

Por

car audio





The quest for more

What began as a dream in 1975 – to create the perfect loudspeaker – has turned into a life's work for Morel's founder, Meir Mordechai. Inspired by his love of music, Meir's quest to create the ultimate speaker has resulted in a company known worldwide for its dedication to providing superb sound quality. Along the way, Morel has built up an enviable reputation for technological innovation and design excellence.

Morel manufactures a wide range of high-quality drivers including tweeters, midrange, and woofers for the mid- to high-end home hi-fi, home theater, and car audio markets.

The car audio enthusiasts' choice

Morel's range of components and component systems caters to every car audio need. Morel is well known for its high-performance automotive OEM products for the car aftermarket hi-fi industry including two- and threeway systems, coaxial speakers, and components.

Our R&D goes into your R&B

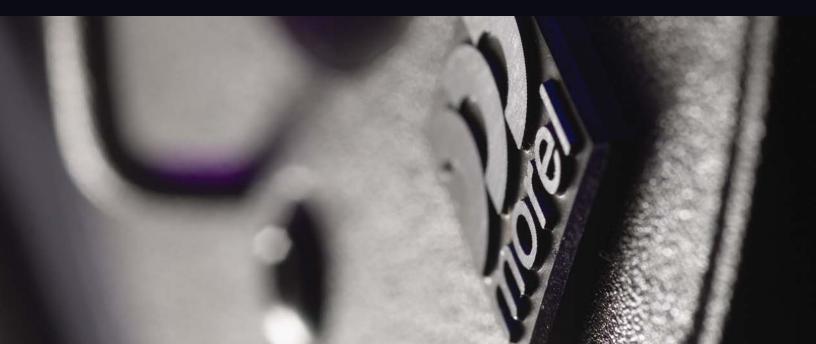
In-house design, R&D, and manufacturing under one roof give Morel unprecedented advantages. Unlimited by constraints on design and boosted by years of experience in manufacturing its own drive units, the company is able to solve technological challenges through devising innovative solutions that set new standards in sound.

At Morel, quality is handmade

Morel's products are made with exceptional care. In fact, they are all assembled by hand and extensively tested — undergoing seven different quality tests — to ensure they meet the highest standards.

Winning concepts in car audio

Morel has been recognized by leading car audio press associations and magazines, winning the "Innovative Product of the Year" and "Reference Speaker Component" awards for its Integra concept, dome midrange, and full component systems. The Morel Supremo won the Amex "Best Component Product of the Year" award.



We've turned our technology inside out. We'll turn your preconceptions about speaker technology upside down.

Original components, optimal sound

When Morel set out to improve the state of the art in car audio, it identified the key problems associated with car audio and found innovative ways to solve them. The company's technologies have been at the forefront of many audio "firsts."

External Voice Coil (EVC™)

The Morel's voice coil is three times larger than in conventional speakers with the same cone diameter. The extremely light and efficient voice coil optimizes the translation from electrodynamic energy to acoustic energy.

Hexatech[™] aluminum voice coil

Hextach's honeycomb structure reduces air gaps and increases efficiency by up to 20%. The lightweight structure allows for the quick transient response necessary for accurate music reproduction.

Acuflex[™] coating

Acuflex is a specially engineered material that ensures good damping, reduces distortion levels and unwanted resonances, and provides crystal clear sound.

In Hybrid[™] motor drive magnet system

The combination of neodymium and ferrite magnets is up to four times more powerful than conventional magnets of the same size. With Hybrid, more amplifying power can be converted into sonic energy – even in a small driver.



C.A.R. (Controlled Acoustic Resistance) Filter™

Specially designed for car audio applications, where drive units are often installed within free-air environments, the filter mimics the effect of a cabinet to restrain the air flow within the drive unit and controls the cone movement thereby improving the acoustical loading and power handling.



Shielded products

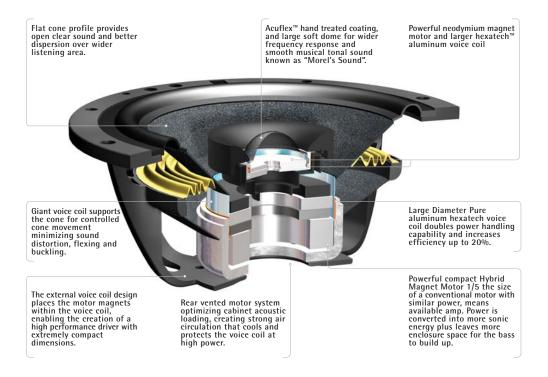
Most of our products are magnetically shielded to eliminate interference with the audio system's wiring or the vehicle's electronic circuits.

Uniflow[™] chassis

Uniflow's aerodynamic design allows air and sound waves to flow uniformly and smoothly, eliminating interference with the woofer's moving parts. The geometric design enables the use of a low-profile spider that provides greater support and stability to the voice coil and cone during the most demanding operating conditions.

Accuset[™] crossover alignment system

Morel's new Accuset alignment system enables installers to easily adjust the crossovers from any location in the car, providing the option of 6dB or 12dB crossover frequency roll-off selection and \pm 4dB – in 2dB steps – for tweeter level settings. The crossover alignment system is designed to make installation easy, efficient, and effective. It allows installers to listen to the system and fine-tune the crossover settings to achieve optimal soundstage and performance. On completion, the crossover settings are transferred from the control panel onto the jumper plug terminals.



SUPREMO[™] 2-WAY COMPONENT SYSTEM



The Supremo 2-way system offers car audio enthusiasts a combination of state-of-the-art technological savvy and superior sound reproduction. Designed to confront the unique challenges of car audio, Supremo delivers unsurpassed performance — representing the pinnacle of Morel's component line.

Supremo