needed to optimise the subwoofer integration with the mid / high units, regardless of the installation positions.

Two unbalanced RCA audio input's and four gold plated binding post outputs, crossover bypass switch, limiter function switch for one or two sub configurations and sleep mode defeat switch are all incorporated. The 2U iwSA 500 casing mounts directly into a standard EIA 19" rack or the brackets can be removed for shelf location with no ventilation issues.

TECH BRIEF

IWSA500

<b>Type</b>	in wall subwoofer amplifier
<b>Rated power output</b>	500W continuous into 4 Ohms 250W continuous into 8 Ohms
<b>Minimum frequency bandwidth</b>	20Hz – 500Hz (no filters or EQ)

# DEFINITION INSTALL

## OVERVIEW\_

These speakers are designed to be hidden within a custom designed installation; mounted on wall either behind the screen or acoustically transparent decorative panels with no appreciable loss of performance. The units can be mounted either horizontally or vertically using the integral keyhole mounts and the supplied wall plate.



## DESCRIPTION\_

Designed to be used in left, centre or right locations the DC6i, DC8i and DC12i are capable of explosive dynamics with stunning detail in both music and movie application in vast array of listening and viewing environments.

The Dual Concentric™ is effectively two drivers properly merged into one where, unlike ordinary drive units, the high frequency unit is positioned on the back of the low frequency driver. As a result they are on same axis, so ensuring that sound energy is effectively propagated from the same point and delivered through the centre of the low frequency cone as true point source.

## TECH BRIEF\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Rec. Amp Power**  
**Weight**  
**Dimensions (HxWxD)**

### DC6i\_

150mm (6") Dual Concentric™  
 90 degrees conical  
 70Hz - 45Hz  
 90dB (2.83V @ 8 Ohms)  
 110dB (average) 116dB (peak)  
 200W  
 7kg  
 334mm x 250mm x 214mm  
 (13.2" x 9.8" x 8.4")

### DC8i\_

200mm (8") Dual Concentric™  
 90 degrees conical  
 62Hz - 45kHz  
 92dB (2.83V @ 8 Ohms)  
 110dB (average) 116dB (peak)  
 260W  
 9.5kg  
 394mm x 294mm x 215mm  
 (15.5" x 11.6" x 8.5")

### DC12i\_

300mm (12") Dual Concentric™  
 90 degrees conical  
 50Hz - 38kHz  
 97dB (2.83V @ 8 Ohms)  
 120dB (average) 126dB (peak)  
 400W  
 20kg  
 550mm x 410mm x 255mm  
 (21.7" x 16.1" x 8.9")



## DESCRIPTION\_

The exceptionally versatile, high power handling iw60 EFX is able to extract the full potential of contemporary multi-channel soundtracks; an in wall surround / effects speaker designed to reproduce the same bandwidth and sound pressure levels as the main speakers.

Capable of an effortless and powerful performance to rival that of the cabinet based models in the range, the iw63 DC is equipped with a 165mm (6.50") Dual coupled with two 165mm (6.50") high output woofers.

Both are built in heavily braced and comprehensively damped MDF cabinets that are supplied with a paintable, flush mounting grille designed to blend seamlessly into any architectural space. A mounting frame is available as an optional pre-installation accessory to fit into standard construction 2" x 4" stud walls.

## TECH BRIEF\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Rec. Amp Power**  
**Weight**  
**Dimensions (HxWxD)**

### iw63 DC\_

2x165mm(6.5") LF / 1x165mm DC  
 -  
 54Hz - 40kHz  
 91dB (2.83V @ 8 Ohms)  
 111dB (average) 117dB (peak)  
 200W  
 10.50kg  
 590mm x 345mm x 94mm  
 (23.2" x 13.6" x 3.7")

### iw60 EFX\_

1x165mm(6.5") DC / 2x100mm DC  
 -  
 74Hz - 27kHz  
 90dB (2.83V @ 8 Ohms)  
 110dB (average) 116dB (peak)  
 200W  
 9.50kg  
 590mm x 345mm x 94mm  
 (23.2" x 13.6" x 3.7")

### iw210s

1 x 250mm (10") LF Driver / 1 x 250mm (10") Passive radiator  
 -  
 28Hz - 600Hz  
 88dB (2.83V @ 8 Ohms)  
 112dB (average) 118dB (peak)  
 500W  
 9.5kg  
 590mm x 345mm x 94mm  
 (23.2" x 13.6" x 3.7")





**DESCRIPTION**

The Definition Install DS12i and DS15i subs have been designed to underpin a Definition install theatre or media room system with truly remarkable low frequency performance.

Massively constructed around either 12" or 15" professional drive units, this subwoofer will produce the ultimate soundtrack experience, with spectacular and thunderous bass, yet still be agile enough to maintain finer musical detail with precision and speed.

The DSI subs are compact enough to bring class leading performance to a wide range of installation applications; from media rooms to home theatre and boardrooms through to high end marine interiors.

**TECH BRIEF**

**DS12i SUB**

**DS15i SUB**

<b>Driver Complement</b>	Direct radiating subwoofer	Direct radiating subwoofer
<b>Dispersion</b>	90 degrees conical	90 degrees conical
<b>Freq Range (-10dB)</b>	38 Hz	36 Hz
<b>Sensitivity (1W@1m)</b>	94dB (2.83V @ 6 Ohms)	96dB (2.83V @ 6 Ohms)
<b>Rated Max SPL</b>	112dB (average) 118dB (peak)	124dB (average) 130dB (peak)
<b>Rec. Amp Power</b>	400W - 800W	600W - 1200W
<b>Weight</b>	21kg	30kg
<b>Dimensions (HxWxD)</b>	435mm x 370mm x 355mm (7.1" x 14.6" x 14")	525mm x 460mm x 430mm (20.7" x 18.1" x 17")





## ARCHITECTURAL

Some of the most demanding loudspeaker applications require a solution that not only delivers superior audio quality, but does so in an unobtrusive and discrete manner. Tannoy has long recognised the importance of offering systems that can satisfy both of these uncompromising requirements, utilising both technological and aesthetic innovations to ensure a solution that performs beyond expectation without impacting on the architectural style of a space.

Tannoy's Architectural product ranges offer the system's designer a wide choice of loudspeakers to suit any situation, at any scale and almost any budget. Whether it's the award-winning Qflex range, using cutting-edge digital beam steering technology, allowing for precise control of audio coverage in highly reverberant spaces such as cathedrals and airports without the need for large numbers of unsightly delay speakers, or whether it's something as simple as the Designer Install speaker range for a stylish bar project – Tannoy has the perfect solution.

This section also includes bespoke loudspeaker products tailored for very specific applications where a speaker should be heard and not seen – including the SR601 outdoor 'rock' speaker and the IS52 in-stair unit for subtle integration into stairways, popular within the retail and bar/club markets.

## OVERVIEW\_

Designed for a wide variety of sound reinforcement applications, the Tannoy Di Series is a range of premium performance, ultra compact surface mount weather resistant loudspeakers.

Tannoy's exclusive point source, constant directivity drive unit technologies in Di deliver outstanding clarity, definition and detail with class leading vocal intelligibility.



## DESCRIPTION\_

As a constant directivity drive unit, the point source ICT™ (Inductive Coupling Technology) enables mounting of the loud speaker in either vertical or horizontal orientations on the wall or ceiling with no compromise to performance. The ICT™ driver also addresses the two most common component failures experienced in background music and sound reinforcement systems; the tweeter and the crossover reliability. The use of a wireless electromagnetic tweeter in the ICT™ design means that no crossover is required; ensuring that the HF unit is exceptionally robust and reliable. The mineral loaded polypropylene cone material and nitrile rubber surround further enhance long-term durability.

The high impact polystyrene (HIPS) enclosure of all the Di Range passive models is rated weather resistant as IP64 to EN60529 (IEC529).

## TECH BRIEF\_

### Di5 / Di5t\_

### Di6 / Di6t\_

<b>Driver Complement</b>	110 mm (4.5") ICT™	165mm (6.5") ICT™
<b>Dispersion</b>	90 degrees	90 degrees
<b>Freq Range (-10dB)</b>	80Hz - 30kHz	55Hz - 24kHz
<b>Sensitivity (1W@1m)</b>	88dB (2.45V @ 6 Ohms)	90dB (2.45V @ 6 Ohms)
<b>Rated Max SPL</b>	105dB (average) 111dB (peak)	107dB (average) 113dB (peak)
<b>Rec. Amp Power</b>	100W	120W
<b>Weight</b>	2.7kg	5.0kg
<b>Dimensions (HxWxD)</b>	240.7mm x 155mm x 162mm (9.5" x 6.1" x 6.4")	357.5mm x 230mm x 223.2mm (14.1" x 9.1" x 8.8")

## OVERVIEW\_

Durable and scuff resistant textured black or white painted finish, with matching rubber trims, all models are full bandwidth weather resistant loudspeakers designed for commercial, professional and residential applications where environment durability and high quality sonic performance are required.



## DESCRIPTION\_

Tannoy's Dual Concentric™ provides extraordinary power handling, high sensitivity, extended frequency response and very low distortion, with a wide and controlled dispersion ensuring optimum coverage. By placing the high frequency drive unit physically inside the low frequency driver, a true point source is created that exhibits constant directivity and unparalleled linearity. Perfect for surface mount applications, the driver system generates a spherical wave front unaffected by energy loss at the crossover frequency in either vertical or horizontal planes; allowing highly flexible speaker placement on the wall or ceiling with no compromise to performance and vocal intelligibility.

For 70V or 100V distributed sound applications all passive models are available in versions equipped with an internally mounted low insertion loss line transformer, with easily configurable wattage taps via an easily accessible rotary tapping switch.

## TECH BRIEF\_

### Di5 DC / Di5 DCt\_

### Di6 DC / Di6 DCt\_

### Di8 DC / Di8 DCt\_

<b>Driver Complement</b>	110 mm (4.5") Dual Concentric™	165mm (6.5") Dual Concentric™	200mm (8") Dual Concentric™
<b>Dispersion</b>	90 degrees	90 degrees	90 degrees
<b>Freq Range (-10dB)</b>	80Hz - 54kHz	55Hz - 35kHz	53Hz - 35kHz
<b>Sensitivity (1W@1m)</b>	88dB (2.83V @ 8 Ohms)	89dB (2.83V @ 8 Ohms)	91dB (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	106dB (average) 112dB (peak)	107dB (average) 115dB (peak)	111dB (average) 117dB (peak)
<b>Rec. Amp Power</b>	120W	180W	180W
<b>Weight</b>	2.7kg	5.5kg	7.0kg
<b>Dimensions (HxWxD)</b>	240.7mm x 155mm x 162mm (9.5" x 6.1" x 6.4")	357.5mm x 230mm x 223.2mm (14.1" x 9.1" x 8.8")	404.3mm x 260mm x 260.3mm (15.9" x 10.2" x 10.2")

OVERVIEW\_

With a rated output of 30W RMS, the Di5a is an ultra compact active loudspeaker system capable of delivering high sound pressure levels with extremely low distortion, resulting in outstanding clarity, definition and detail. Designed for a wide variety of sound reinforcement applications, the Di5a delivers outstanding performance combined and durability.



\*Power supply is EU/US compliant

DESCRIPTION\_

In common with the passive Di models, the Di5a is available in black or white, with additional colour trims as optional accessories, ensuring effective decor matching in most installations. Utilisation of the point source loudspeaker allows the Di5a to be mounted on a wall or ceiling in either horizontal or vertical orientations without affecting its performance.

A range of hardware options ensures simple and effective installation in stereo or monaural background or foreground music systems in applications as diverse as theme parks, retail premises, restaurants and cafés, corporate audio visual and houses of worship. For installs requiring extended low frequency enhancement, a range of Tannoy sub-bass systems are available and can be used in conjunction with the Di5a.

TECH BRIEF\_

Di5a

<b>Driver Complement</b>	110 mm (4.5") ICT™
<b>Dispersion</b>	90 degrees conical
<b>Freq Range (-10dB)</b>	90Hz - 30kHz
<b>Sensitivity (1W@1m)</b>	88dB
<b>Rated Max SPL</b>	103dB (average) 109dB (peak)
<b>Power Rating</b>	30W RMS
<b>Weight</b>	2.40kg
<b>Dimensions (HxWxD)</b>	240.7mm x 155mm x 162mm (9.5" x 6.1" x 6.4")

Di HARDWARE

OVERVIEW\_

Designed to facilitate pre-wiring of the system, the K-Ball™ carries a wiring loom through the arm of the bracket to a Euroblock type connector plug located in the ball. When mounted in conjunction with a standard conduit junction box (J-box) the assembly is then ready to receive the speaker during the commissioning stage of the install.



DESCRIPTION\_

THE K-BALL™ MULTI-ANGLE BRACKET

A recess on the rear of the enclosure contains the Euroblock type connector socket which completes the signal path when the speaker is offered up to the bracket and pushed into place. The speaker may then be swivelled into the desired angle for optimum coverage before tightening the locking collar. A secondary support line can be secured to the tie back point and the rubber weather-sealing boot located.

This innovative bracket is available in black or white as an optional accessory for all the Di passive models.

## Di ACCESSORIES

### OVERVIEW\_

The Yoke bracket is supplied as standard with all models.

The K-Ball™ is suitable for use with all passive models.

The Polemount adaptor may be used with either the Yoke or K-Ball™ brackets.



Di RANGE	SUPPLIED ACCESSORIES		OPTIONAL ACCESSORIES	
	YOKE BRACKET		K-BALL™	POLEMOUNT
Di5a	•			•
Di5 / Di5t	•		•	•
Di5 DC / Di5 DCt	•		•	•
Di6 / Di6t	•		•	•
Di6 DC / Di6 DCt	•		•	•
Di8 DC / Di8 DCt	•		•	•

## ARENA HIGHLINE RANGE

### OVERVIEW\_

Arena HighLine has been designed primarily as a low profile, full range loudspeaker for use in conjunction with Plasma or LCD flat screen technologies. The bracket system and cable management ensure a close to wall mounting and a visual effect that blends with the décor; important in high style installations such as lounges, bars, hotels, boardrooms, houses of worship and retail premises.



ACCESSORIES	SUPPLIED	OPTIONAL
	WALL BRACKETS	FLOOR STAND
HIGHLINE RANGE		
300C	•	•
500C	•	•

### DESCRIPTION\_

They can be used as left, right and centre around the screen, while low frequency reinforcement can be provided using the Tannoy V Series VS10 BP subwoofer in conjunction with the TDX1 electronic system controller. Tannoy DMT™ (Differential Material Technology) is extensively used in the extra thick walled aluminium cabinet extrusion to minimise any cabinet resonance. Arena HighLine is supplied with flush mounting hardware as standard.

### TECH BRIEF\_

#### 300c\_

#### 500c\_

<b>Driver Complement</b>	4x75mm (3") LF/MF, 1x19mm (0.75") HF	1x100mm (4") DC, 1x100mm (4") LF
<b>Dispersion</b>	140 x 90 degrees	120 x 90 degrees
<b>Freq Range (-10dB)</b>	69Hz – 62kHz	83Hz – 54kHz
<b>Sensitivity (1W@1m)</b>	85dB (2.83V @ 8 Ohms)	88.5dB (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	103 (average), 109 (peak)	107 (average), 113 (peak)
<b>Rec. Amp Power</b>	120W	150W
<b>Weight</b>	5kg	6.5kg
<b>Dimensions (HxWxD)</b>	109mm x 590mm x 101mm (4.3" x 23.2" x 4")	149mm x 593mm x 124mm (5.7" x 23.3" x 4.9")

OVERVIEW\_

For installation requirements that demand a strong design statement, Arena's contemporary looks blend form and function superbly, this beautifully crafted design offers much more than elegant styling. Ideally suited to fashionable hotel receptions, stylish restaurants or bars, luxurious boardrooms or chic cafés, the exceptional acoustic performance combines with application flexibility to deliver a system that defines the category.



DESCRIPTION\_

Available in black, the Arena system comprises two satellite speaker options which can be configured in various multiple speaker options, partnered with other sub woofers and system controllers. Arena satellite option has a single 5" Dual Concentric™ driver. The twin driver option has been equipped with a supplementary bass driver to augment power handling. The rigid acoustic shell, robustly constructed in cast aluminium, provides full acoustic optimisation of the drive units. Both models are magnetically shielded to eliminate colour fringing effects when placed close to a television.

TECH BRIEF\_

SINGLE DRIVER SATELLITE \_ TWIN DRIVER SATELLITE \_

<b>Driver Complement</b>	100mm (4.5") Dual Concentric™	1 x 100mm (4.5") DC / 1 x 100mm (4.5") Bass driver
<b>Dispersion</b>	120 degrees	90 x 120 degrees
<b>Freq Range (-10dB)</b>	-	-
<b>Sensitivity (1W@1m)</b>	83dB (2.83V @ 8 Ohms)	85dB (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	101 (average), 107 (peak)	104 (average), 110(peak)
<b>Rec. Amp Power</b>	120W	150W
<b>Weight</b>	2.5kg	4.0kg
<b>Dimensions (HxWxD)</b>	187mm x 133.5mm x 175.5mm (7.4" x 5.3" x 6.9")	133mm x 245mm x 149mm (5.2" x 9.6" x 5.9")

ARENA HARDWARE

OVERVIEW\_

Designed to fit exactly to the shape of the satellite units, there are two bracket options available – one for the single driver unit and one for the twin. Available in black to match the speakers, they form an elegant install solution.



Single driver satellite bracket



Twin driver satellite bracket

ACCESSORIES	OPTIONAL
ARENA	WALL / TABLE MOUNT BRACKET
SINGLE DRIVER SATELLITE	●
TWIN DRIVER SATELLITE	●

DESCRIPTION\_

Versatile mounting platforms that enable a variety of room integration solution, the table / counter top stands for both of the satellite speaker options are fitted with a swivel mechanism allowing precise adjustment. The same stands are also equipped with a wall mounting plate and a carefully designed cable management system and finished in colours to match the product.

## DESCRIPTION\_

Tannoy is proud to introduce QFlex, a range of digitally steerable, multi-channel, array speaker systems for the professional install market. QFlex is designed as a complete solution for applications with difficult acoustics, such as houses of worship, transportation hubs, convention centres, conference facilities, shopping malls, performing arts centres and museums.



## DESCRIPTION\_

QFlex is quite revolutionary in that it is able to achieve even coverage and SPL which is maintained across the listening plane. QFlex is able to create an asymmetrical pattern which allows similar SPL's both in the near and far field. It is able to steer the beam away from surfaces that cause reflections to frequencies beyond 12kHz. This makes QFlex the first digitally steerable array to maintain music quality over the desired area of coverage, all in a very architecturally pleasing package. The intuitive BeamEngine GUI allows the designer to specify target areas. Based on those target areas a steering algorithm is generated and tailored for that specific area, rather than having to choose from a limited palette of opening and steering angles. See opposite page for more details.

## TECH BRIEF\_

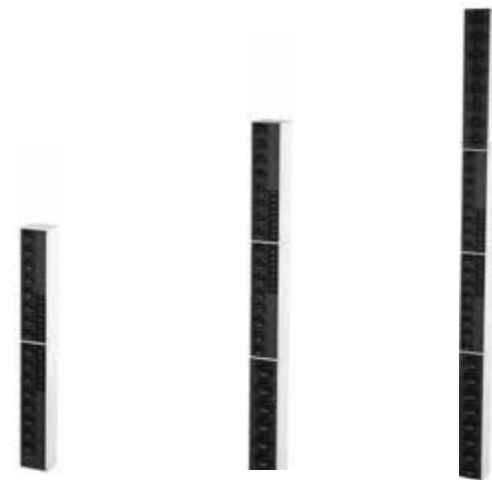
### QFLEX 8\_

### QFLEX 16\_

### QFLEX 24\_

<b>Driver Complement</b>	8 x 4" LF	8 x 3" LF / 8 x 1" HF	8 x 4" LF / 8 x 3" LF / 8 x 1" HF
<b>Dispersion</b>	120 degrees	120 degrees	120 degrees
<b>Freq Range (-10dB)</b>	110Hz - 4kHz	130Hz - 20kHz	110Hz - 20kHz
<b>Typical mounting distance**</b>	20m (66ft)	25m (82ft)	40m (131ft)
<b>Rated Max SPL</b>	92dB	94dB	96dB
<b>LF Beam Control Limit</b>	700Hz	700Hz	400Hz
<b>Weight</b>	15.25kg	14.25kg	26.25kg
<b>Dimensions (HxWxD)</b>	840mm x 171.5mm x 150mm (33.1" x 6.8" x 5.9")	744mm x 171.5mm x 150mm (29.3" x 6.8" x 5.9")	1483mm x 171.5mm x 150mm (58.4" x 6.8" x 5.9")

\*\* Based on mounting height of 10 metres and achieving 95dB SPL at the quoted distance.



## DESCRIPTION\_

While the basic models of QFlex 8 and QFlex 16 are standalone devices, the larger columns are built from a combination of these modular elements with a master device at the bottom and slaves above. The choice of model is determined by the specific project's requirement, but generally speaking, the higher the SPL required and over larger distances, the longer the QFlex array needs to be. The use of larger models also brings improved low frequency beam control, ranging from 700Hz with a single QFlex 16 down to just 200Hz with the QFlex 48. Unlike competitor's products, 's modular design rather than single complete assemblies means that the system can be expanded at a later date if required, without having to purchase a whole new array, not to mention making shipping a great deal less complicated. A custom designed mounting bracket is available to allow for easy wall-mounting and pivoting to the desired alignment, ensuring a tidy hassle-free installation and allowing for some flexibility in orientation without de-mounting the product.

## TECH BRIEF\_

### QFLEX 32\_

### QFLEX 40\_

### QFLEX 48\_

<b>Driver Complement</b>	16 x 3" LF / 16 x 1" HF	16 x 3" LF / 16 x 1" HF / 8 x 4" LF	16 x 4" LF / 16 x 3" LF / 16 x 1" HF
<b>Dispersion</b>	120 degrees	120 degrees	120 degrees
<b>Freq Range (-10dB)</b>	130Hz - 20kHz	110Hz - 20kHz	110Hz - 20kHz
<b>Typical mounting distance**</b>	50m (165ft)	70m (231ft)	80m (263ft)
<b>Rated Max SPL</b>	100dB	100dB	101.5dB
<b>LF Beam Control Limit</b>	400Hz	250Hz	200Hz
<b>Weight</b>	25.25kg	38.5kg	51.5kg
<b>Dimensions (HxWxD)</b>	1387mm x 171.5mm x 150mm (54.6" x 6.8" x 5.9")	2127mm x 171.5mm x 150mm (83.7" x 6.8" x 5.9")	2967mm x 171.5mm x 150mm (116.8" x 6.8" x 5.9")



## BEAM STEERING

### What does QFlex do that conventional loudspeakers cannot?

When faced with highly reverberant, acoustically challenging spaces, such as houses of worship or major transportation hubs; the biggest challenge is in designing a system which will deliver high direct to reverberant sound ratio. In other words, maximising the sound that arrives directly at the listener's ear, while avoiding reflective surfaces. Achieving this with conventional loudspeakers is extremely difficult, especially where there is a specific requirement to minimise architectural or aesthetic impact.

QFlex uses multiple channels of advanced amplification and DSP to produce highly controlled beams of acoustic energy, which are directed on user defined target areas. With this ability to focus acoustical output in target areas, comes better speech intelligibility in highly reverberant spaces.

### Critical Advantages of QFlex.

QFlex boasts state-of-the-art beam control, with the ability to steer by +/- 70 degrees at frequencies up to 12kHz. This means it's effective for full-range material rather than just being restricted to voice only applications. QFlex makes it possible to install a loudspeaker system in an acoustically difficult environment such as a church, which is incapable of delivering clear and intelligible audio, be it speech or musical performance, without having to compromise on speaker location. A single QFlex array can be located high above the sight lines of the audience for example, and steer multiple beams of acoustic energy down onto the desired areas.

### Features

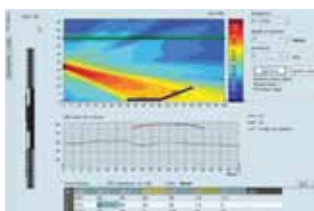
- Extremely intelligible speech and music reinforcement.
- Class leading steering control (+/- 70 degrees).
- Densely spaced transducers to defeat the effects of aliasing.
- Intuitive GUI.
- Integrated cutting edge DSP, network control and amplification.
- Networkable with other Tannoy VNET products.
- Unique digital filter structure for efficient implementation and low latency.
- Uses a powerful Regularized Least-Squares Multichannel Inversion algorithm for state-of-the-art beam control.
- Architecturally pleasing.



## QFLEX OFFERS ACOUSTIC DESIGNERS A GENUINE BREAKTHROUGH IN CAPABILITY WHEN IT COMES TO DEALING WITH REVERBERANT SPACES

### QFLEX BEAMENGINE™ SOFTWARE

The cornerstone of QFlex is in creating the 'steering files' used to program the steering characteristics of a given array. Thankfully, this is made very simply using the freely available BeamEngine™ software (available from Tannoy.com) We have developed a highly intuitive GUI which doesn't require a degree in acoustics to operate, and will achieve accurate and predictable results. BeamEngine™ is running a complex set of Matlab™ functions based on real measurement data.



# i SERIES RANGE

## OVERVIEW\_

The Tannoy i Series loudspeakers are slim cabinet column loudspeakers, designed for acoustically difficult applications where wide yet controlled coverage is required for high quality music and speech reinforcement. Available in charcoal or white, (silver for i9VP) each consists of direct radiating LF and titanium HF positioned as a line source.



\*i9VP Bracket included

## DESCRIPTION\_

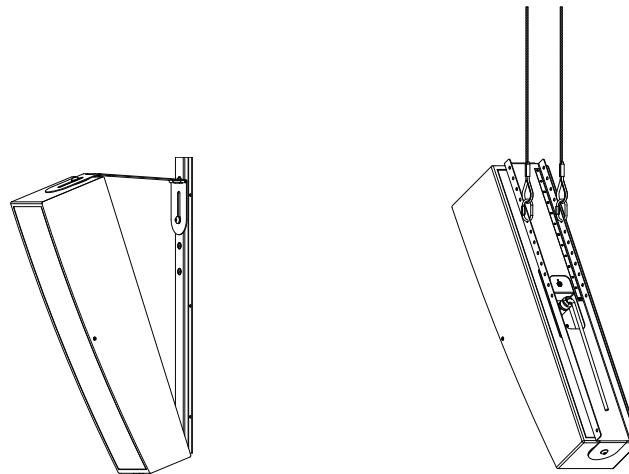
Tall and slim, these loudspeaker cabinets are equipped with direct radiating driver arrays arranged as a column, or line source. Designed for use in acoustically difficult applications where controlled coverage is required, the dispersion characteristics direct sound into the desired space while minimizing reflections from the ceiling. This makes them ideal for high quality music and speech reinforcement in highly reverberant environments ranging from houses of worship to retail environments and airports to conventions centres.

Versatile mounting brackets are available for i Series - a yoke and multiple angle bracket; both of which permit easy vertical, horizontal and tilt adjustment for mounting and flying applications. A dedicated secure mounting bracket is included with for the i9VP.

## TECH BRIEF\_

	i7_	i9_	i9VP (vandal proof)_
<b>Driver Complement</b>	4 x 100mm (4") LF / 1 x 25m (1") HF	4 x 130mm (5") MF / 3 x 25m (1") HF	4 x 130mm (5") MF / 3 x 25m (1") HF
<b>Dispersion</b>	110° x 50° (H x V)	120° x 40° (H x V)	120 deg (H) x 40 deg (V)
<b>Freq Range (-10dB)</b>	86Hz - 25kHz	60Hz - 40kHz	78Hz - 40kHz
<b>Sensitivity (1W@1m)</b>	89dB (2.83V @ 8 Ohms)	93dB (2.83V @ 8 Ohms)	88dB (1W @ 1m)
<b>Rated Max SPL</b>	108dB (average) 114dB (peak)	115dB (average) 121dB (peak)	(103dB - 30W Tapping on Transformer)
<b>Rec. Amp Power</b>	180W	300W	30W @ 100V
<b>Weight</b>	9kg	12.5kg	-
<b>Dimensions (HxWxD)</b>	572mm x 135mm x 173.8mm	779mm x 170mm x 990 x 200mm	-

# i SERIES HARDWARE



i RANGE	OPTIONAL ACCESSORIES	
	Yoke	Multi angle bracket
i7	•	•
i9	•	•

## OVERVIEW\_

Designed for a wide variety of sound reinforcement applications, fitting neatly into stair risers or stage fronts between 16.00" studs, the iS52 In-Stair loudspeaker is engineered for highly intelligible music or speech reproduction in houses of worship, theatres, auditoriums, etc.



ACCESSORY	OPTIONAL
iS52	BACK CAN
iS52	●

## DESCRIPTION\_

The slim two-way design uses two 100mm (4.00") LF and 25mm (1.00") titanium dome, neodymium magnet system HF units for enhanced efficiency and extended response; the combination producing a full bandwidth loudspeaker designed for high quality sonic performance with a smooth and controlled response for even coverage and optimum forward gain. The black painted finish plywood enclosure has a removable black powder-coated, perforated steel kick-proof grille.

A separate steel back can with multiple conduit knockouts is available as an optional accessory for installation versatility; including use in concrete or where a metal enclosure is required.

## TECH BRIEF\_

## iS52\_

<b>Driver Complement</b>	Dual Concentric™
<b>Dispersion</b>	120 degrees horizontal 90 degrees vertical
<b>Freq Range (-10dB)</b>	67Hz - 30kHz
<b>Sensitivity (1W@1m)</b>	88dB (2.45V @6 Ohms)
<b>Rated Max SPL</b>	109dB (average) 115dB (peak)
<b>Rec. Amp Power</b>	240W
<b>Weight</b>	6.5kg
<b>Dimensions (HxWxD)</b>	432mm x 146mm x 258.1mm (17" x 5.7" x 10.2")

## OVERVIEW\_

A high power handling, high sensitivity, full bandwidth rock speaker design primarily for outdoor use. The rugged and durable terra alba and fibreglass enclosure is weather, water marking and UV discolouration resistant, to IP64 specification. This, together with the integrated grille design, provides protection for the transducer from the elements, including rain, hail, sleet, snow and high salt content atmospheres.



## DESCRIPTION\_

Now available in three colours – Grey, Green and Sand - the natural rock-like appearance of the SR601T blends inconspicuously into most outdoor applications including gardens, patios, and architectural landscapes. To allow for multiple units to be installed in a distributed system, such as in theme parks, large civic gardens, etc. the SR601T has an integral low insertion loss 30W line transformer with an easily accessible rotary tapping switch to select between low impedance and 70V or 100V operation. Anchor points are also integrated into the design to allow for secure installation, even on uneven or inclined surfaces, or in areas subjected to high winds such as coastal locations. Equipped with Tannoy's exclusive ICT™ point source, constant directivity drive unit, the SR601T delivers an acoustic performance of outstanding clarity, definition and detail with class leading vocal intelligibility.

## TECH BRIEF\_

## SR601T\_

<b>Driver Complement</b>	1 x 153 (6") ICT
<b>Dispersion</b>	-
<b>Freq Range (-10dB)</b>	60Hz - 20kHz
<b>Sensitivity (1W@1m)</b>	87dB
<b>Rated Max SPL</b>	107dB (average) 110dB (peak)
<b>Rec. Amp Power</b>	60 W
<b>Weight</b>	4.5kg
<b>Dimensions (HxWxD)</b>	275mm x 295mm x 270mm (10.8" x 11.6" x 10.6")



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## PASSIVE SOUND REINFORCEMENT

Tannoy's highly versatile range of passive sound reinforcement loudspeakers have established a firm reputation across the world, renowned for their crisp, clear sonic character, exceptional transient response and highly controlled coverage. Designed to provide the optimal acoustic solution for practically any application; bars and nightclubs to houses of worship, sports arenas, performance venues, corporate AV and transport hubs, to name a few.

At the forefront of Tannoy's passive sound reinforcement line up is the award-winning VQ Series, a revolutionary range of highly directive, extremely efficient and exceptionally clear and detailed loudspeakers based on the latest point source driver technology and unique approach to horn design. Available as full-range enclosures or as modular components, with separate down-firing and LF devices, VQ Series represents the most significant leap forward in loudspeaker technology in years.

For small and mid-sized applications, the more compact V-Series remains a market leader. Equipped with Tannoy's legendary Dual Concentric™ drive units, V-Series offers the unmistakable Tannoy signature audio quality, in a robust and compact enclosure – equally at home in fixed install or in a live music environment as stage monitoring.

For those projects that demand something that looks as good as it sounds, there's Tannoy's Designer Install range. Available with either ICT™ or Dual Concentric™ drive units in a high impact polystyrene all-weather (IP64 rated) enclosure, DI Series is equally suited to a style bar or an outdoor waterpark.

# VQ SERIES

## OVERVIEW\_

A range of revolutionary loudspeakers designed for any application where precise directional control, outstanding sonic performance, efficiency and high SPL's are critical issues; such as large corporate AV systems, stadiums, large dance clubs, live concert halls, theatres, houses of worship and open-air venues.



## DESCRIPTION\_

The VQ 60 and VQ 100 are full range, three-way loudspeaker systems designed for applications which require very high output capability with class leading pattern control. The VQ range is perfectly suited for use in arrays or singly in demanding music or speech applications. Unlike line array and cluster solutions, a single VQ unit can produce more power and clarity over its specified beamwidth area than many arrayed solutions using multiple cabinets. The advantage of a point-source VQ system is consistent and accurate coverage of a given space without the multi-driver interference of clusters and line arrays. The reduced number of enclosures is also a great advantage in terms of ease of installation and building aesthetics.

## TECH BRIEF\_

### VQ 60\_

### VQ 100\_

<b>Driver Complement</b>	3-way full range – point source	3-way full range – point source
<b>Dispersion</b>	60 degrees conical	100 degrees conical
<b>Freq Range (-10dB)</b>	90Hz - 27kHz	90Hz - 27kHz
<b>Sensitivity (1W@1m)</b>	115dB (2.83V @ 8ohms)	110dB (2.83V @ 8ohms)
<b>Rated Max SPL</b>	138dB (average) 134dB (peak)	134dB (average) 140dB (peak)
<b>Rec. Amp Power</b>	400W into 8ohms	400W into 8ohms
<b>Weight</b>	77kg	65kg
<b>Dimensions (HxWxD)</b>	925mm x 694mm x 515mm (36.4" x 27.3" x 20.3")	925mm x 694mm x 515mm (36.4" x 27.3" x 20.3")



## DESCRIPTION\_

These additional horn enclosures have been designed to cater for a wide range of typical applications and offer some industry standard dispersion patterns, namely 40 degree (conical), 60 x 40 and 90 x 50 degree (in vertical position). The modular design approach allows the system designer to create seamless and very predictable arrays which are 'tight packed' to avoid any unsightly spaces between cabinets; or they can be used singly as part of large distributed systems. VQ MH devices address the requirement for compact dimensions without compromising performance in any way, thanks to our unique approach in keeping what is effectively a Dual Concentric behind a single horn, coupled to Tannoy's patented PSW™ technology.

## TECH BRIEF\_

### VQ 40MH\_

### VQ 64MH\_

### VQ 95MH\_

<b>Driver Complement</b>	2-Way Mid/High - Point Source	2-Way Mid/High - Point Source	2-Way Mid/High - Point Source
<b>Dispersion</b>	40 x 40 degrees	60 x 40 degrees	90 x 50 degrees
<b>Freq Range (-10dB)</b>	350Hz - 27kHz	350Hz - 27kHz	350Hz - 27kHz
<b>Sensitivity (1W@1m)</b>	117dB (2.83V @ 8ohms)	115dB (2.83V @ 8ohms)	111dB (2.83V @ 8ohms)
<b>Rated Max SPL</b>	140dB (average) 146dB (peak)	138dB (average) 144dB (peak)	134dB (average) 140dB (peak)
<b>Rec. Amp Power</b>	400W into 8ohms	400W into 8ohms	400W into 8ohms
<b>Weight</b>	46.5kg	45.5kg	35.5kg
<b>Dimensions (HxWxD)</b>	510mm x 694mm x 515mm (20.1" x 27.3" x 20.3")	510mm x 694mm x 515mm (20.1" x 27.3" x 20.3")	510mm x 694mm x 515mm (20.1" x 27.3" x 20.3")

OVERVIEW\_

The VQ 40DF (40x40), VQ 64DF (60x40) and VQ 85DF (80x50) are very high output down firing Mid/High loudspeaker systems designed for applications requiring high impact sound reinforcement with class leading pattern control. The modular design approach allows the sound system designer to create seamless and predictable arrays, or they can be used singly as part of large distributed systems.



DESCRIPTION\_

The VQ DF can be configured for use in Single-Amp or Bi-Amp mode, in conjunction with a suitable digital signal processor (DSP). Horn design involves balancing compromise.....until now.

Our unique approach in keeping what is effectively a Dual Concentric behind a single horn gives us many performance advantages. Performance of the VQ DF in terms of accuracy & sound quality is second to none. The VQ horn design principles provide definitive and measurable advantages over multiple-horn and co-axial designs.

TECH BRIEF\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Rec. Amp Power**  
**Weight**  
**Dimensions (HxWxD)**

VQ 40DF\_

2-Way Mid/High - Point Source  
 40 x 40 degrees  
 350Hz - 27kHz  
 112dB (2.83V @ 8 Ohms)  
 135dB average, 141dB peak  
 400W  
 32kg  
 460mm x 694mm x 497mm  
 (18.1" x 27.3" x 19.6")

VQ 64DF\_

2-Way Mid/High - Point Source  
 60 x 40 degrees  
 350Hz - 27kHz  
 111dB (2.83V @ 8 Ohms)  
 134dB (average), 140dB (peak)  
 400W  
 30.5kg  
 460mm x 694mm x 497mm  
 (18.1" x 27.3" x 19.6")

VQ 85DF\_

2-Way Mid/High - Point Source  
 80 x 50 degrees  
 350Hz - 27kHz  
 110dB (2.83V @ 8 Ohms)  
 134dB (average), 140dB (peak)  
 400W  
 28kg  
 460mm x 694mm x 497mm  
 (18.1" x 27.3" x 19.6")



DESCRIPTION\_

Duplicating the low frequency performance of the VQ 60 & VQ 100 full range loudspeakers, the VQ MB is intended for use as a flown or ground stacked, high power low/mid frequency module used in conjunction with full range or mid/high systems in the VQ series. Two (12") low frequency transducers, offer high power handling and low power compression for high continuous SPL capability. A newly designed LF loading design provides the highest possible sensitivity for low/mid frequency output (105dB/w).

The VS 15DR satisfies a specific requirement for applications where an installed VQ Series system needs to deliver more low-frequency response than is possible with simply the 2 x 12" LF element of the VQ MB. The VS 15DR shares the same modular enclosure format as the other VQ Series modules including the VQ MH, allowing the systems designer to create tightly packed arrays or clusters.

TECH BRIEF\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Rec. Amp Power**  
**Weight**  
**Dimensions (HxWxD)**

VQ MB\_

Mid Bass - Vented  
 -  
 90Hz - 600Hz  
 105dB (2.0V @ 4 Ohms)  
 135dB average, 141dB peak  
 2000W into 4 Ohms  
 37.0kg  
 433mm x 694mm x 515mm  
 (17" x 27.3" x 20.3")

VS 15DR\_

Bass loudspeaker - Direct radiator  
 -  
 38Hz - 4500Hz  
 100dB (1W = 2.83V for 8 Ohms)  
 130dB (average), 136dB (peak)  
 1200 - 2000 Watt / 8 Ohms  
 33kg  
 510mm x 694mm x 515mm  
 (20.1" x 27.3" x 20.3")

# V SERIES RANGE PASSIVE\_

## OVERVIEW\_

V Series is a range of powerful yet compact premium quality installation cabinets designed for a wide variety of sound reinforcement applications.



## DESCRIPTION\_

The sophisticated CAD designed waveguide in the Dual Concentric™ driver combines conical dispersion and excellent acoustic impedance characteristics. An inherent feature of this point source design is that clusters and arrays have minimal lobing, and this is achieved without the use of any electronic signal processing. These acoustic characteristics enable either vertical or horizontal mounting for single or multi-cabinet arrays without compromising sound quality.

These systems deliver extended frequency response with high sound pressure levels, extremely low distortion, outstanding clarity, crystal clear intelligibility, definition and detail.

## TECH BRIEF\_

### V6\_

### V8\_

### V12\_

<b>Driver Complement</b>	150mm (6") Dual Concentric™	200mm (8") Dual Concentric™	300mm (12") Dual Concentric™
<b>Dispersion</b>	90 degrees conical	90 degrees conical	90 degrees conical
<b>Freq Range (-10dB)</b>	75Hz - 45kHz	62Hz - 30kHz	55Hz - 38kHz
<b>Sensitivity (1W@1m)</b>	91dB (1W = 2.83V for 8 Ohms)	92dB (1W = 2.83V for 8 Ohms)	91dB (1W = 2.83V for 8 Ohms)
<b>Rated Max SPL</b>	111dB (average) 117dB (peak)	113dB (average) 119dB (peak)	120dB (average) 126dB (peak)
<b>Rec. Amp Power</b>	200W @ 8 Ohms	260W @ 8 Ohms	400W @ 8 Ohms
<b>Weight</b>	6.5kg	8.20kg	20kg
<b>Dimensions (HxWxD)</b>	388mm x 280mm x 275mm (15.3" x 11" x 10.8")	388mm x 280mm x 275mm (15.3" x 11" x 10.8")	486mm x 370mm x 375mm (19.1" x 11" x 10.8")



## DESCRIPTION\_

Available in black or white, the asymmetric cabinet profile is flexible and discreet in either fixed installations or on the road. Used as a low profile stage monitor, the conical coverage pattern gives the performer greater freedom of movement off axis than allowed by conventional horn loaded designs.

The cabinet profile allows flexible and discreet installation. As a foreground system, installation is made simple with a range of mounting hardware, designed specifically for the V series – or the systems can be flown using the integral M10 inserts. For portable stage use the cabinet has a recessed carrying handle and a blanking plate, which can be removed to install an optional pole mount.

## TECH BRIEF\_

### V12HP\_

### V15\_

### V300\_

<b>Driver Complement</b>	300mm (12") PowerDual™	380mm (15") PowerDual™	300mm (12") SuperrDual™
<b>Dispersion</b>	75 degrees conical	75 degrees conical	90 degrees conical
<b>Freq Range (-10dB)</b>	60Hz - 30kHz	58Hz - 30kHz	56Hz - 26kHz
<b>Sensitivity (1W@1m)</b>	99dB (1W = 2.83V for 8 Ohms)	100dB (1W = 2.83V for 8 Ohms)	98dB (1W = 2.83V for 8 Ohms)
<b>Rated Max SPL</b>	124dB (average) 130dB (peak)	126dB (average) 132dB (peak)	122dB (average) 128dB (peak)
<b>Rec. Amp Power</b>	700W	800W	500W
<b>Weight</b>	22kg	32kg	34kg
<b>Dimensions (HxWxD)</b>	486mm x 370mm x 375mm (19.1" x 11" x 10.8")	590mm x 450mm x 420mm (23.2" x 17.7" x 16.5")	590mm x 370mm x 375mm (23.2" x 14.6" x 14.8")



VQ SERIES TECHNOLOGY\_

**The Driver**

The VQ products utilize a unique driver technology to radiate a coherent single point source for superior dispersion control when coupled to our single horn. This advanced design aligns the acoustical centres of the transducers providing a single coherent wavefront emanating from the throat. The driver uses two concentric annular ring diaphragms. The larger of the two has a 3.5" voice coil and reproduces frequencies from 400Hz to 7 kHz. Another major advantage here is that there is no crossover anywhere near the vocal region ensuring the most natural and phase coherent reproduction at this critical area. The 2" HF diaphragm takes over at 7kHz to 22kHz by way of a passive or an active crossover. The external casting features extensive heat-sinking ensuring good heat transfer for high power handling and very low power compression.

**The Horn**

The use of a Dual Concentric™ compression driver results in a wavefront at the throat of the horn being perfectly coherent across its frequency range. The MF/HF transducer loads into a large and proprietary designed common horn. There is a huge advantage here in comparison to acoustic sources hither to used with horns which consist of an HF compression driver and a separate midrange compression driver, each with its own horn. Invariably there is interference between the midrange and high frequency at the crossover. This results in uneven off axis performance, even if the HF horn is mounted in front of the MF horn. This artefact is compounded even further if the sources are displaced on the front baffle – No exceptions.

We found that superior sonic performance of the horn was achievable by using MDF instead of fabricating in fibreglass, due to the inert nature of the structure providing rigidity, and the particular nature of the material itself being acoustically absorbent and not susceptible to resonance.

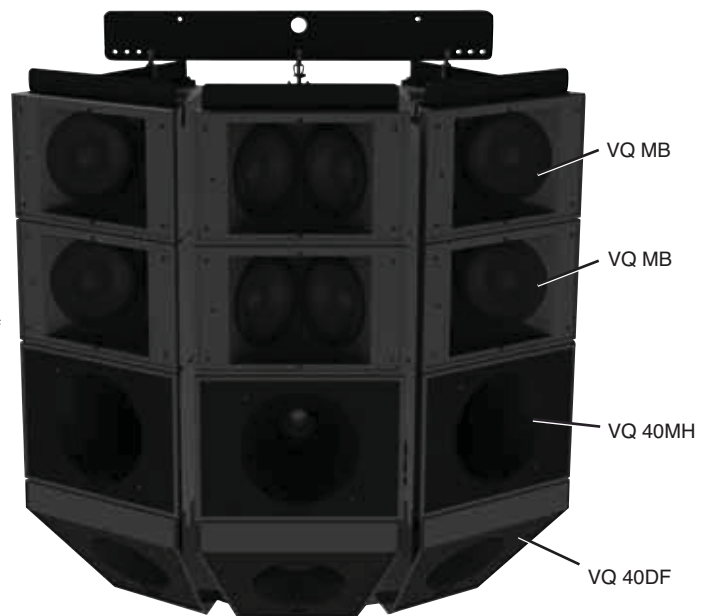
**Efficiency. Power. Clarity.**

VQ's very high sensitivity ensures exceptional SPL levels can be achieved with a very modest amount of amplifier power. As a benchmark example, a single VQ 60 enclosure will produce 115dB for 1 Watt; and a sustained 138dB (144dB peak) for only 200 Watts of amplifier power - with a tightly controlled 60° dispersion pattern above 800Hz delivering exceptionally even coverage and excellent clarity.

**Modular Design for Arrayed Systems**

Versatility is the key with VQ Series thanks to its modular and compact enclosure format. VQ Series' class leading pattern control radiating from a coherent single point source ensures predictable array performance allowing very accurate system design, thanks to our patented PSW waveguide. This modular design approach allows the designer to create tightly packed, scaleable arrays utilising combinations of VQ MH, DF, and MB elements.

Our easy to rig Flyware boasts an industry leading 10:1 safety factor for complete confidence and peace of mind.





## POWERED SOUND REINFORCEMENT

Tannoy's renowned sound reinforcement loudspeaker ranges include not just passive but also self-powered ranges, as well as advanced VNET™ products with leading edge digital signal processing, network control and Class D amplifier technologies onboard.

The firmly established V-Series product range is available in self-powered form in the shape of PowerV, while VNET™ packages are available on the 12" and 15" driver equipped products for more demanding, high performance applications.

Tannoy's newest sound reinforcement technology is represented by the award-winning VQ NET range – delivering the class-leading performance of VQ Series with the added benefit of the VNET™ package for complete versatility and ease of installation.

Also available in self-powered format is the Designer Install series, in the shape of the Di5a, perfectly suited to indoor applications where stylish appearance is a factor without compromising on sound quality.



TANNOY

# POWERV RANGE POWERED\_

## OVERVIEW\_

Efficiency and performance are clearly top of the list of advantages offered by these self-powered loudspeakers. By eliminating speaker cables and tailoring the signal processing and amplifiers to the combined driver / enclosure system response, POWERV™ offers increased output and reduced distortion for each watt expended.



## DESCRIPTION\_

Delivering impressive levels of accuracy and performance, all POWERV™ loudspeakers are equipped with highly efficient, flexible and reliable Class D power amplification incorporating switching power supplies. The amplifier section and power supply were developed simultaneously and therefore optimally matched to minimise noise and enhance stability.

## TECH BRIEF\_

### POWERV6\_

### POWERV8\_

### POWERV12\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Power Rating**  
**Weight**  
**Dimensions (HxWxD)**

150mm (6") Dual Concentric™  
 90 degrees conical  
 75Hz – 45kHz  
 91dB (1W = 2.83V for 8 Ohms)  
 111dB (average) 117dB (peak)  
 200W @ 8 Ohms  
 6.5kg  
 334mm x 250mm x 235mm  
 (13.4" x 9.8" x 9.3")

200mm (8") Dual Concentric™  
 90 degrees conical  
 62Hz – 30kHz  
 92dB (1W = 2.83V for 8 Ohms)  
 113dB (average) 119dB (peak)  
 260W @ 8 Ohms  
 8.20kg  
 388mm x 280mm x 275mm  
 (15.3" x 11" x 10.8")

300 (12") Dual Concentric™  
 90 degrees conical  
 55Hz – 38kHz  
 97dB (1W = 2.83V for 8 Ohms)  
 120dB (average) 126dB (peak)  
 400W @ 8 Ohms  
 20kg  
 486mm x 370mm x 375mm  
 (19.1" x 14.6" x 14.8")



## DESCRIPTION\_

The power module combines light, efficient and cool-running amplification, comprehensive driver protection and equalisation into a single compact unit.

Clean, undistorted sound is delivered, even when driven at very high power levels. No cooling fans are required so the system runs quietly and is not prone to internal dust contamination. The POWERV™ system capitalises on the integrated design concept as every component part and their interaction is fully optimised. All signal processing functions have been precisely tailored; crossover frequencies and slopes, EQ, phase corrections and limiting.

## TECH BRIEF\_

### POWERV12 HP\_

### POWERV15\_

**Driver Complement**  
**Dispersion**  
**Freq Range (-10dB)**  
**Sensitivity (1W@1m)**  
**Rated Max SPL**  
**Power Rating**  
**Weight**  
**Dimensions (HxWxD)**

300m (12") PowerDual™  
 75 degrees conical  
 62Hz – 28kHz  
 99dB (1W = 2.83V for 8 Ohms)  
 124dB (average) 130dB (peak)  
 700W @ 8 Ohms  
 22kg  
 486mm x 370mm x 375mm  
 (19.1" x 14.6" x 14.8")

380mm (15") PowerDual™  
 75 degrees conical  
 47Hz – 26kHz  
 100dB (1W = 2.83V for 8 Ohms)  
 126dB (average) 132dB (peak)  
 800W @ 8 Ohms  
 32kg  
 590mm x 450mm x 420mm  
 (23.2" x 17.7" x 16.5")

OVERVIEW

The Dual Concentric™ point source, constant directivity drive unit integrates with digital signal processing, network control and Class D amplification to create loudspeakers designed to form the complete sound reinforcement installation solution.



DESCRIPTION

The integration of the Dual Concentric™ point source, constant directivity drive unit with leading edge digital signal processing, network control and Class D amplifier technologies ensure these high definition sound reinforcement (HDSR™) loudspeakers provide a fully monitored active system; a complete turnkey solution for the most demanding sound reinforcement applications. By taking the modular approach, where all the main system elements are designed into each loudspeaker, the amplifiers, processing, monitoring and drivers have all been optimised to perform as a unified whole. The resulting package of intuitive user setup, integrated processing, tuning control, performance diagnostics and protection produces an exceptionally high performance networkable loudspeaker that is easy to install.

TECH BRIEF

	VNET12	VNET12 HP	VNET15	VNET300
<b>Driver Complement</b>	300 (12") Dual Concentric™	300mm (12") PowerDual™	380mm (15") PowerDual™	300mm (12") SuperDual™
<b>Dispersion</b>	90 degrees conical	75 degrees conical	75 degrees conical	90 degrees conical
<b>Freq Range (-10dB)</b>	55Hz – 38kHz	50Hz – 28kHz	40Hz – 26kHz	45Hz – 28kHz
<b>Sensitivity (1W@1m)</b>	-	-	-	-
<b>Rated Max SPL</b>	120dB (average) 126dB (peak)	124dB (average) 130dB (peak)	126dB (average) 132dB (peak)	122dB (average) 128dB (peak)
<b>Power Rating</b>	400W	700W	800W	500W
<b>Weight</b>	21kg	29kg	33kg	35kg
<b>Dimensions (HxWxD)</b>	486mm x 370mm x 360mm (19.1" x 14.6" x 14.8")	486mm x 370mm x 360mm (19.1" x 14.6" x 14.8")	590mm x 450mm x 420mm (23.2" x 17.7" x 16.5")	590mm x 370 x 360mm (23.2" x 14.6" x 14.2")

VNET ACCESSORIES

(A)



(B)



(D)



(C)



DESCRIPTION			TECH BRIEF	
USB & RS232	POWER SUPPLY	MOUNT KIT	VNET SC1	
<p><b>Tannoy VNet™ usb and RS232 interface</b></p> <p>This rack mountable interface allows communication between a VNET™ network and computer.</p> <p>(A)</p>	<p><b>Tannoy VNet™ accessory power supply</b></p> <p>This power supply unit is only required when communication with a VNET™ network is by RS232</p> <p>(B)</p>	<p><b>Tannoy VNet™ accessory rack mount kit</b></p> <p>This 1U bracket allows the mounting of up to three VNET™ interface accessories in a standard 19" equipment rack.</p> <p>(C)</p>	<p><b>Inputs</b></p> <p><b>Outputs</b></p> <p><b>Sample rate / bit depth</b></p> <p><b>Frequency Response</b> (+/- 3dB with filters disabled)</p> <p><b>Frequency Response</b> (+/- 0.5dB with filters disabled)</p> <p><b>LP / HP filter types</b> (D)</p>	<p>Two x XLR</p> <p>Six x XLR</p> <p>96kHz / 24 bit</p> <p>10Hz – 40kHz</p> <p>20Hz – 20Hz</p> <p>12, 18 &amp; 24dB/octave Bessel and Butterworth 12, 24 and 48dB/octave Linkwitz Riley 4th or 8th order Hardman</p>

# VQ NET

## OVERVIEW\_

Boasting the same capability and class leading pattern control as VQ, the VQ NET range incorporates cutting edge digital signal processing, network control and dual channel Class amplification. The modular approach of amplifiers, processing, monitoring and drivers designed into each VQ NET loudspeaker enables acoustic optimization for the speaker to perform as a unified whole.



## DESCRIPTION\_

The intuitive setup software, integrated processing, tuning control, performance diagnostics and protection produces an easy to install and exceptionally high performance networkable loudspeaker. VNET™ supports free network topology so that the loudspeakers can be arranged in a daisy chain, linked in a star configuration or in any combination of both.

System commissioning and ongoing venue network control, incorporating real time diagnostics of electronics and drive unit, are all managed by the exclusive VNET™ software package. Supplied with each VQ NET unit, this intuitive Windows tool controls all of the critical install, commissioning and performance monitoring functions.

## TECH BRIEF\_

### VQ NET 60\_

### VQ NET 100\_

<b>Driver Complement</b>	3-way full range – point source	3-way full range – point source
<b>Dispersion</b>	60 degrees conical	100 degrees conical
<b>Freq Range (-10dB)</b>	90Hz - 27kHz	90Hz-27kHz
<b>Sensitivity (1W@1m)</b>	115dB	110dB
<b>Rated Max SPL</b>	138dB (average) 144dB (peak)	134dB (average) 140dB (peak)
<b>Power Rating</b>	400W MF/HF, 800W LF	400W MF/HF, 800W LF
<b>Weight</b>	80kg	68kg
<b>Dimensions (HxWxD)</b>	925mm x 694mm x 515mm (36.4" x 27.3" x 20.3")	925mm x 694mm x 515mm (36.4" x 27.3" x 20.3")



## DESCRIPTION\_

Integrated with cutting edge digital signal processing, network control and dual channel Class D amplification, the VQ NET 40MH (40x40), VQ NET 64MH (60x40) and VQ NET 95MH (90x50) are very high output Mid/High loudspeaker systems designed for applications requiring high impact sound reinforcement over large distances with class leading pattern control. The modular design approach allows the sound system designer to create seamless and predictable arrays, or they can be used singly as part of large distributed systems. VQ MH addresses the requirement for compact dimensions without compromising performance in any way.

## TECH BRIEF\_

### VQ NET 40MH\_

### VQ NET 64MH\_

### VQ NET 95MH\_

<b>Driver Complement</b>	Dual Concentric™ Compression driver	Dual Concentric™ Compression driver	Dual Concentric™ Compression driver
<b>Dispersion</b>	40 degrees conical	60 x 40 degrees	90 x 50 degrees
<b>Freq Range (-10dB)</b>	350Hz - 27kHz	350Hz - 27kHz	350Hz - 27kHz
<b>Sensitivity (1W@1m)</b>	-	-	-
<b>Rated Max SPL</b>	140dB (average) 146dB (peak)	138dB (average) 144dB (peak)	134dB (average) 140dB (peak)
<b>Power Rating</b>	400W MF / 200W HF	400W MF / 200W HF	400W MF / 200W HF
<b>Weight</b>	TBA	48.5kg	39kg
<b>Dimensions (HxWxD)</b>	510mm x 694mm 515mm (20.1" x 27.3" x 20.3")	510mm x 694mm 515mm (20.1" x 27.3" x 20.3")	510mm x 694mm 515mm (20.1" x 27.3" x 20.3")

OVERVIEW\_

Integrated with cutting edge digital signal processing, network control and dual channel Class D amplification, the VQ NET 40DF (40x40), VQ NET 64DF (60x40) and VQ NET 85DF (80x50) are very high output down firing Mid/High loudspeaker systems designed for applications requiring high impact sound reinforcement with class leading pattern control.



DESCRIPTION\_

Each VQ NET DF incorporates a unique driver technology to radiate a coherent single point source for superior dispersion control when coupled to a PSW™ (Point Source Waveguide). This advanced design aligns the acoustical centres of the transducers providing a single coherent wavefront emanating from the throat. The PSW™ waveguide achieves an optimum balance of extremely well controlled coverage, smooth frequency response, and natural sound character. The modular approach of amplifiers, processing, monitoring and drivers designed into each loudspeaker enables acoustic optimization for the speaker to perform as a unified whole. The intuitive setup software, integrated processing, tuning control, performance diagnostics and protection produces an easy to install and exceptionally high performance networkable loudspeaker.

TECH BRIEF\_

VQ NET 40DF\_

VQ NET 60DF\_

VQ NET 85DF\_

<b>Driver Complement</b>	Dual Concentric™	Dual Concentric™	Dual Concentric™
<b>Dispersion</b>	40 degrees conical	60 x 40 degrees	80 x 50 degrees
<b>Freq Range (-10dB)</b>	350Hz-27kHz	350Hz-27kHz	350Hz-27kHz
<b>Sensitivity (1W@1m)</b>	-	-	-
<b>Rated Max SPL</b>	135dB (average) 141dB (peak)	134dB (average) 140dB (peak)	133dB (average) 139dB (peak)
<b>Power Rating</b>	400W MF / 200W HF	400W MF / 200W HF	400W MF / 200W HF
<b>Weight</b>	32kg	32.5kg	31kg
<b>Dimensions (HxWxD)</b>	460mm x 694mm x 497mm (18.1" x 27.3" x 19.6")	460mm x 694mm x 497mm (18.1" x 27.3" x 19.6")	460mm x 694mm x 497mm (18.1" x 27.3" x 19.6")



DESCRIPTION\_

The VQ NET MB is principally intended for use with VQ systems to construct arrays with extended low frequency pattern control. By fixing a VQ NET MB at the opposing end of a VQ full range loudspeaker we can effectively extend pattern control to below the cutoff point of the Mid/High PSW™ waveguide. By offsetting the devices using delay we can also steer the low frequency lobe. The VQ NET MB can be used to extend the bandwidth of any VQ Mid/High product whether singly or as part of an array.

The VNET 15DR satisfies a specific requirement for applications where an installed VQ Series system needs to deliver more low-frequency response than is possible with simply the 2 x 12" LF element of the VQ MB. The VNET 15DR shares the same modular enclosure format as the other VQ Series modules including the VQ MH, allowing the systems designer to create tightly packed arrays or clusters.

TECH BRIEF\_

VQ NET MB\_

VNET 15DR\_

<b>Driver Complement</b>	2 x 300mm (12") LF	1 x 380mm (15") Bass Driver
<b>Dispersion</b>	-	-
<b>Freq Range (-10dB)</b>	90Hz - 600Hz	38Hz - 4500Hz
<b>Sensitivity (1W@1m)</b>	-	-
<b>Rated Max SPL</b>	135dB average, 141dB peak	130dB (average), 136dB (peak)
<b>Power Rating</b>	2000W	1200W
<b>Weight</b>	41kg	36kg
<b>Dimensions (HxWxD)</b>	433mm x 694mm x 515mm (17" x 27.3" x 20.3")	510mm x 694mm x 515mm (20.1" x 27.3" x 20.3")

ARC Pavilion  
University of California Davis Campus  
(VQ Series)







# K & M HARDWARE

## OVERVIEW\_

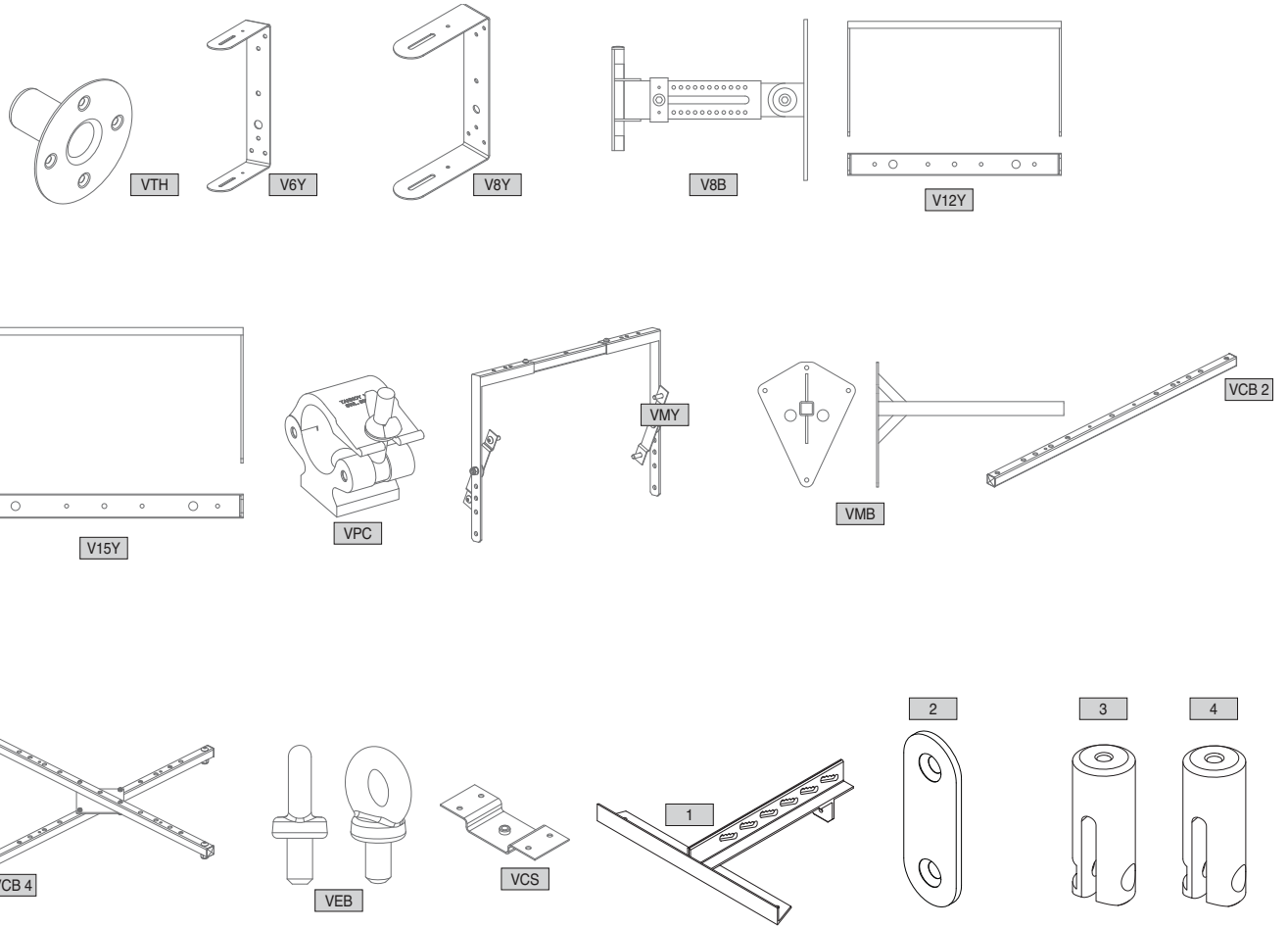
Versatile hardware for V series speakers manufactured by K&M in Germany to VGB C1 specifications.



	BRACKETS	ACCESSORIES
i RANGE	Wall Mount Bracket	Pole Mount Adapter
i7	•	•
i9	•	•



V RANGE	BRACKETS		ACCESSORIES	
	Yoke (Horizontal Installation)	Yoke (Vertical Installation)	Multi Angle Wall Mount	Wall Mount Extension
V6	•		•	•
V8	•	•	•	•
V12	•	•		
V12 HP	•	•		
V15	•	•		
V300	•	•		
POWER V6	•			
POWER V8	•	•		
POWER V12	•	•		
POWER V12 HP	•	•		
POWER V15	•	•		
VNET 12	•	•		
VNET 12 HP	•	•		
V NET 15	•	•		
VNET 300	•	•		



RANGE	BRACKETS								ACCESSORIES								
	V6Y	V8Y	V8B	V12Y	V15Y	VMY	VMB	1	VCB 2	VCB 4	VEB	VCS	VTH	VPC	2	3	4
V6 / POWER V6	•		•						•	•		•		•			
V8 / POWER V8		•	•						•	•	•	•	•	•			
V12 / VNET 12				•		•	•				•	•	•	•			
POWER V12						•	•				•	•	•	•			
V12HP / VNET 12HP				•		•	•				•	•	•	•			
V15					•	•	•				•	•	•	•			
VNET 15																	
V300 / VNET 300					•	•	•				•	•	•	•			
VS10 BP											•		•				
VS15 BP / VNET 15BP											•		•				
VS15 HL / VNET 15HL											•		•				
VS18 DR / VNET 18DR											•		•				
VQ SERIES								•			•				•	•	•



## LIVE / RENTAL SOUND

Tannoy's industry-leading expertise in sound reinforcement loudspeaker technology is equally at home in a live sound environment as it is within installed sound applications. The recent development of the VQ Live system, derived from the same ground-breaking innovations found in VQ Series install range, has put Tannoy right at the forefront of live sound point-source loudspeaker solutions.

Available as a scalable system of highly portable and easy to set-up powered tops and high powered subwoofer enclosures, VQ Live offers an entirely new alternative to rental companies in the medium scale segment of the touring sound market, delivering unheralded clarity, directivity and SPL with far fewer boxes than a typical line array system.

For less demanding applications, Tannoy's PowerV range of powered pole-mountable dual concentric driver equipped loudspeaker enclosures are a tried and tested solution for small scale live sound reinforcement or on-stage monitoring.

## OVERVIEW\_

Offering significant and tangible benefits over many existing solutions: sonic superiority, less boxes required, lower costs and full VNET implementation (allowing system setup and ongoing venue network control, incorporating real time diagnostics), VQ LIVE has the potential to be a true line array killer.



## DESCRIPTION\_

The VQ NET 60 LIVE is a full range, three-way loudspeaker system designed for rental/hire applications which require very high output capability with class leading pattern control. Integrated with cutting edge digital signal processing, network control and dual channel Class D amplification, the system is perfectly suited for use in arrays or singly in wide range of demanding situations. Each VQ NET 60 LIVE comes with 'easy-lock' wheel-board ('dolly') for easy transit on/off site as well as refined ergonomic handle grips. The cabinet design allows for side-by-side rigging and flying with the dedicated hardware (optional). Each unit also comes with protective transit covers.

## TECH BRIEF\_

### VQ NET 60 LIVE

<b>Driver Complement</b>	3-way full range – point source
<b>Dispersion</b>	60 degrees conical
<b>Freq Range (-10dB)</b>	90Hz - 27kHz
<b>Rated Max SPL</b>	(LF) 134dB average, 140dB peak (MF/HF) 138dB average, 144dB peak
<b>Power Rating</b>	400W MF/HF, 800W LF
<b>Weight</b>	86.5kg (98.5kg with dolly)
<b>Dimensions (HxWxD)</b>	925mm x 620mm x 502mm (36.4" x 24" x 19.7")



## DESCRIPTION\_

This direct radiating dual 18" subwoofer cabinet is designed to partner VQ LIVE full range touring loudspeakers, the VNET 218DR LIVE is perfect for applications where increased headroom is required for high definition sound reinforcement at low and ultra low frequencies. Extending the frequency response of the system down to 31Hz makes the VNET 218DR LIVE ideal for effects in live music performances in a multitude of environments including open-air, arena and theatres as well as large dance club and concert sound applications.

## TECH BRIEF\_

### VNET 218DR LIVE

<b>Driver Complement</b>	2 x 458mm (18") Horn loaded
<b>Freq Range (-10dB)</b>	24Hz - 1.5kHz
<b>Rated Max SPL</b>	137dB (average) 143dB (peak)
<b>Power Rating</b>	2500W
<b>Weight</b>	110kg
<b>Dimensions (HxWxD)</b>	700mm x 1050mm x 850mm (27.6" x 41.3" x 33.5")

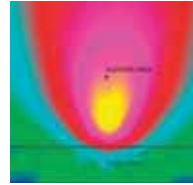
## COMPARATIVE EASE SIMULATION OF VQ SERIES AND LINE ARRAY\_

To illustrate the highly controlled and predictable SPL coverage of VQ Series technology (in this case a single VQ 60) and offer a comparison with a typical 4 enclosure line array system, the following EASE simulation plots were generated. The room used for the simulation is 30m deep (from stage to rear wall) and 40m wide. The stage area has an upstage to down stage distance of 8m.

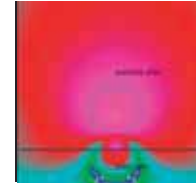
Both the VQ and the Line Array enclosures were placed 5m above floor level in line with the front of the stage area. The angle used between the enclosures for the line array is from horizontal to the top enclosure 8.5 degrees, between the top and the second enclosure is 2 degrees, between the second and third is degrees and between the third and the fourth is 10 degrees.

The coverage maps consider the anticipated direct SPL at the following spot frequencies: 500 Hz, 1 kHz, 2 kHz, and 4kHz across the audience listening area and the stage area.

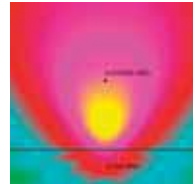
Note the scattering effect to the sides of the audience space in the higher frequency ranges, particularly in the near-field area close to the stage, that line array systems are prone to suffering from. In contrast, the VQ system maintains constant directivity and SPL coverage throughout the frequency range – all with just a single box.



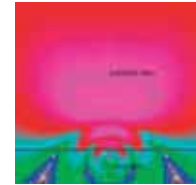
VQ60 @ 500Hz



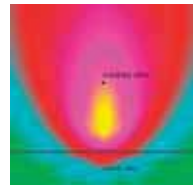
4 box array @ 500Hz



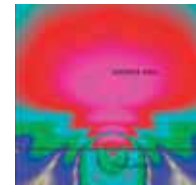
VQ60 @ 1kHz



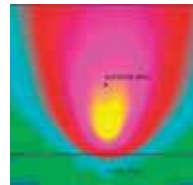
4 box array @ 1kHz



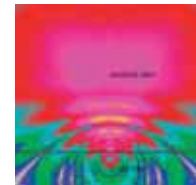
VQ60 @ 2kHz



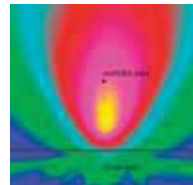
4 box array @ 2kHz



VQ60 @ 4kHz



4 box array @ 4kHz



VQ60 @ 8kHz



4 box array @ 8kHz







## AMPS / CONTROL

The three high power amplifiers and two exceptionally flexible digital system controllers in this category are ideally suited to applications ranging from fixed installations to cost-effective live sound systems. Specifically designed and optimised for Tannoy loudspeaker products they enable quick and easy high performance system integration.

In addition there is a range of interface and power supply accessories designed for use with the VNET™ range of loudspeakers.

OVERVIEW\_

The TA Series of power amplifiers from Tannoy is a compact and versatile line of three professional power amplifiers ranging from 450 to 1050 watts into 2 Ohms, all using conventional toroid iron transformers. To achieve a compact design of 325mm (13.00") deep and 2 rack units high, the latest semiconductor technology is utilised, together with a sophisticated copper cooling system.



DESCRIPTION\_

The sonic performance inherent in all Tannoy professional products, allied to comprehensive features, ensure these amplifiers are ideally suited to all situations from fixed installations to cost-effective live sound systems. Pioneering work on Electro Magnetic Compatibility (EMC) has led to an advanced chassis design, within the Tannoy TA series. Incorporating a sandwich construction of different iron materials minimises the magnetic hum field; avoiding issues inherent in conventional toroidal and C-core types of iron transformers have always been a cause of hum problems in power amplifier racks where they tend to interfere with more sensitive circuits in, for example, equalizers and active crossovers.

TECH BRIEF\_

TA600\_

TA1000\_

TA1400\_

<b>Maximum output</b> (EIA @ 1kHz and 1% THD)	8 Ohms per channel 190W 4 Ohms per channel 300W 2 Ohms per channel 450W 8 Ohms bridged 600W 4 Ohms bridged 900W	8 Ohms per channel 300W 4 Ohms per channel 500W 2 Ohms per channel 700W 8 Ohms bridged 1000W 4 Ohms bridged 1400W	8 Ohms per channel 425W 4 Ohms per channel 700W 2 Ohms per channel 1050W 8 Ohms bridged 1400W 4 Ohms bridged 2100W
<b>Distortion</b> (THD 20Hz – 20kHz @ 1W to full power)	0.07%	0.07%	0.07%

TDX 1

OVERVIEW\_

The TDX1 is a '2 in 4 out', powerful, digital system controller, which features Crossover, EQ, Delay and Limiting functions. The superior audio quality of this feature packed unit offers installers and contractors a competitively priced, yet highly versatile solution for flexible system configuration and optimizing the performance of Tannoy loudspeaker systems. Ideally suited to fixed installations and live applications, the TDX1 combines the functions of multiple conventional products in a compact 1U of rack space.



DESCRIPTION\_

Presets for the most common configurations of the Tannoy product ranges are preloaded in to the TDX1, with a further 100 provided to allow other custom configurations to be programmed. Each input has gain control and 4 bands of parametric EQ with band 1 and 4 offering settings for LF and HF shelving response. The unique routing engine will allow any input to be sent to any output. Butterworth, Bessel and Linkwitz Riley type filters are available on all outputs, which can be configured as 2, 3 or 4-way crossovers. All output channels feature an independent speaker alignment delay (200 ms per channel) and a 4 band parametric EQ for speaker management. Four high performance limiters offer a wide range of control over Attack, Release and Threshold parameters. Two input and four output balanced XLR sockets. SPDIF digital input (44.1 or 48kHz) allowing the signal to be kept in the digital domain. Simple and intuitive signal flow based interface with clear 2 x 16 character backlit LCD.

TECH BRIEF\_

TDX1\_

<b>Balanced inputs</b>	Two x XLR
<b>Impedance, bal / unbal</b>	21k Ohms / 13k Ohms
<b>Input level, max / min @ 0dBFS</b>	+24dBu / 0dBu
<b>Sensitivity range @ 12dB headroom</b>	-12dBu to +12dBu
<b>A to D conversion</b>	24 bit, 128 x oversampling bitstream
<b>Balanced outputs</b>	Four x XLR
<b>Impedance, bal / unbal</b>	40 Ohms / 20 Ohms
<b>Max output level</b>	+14dBu
<b>D to A conversion</b>	24 bit, 128 x oversampling bitstream



# VNET SC1

## OVERVIEW\_

In its basic configuration the Tannoy VNET SC1 is a powerful '2 in 6 out' digital system controller which provides multiple X-Over, EQ, Delay and Limiting options. Using DSP-based digital crossovers with 96kHz sampling rates, this versatile controller will enable simple configuration and optimisation of loudspeakers in terms of speaker management and room EQ functionality.



## DESCRIPTION\_

Two versions of the VNET SC1 are available – one with a VNET™ network card and one without; offering a competitively priced, yet highly versatile solution for flexible system configuration and optimising the performance of loudspeaker systems. Any of the inputs (A, B, or sum) can be routed to any output with the unique routing engine of the VNET SC1. The universal switch mode power supply automatically adapts to mains voltages from 85 to 240 volts.. The 'network enabled' version facilitates VNET™ networking capability with two network ports provided for connection to any Tannoy VNET™ system. Set up of the unit is exceptionally simple thanks to the intuitive signal flow based interface, or it can be controlled from a PC with Tannoy's standard VNET™ software

## TECH BRIEF\_

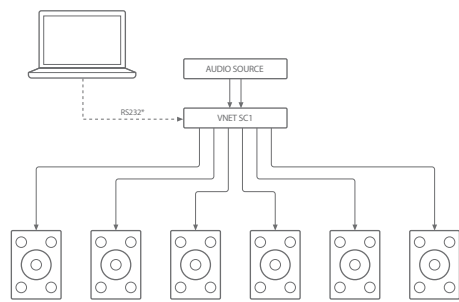
## VNET SC1\_

<b>Inputs</b>	Two x XLR
<b>Outputs</b>	Six x XLR
<b>Sample rate / bit depth</b>	96kHz / 24 bit
<b>Frequency response</b> (+/- 3dB with filters disabled)	10Hz – 40kHz
<b>Frequency response</b> (+/- 0.5dB with filters disabled)	20Hz – 20Hz
<b>LP / HP filter types</b>	12, 18 & 24dB/octave Bessel and Butterworth 12, 24 and 48dB/octave Linkwitz Riley 4th or 8th order Hardman

# INSTALLING VNET SC1

## INSTALLING THE VNET SC1\_

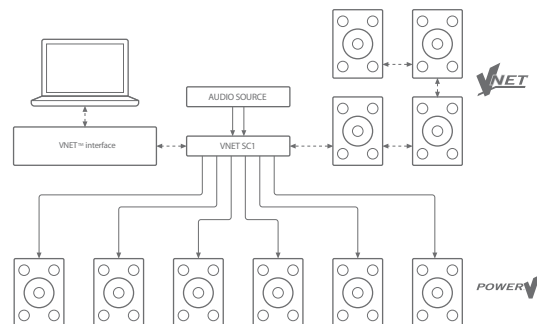
**Using a Tannoy VNET SC1 with a powered loudspeaker system**  
(e.g. Tannoy POWERV™)



\* The VNET™ interface allows networking of multiple VNET™ speakers or SC1 controllers

KEY Network connection  $\longleftrightarrow$   
Audio connection  $\longleftrightarrow$

**Using a network enabled VNET SC1 to combine an existing Tannoy VNET™ system with another loudspeaker system**  
(e.g. Tannoy POWERV™)



\* The VNET™ interface allows networking of multiple VNET™ speakers or SC1 controllers

KEY Network connection  $\longleftrightarrow$   
Audio connection  $\longleftrightarrow$

## VNET™ NETWORKING

Interconnection between the network computer and the speakers is very straightforward using twisted pair cable and simple connectors. The RS485 interface operates on a shared bus so that a single computer can control any amplifier on the bus; enabling it to also gather status information from any device on that bus. Each VNET™ module contains a unique address so that no user input will be required to configure network nodes.

Every VNET™ loudspeaker controls its own DSP functions, so any unforeseen failure would be isolated to only that particular 'node'. As only data to control setup functions and ongoing system diagnostics is carried over the network audio will be delivered. RS-485 cable is used for sending serial data, using a twisted pair to send and receive information to a high number of nodes over very long distances. This differential signal is very robust, while RS-485 is one of the most popular communications methods used in industrial applications where its noise immunity and long-distance capability are a perfect fit.

VNET™ supports 'Free Network Topology', allowing cabinets to be 'daisy chained', linked in a 'star' configuration or in any combination of both. Network connections between nodes are via high quality, rugged Neutrik 'ethercon' connectors, which are compatible with standard RJ45 plugs. Node connections are made using standard RJ45 connectors and CAT5 cable. Speakers identified on the network set up screen have factory default names, which can be edited by the user to reflect their actual location on the network. They can be physically located on the network by selecting the 'Flash' function to activate an LED mounted on the front of the loudspeaker.

## VNET™ SOFTWARE

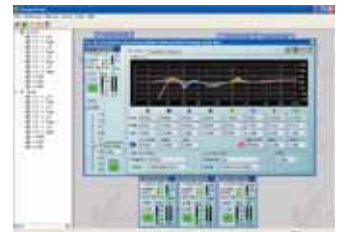
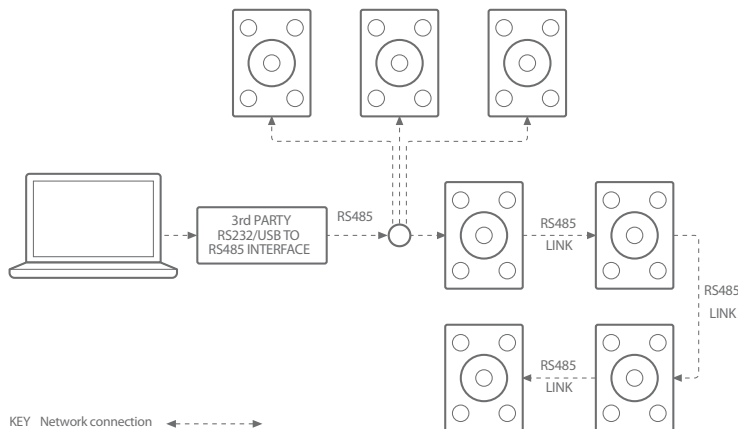
The loudspeakers are fully calibrated at the factory, avoiding the need to input the correct speaker management settings or dynamics at the point of install. This frees the installer to concentrate instead on room measurement and system optimisation. System commissioning and ongoing venue network control, incorporating real time diagnostics of electronics and drive unit, are all managed by the exclusive VNET™ software package. Supplied with each unit, this intuitive Windows tool controls all of the critical install, commissioning and performance monitoring functions. A standard wireless LAN-to-serial bridge can be used to communicate with the network, allowing the commissioning engineer to sit in the auditorium communicating from a laptop on 802.11b

## MONITORING & TELEMETRY FUNCTIONS

During normal operation the speakers on the network will appear as minimised panels in the form of a status monitor icon (Monicon) on the computer screen. These are laid out to reflect the physical layout of the speakers within the venue so that the user can monitor system status and component condition at a glance. The minimised panels can be expanded to reveal highly detailed information in real time:

- Input clip indicator
- Two output limiter bar graph meter
- Heat sink temperature bar graph meter
- Amplifier clip indicators (HF & LF on full range units)
- Transducer Failure Indicators (HF & LF on full range units)
- Amplifier protect status indicator

## VNET™ FREE NETWORK TOPOLOGY





KENT

LESS IS MORE

THE NEW DIMENSION

## SUBWOOFERS

Tannoy manufactures a wide range of highly efficient and high power handling subwoofers, including passive, powered and VNET™. This section contains information on Tannoy's full range of subs including the most recent additions to the V-Series and VNET™ subwoofer ranges. These include new larger format, high power enclosures designed and engineered specifically with VQ Series in mind, and offer the perfect low frequency reinforcement solution for any VQ system. They can of course also be used in conjunction with Tannoy's existing V-Series, POWERV™ or VNET™ loudspeaker ranges.

Smaller, more compact and versatile subwoofer devices are also available for a wide variety of challenging installation situations, including enclosures designed for discrete location under seating, integrated into bars and other fixed furniture or recessed in walls or ceiling spaces.



# PASSIVE SUBWOOFERS

## DESCRIPTION\_

A series of high efficiency, high power handling passive subwoofer enclosures designed to deliver deep, powerful bass and high sound pressure levels at low and ultra low frequencies. These subwoofers are perfectly matched with Tannoy's passive V-Series loudspeakers.



## DESCRIPTION\_

Tannoy produce a range of compact, but powerful passive subwoofer enclosures designed to integrate perfectly with a V-Series full-range loudspeaker system, extending the low frequency response and provide some real bottom end kick where required. These VS-Series subwoofers range from ultra compact 10" bandpass enclosures designed for discrete installation under seating or bars through to large format, high power handling twin driver subs designed for high energy dance music venues.

All VS-Series subwoofer enclosures are constructed with strong hardwood ply making them immensely durable and dependable, even when installed in high traffic areas such as busy nightclubs and bars.

TECH BRIEF_	VS10 BP_	VS15 BP_	VS15 HL_	VS18 DR_
<b>Driver Complement</b>	250mm (10") Vented bandpass	380mm (15") Vented bandpass	380mm (15") Horn loaded	458mm (18") Direct radiating
<b>Freq Range (-10dB)</b>	39Hz - 110Hz	36Hz - 116Hz	60Hz - 300Hz	27Hz - 240Hz
<b>Sensitivity (1W@1m)</b>	95dB anechoic (2.83V @ 8 Ohms)	96dB anechoic (2.83V @ 8 Ohms)	101dB anechoic (2.83V @ 8 Ohms)	99dB anechoic (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	118dB (average) 124dB (peak)	124dB (average) 130dB (peak)	130dB (average) 136dB (peak)	130dB (average) 136dB (peak)
<b>Rec. Amp Power</b>	400W	600W	800W	1200W
<b>Weight</b>	17.50kg	27kg	40kg	50kg
<b>Dimensions (HxWxD)</b>	355mm x 385mm x 590mm (14" x 15.2" x 23.3")	665mm x 440mm x 440mm (26.2" x 17.3" x 17.3")	578mm x 555mm x 650mm (22.8" x 21.9" x 25.6")	710mm x 652.40mm x 555mm (28" x 25.7" x 21.9")



## DESCRIPTION\_

These versatile, no compromise, all-purpose large format passive subwoofers are designed for the most demanding professional applications. The direct radiating VS 218DR and horn loaded VS 215HL offer exceptional output, high reliability and outstanding sonic performance providing low and VLF reproduction to complement any high SPL full range loudspeakers, including Tannoy's VQ Series.

Extending the frequency response of the system to below 30Hz makes these devices ideal for low frequency effects in high energy clubs, large corporate AV systems, stadiums, live concert halls, theatres, movie theatres and cinemas, large houses of worship and open-air venues.

TECH BRIEF_	VS215 HL_	VS218 DR_
<b>Driver Complement</b>	2 x 380mm (15") Horn loaded	2 x 458mm (18") Horn loaded
<b>Freq Range (-10db)</b>	40Hz - 450Hz	24Hz - 1.5kHz
<b>Sensitivity (1W@1m)</b>	109dB (1W = 2V for 4 Ohms)	106dB (1W = 2V for 4Ohms)
<b>Rated Max SPL</b>	142dB (average) 148dB (peak)	139dB (average) 145dB (peak)
<b>Rec. Amp Power</b>	2000 Watt / 8 Ohms	2000 Watt / 8 Ohms
	4000 Watt / 4 Ohms	4000 Watt / 4 Ohms
<b>Weight</b>	107kg	105kg
<b>Dimensions (HxWxD)</b>	700mm x 1050mm x 850mm (27.6" x 41.3" x 33.5")	700mm x 1050mm x 850mm (27.6" x 41.3" x 33.5")



DESCRIPTION\_

Incorporating a digital electronics section in conjunction with efficient and reliable switched mode power supply Class D power modules; these network enabled subwoofer enclosures are specifically engineered to compliment Tannoy's VNET™ loudspeaker system.



DESCRIPTION\_

A switch on the rear panel of the full range models allows selection between Full Range or High Pass modes, with High Pass allowing a speaker to be mounted in close proximity to a boundary or simply to increase headroom.

High Pass mode also enables a simple top box and subwoofer combination to be created without the need for an external crossover. Two Low Pass setting options on the subwoofer amplifiers fully optimise integration with the Full Range units.

TECH BRIEF\_

POWERVS10 BP\_

POWERVS15 BP\_

<b>Driver Complement</b>	250mm (10") Vented bandpass	380mm (15") Vented bandpass
<b>Freq Range (-10dB)</b>	39Hz - 110Hz	36Hz - 116Hz
<b>Sensitivity (1W@1m)</b>	95dB anechoic (2.83V @ 8 Ohms)	96dB anechoic (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	118dB (average) 124dB (peak)	124dB (average) 130dB (peak)
<b>Rec. Amp Power</b>	-	-
<b>Weight</b>	18kg	30kg
<b>Dimensions (HxWxD)</b>	355mm x 385mm x 590mm (14" x 15.2" x 23.2")	665mm x 440mm x 440mm (26.2" x 17.3" x 17.3")

# VNET SUBWOOFERS

## DESCRIPTION\_

Incorporating a digital electronics section in conjunction with efficient and reliable switched mode power supply Class D power modules; these network enabled subwoofer enclosures are specifically engineered to compliment Tannoy's VNET loudspeaker system.



## DESCRIPTION\_

The Tannoy VNET™ speaker range incorporate Dual Channel Class D power modules with switched mode power supplies. These very efficient and reliable designs operate at a low temperature, even when driven at very high power levels. The digital electronics section uses a third generation 96kHz DSP chipset; the whole system is designed to operate at a low temperature, even when driven at very high power levels.

Installation, using a free network topology layout – daisy chain, star configuration or any combination of both, is made simple using software driven system commissioning, while ongoing venue network control and drive unit diagnostics all done in real time using this intuitive package.

## TECH BRIEF\_

### VNET15 BP\_

### VNET15 HL\_

### VNET18 DR\_

<b>Driver Complement</b>	380mm (15") Vented bandpass	380mm (15") Horn loaded	458mm (18") Direct radiating
<b>Freq Range (-10dB)</b>	36Hz - 116Hz	60Hz - 300Hz	27Hz - 240Hz
<b>Sensitivity (1W@1m)</b>	96dB anechoic (2.83V @ 8 Ohms)	101dB anechoic (2.83V @ 8 Ohms)	99dB anechoic (2.83V @ 8 Ohms)
<b>Rated Max SPL</b>	124dB (average) 130dB (peak)	130dB (average) 136dB (peak)	130dB (average) 136dB (peak)
<b>Power Rating</b>	600W	800W	1200W
<b>Weight</b>	31kg	44kg	55kg
<b>Dimensions (HxWxD)</b>	665mm x 440mm x 440mm (26.2" x 17.3" x 17.3")	578mm x 555mm x 650mm (22.8" x 21.9" x 25.6")	710mm x 652.40mm x 555mm (28" x 25.7" x 21.9")



## DESCRIPTION\_

These versatile, no compromise, all-purpose large format VNET (powered) versions of the VS 218DR and VS 215HL subwoofers are designed for the most demanding professional applications. The direct radiating VNET 218DR and horn loaded VNET 215HL offer exceptional output, high reliability and outstanding sonic performance providing low and VLF reproduction to complement any high SPL full range powered loudspeaker system, including Tannoy's VQ NET.

Extending the frequency response of the system to below 30Hz makes these devices ideal for low frequency effects in high energy clubs, large corporate AV systems, stadiums, live concert halls, theatres, movie theatres and cinemas, large houses of worship and open-air venues.

## TECH BRIEF\_

### VNET215 HL\_

### VNET218 DR\_

<b>Driver Complement</b>	2 x 380mm (15") Horn loaded	2 x 458mm (18") Horn loaded
<b>Freq Range (-10dB)</b>	40Hz - 450Hz	24Hz - 1.5kHz
<b>Rated Max SPL</b>	140dB (average) 146dB (peak)	137dB (average) 143dB (peak)
<b>Power Rating</b>	2500W	2500W
<b>Weight</b>	112kg	110kg
<b>Dimensions (HxWxD)</b>	700mm x 1050mm x 850mm (27.6" x 41.3" x 33.5")	700mm x 1050mm x 850mm (27.6" x 41.3" x 33.5")



## WARRANTY STATEMENT

No maintenance of Tannoy products is necessary.

All of our products have been produced and tested with care and precision to give first-class service.

All passive components are guaranteed for a period of five years from the date of purchase from an authorised Tannoy dealer subject to the absence or evidence of misuse, overload, or accidental damage.

All active and electronic components are guaranteed for a period of one year from the date of purchase from an authorised Tannoy dealer subject to the absence of, or evidence of, misuse, overload or accidental damage.

If at any time during this warranty period the equipment proves to be defective for any reason other than accident, misuse, neglect, unauthorised modification or fair wear and tear, we will repair any such manufacturing defect or, at our option, replace it without charge for labour, parts or return carriage.

If you suspect a problem with a Tannoy product then, in the first instance, discuss it with your Tannoy dealer. If you require further assistance then we ask that you deal directly with your local Tannoy distributor.

Note:  
DO NOT SHIP ANY PRODUCT TO TANNOY WITHOUT PREVIOUS AUTHORISATION.

This warranty in no way affects your statutory rights.

## SPECIFICATION NOTES

The specifications in the professional section of this catalogue are annotated as follows:

1. Average over stated bandwidth. Measured at 1 metre on axis.
2. Unweighted pink noise input, measured at 1 metre in an anechoic chamber. A full range of measurements, performance data, and Ease™ Data can be downloaded from [www.tannoy.com](http://www.tannoy.com)

## DEVELOPMENT POLICY

Tannoy operates a policy of continuous research and development. The introduction of new materials or manufacturing methods will always equal or exceed the published specifications, which Tannoy reserves the right to alter without prior notification.

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Tannoy adopts a policy of continuous improvement and product specification is subject to change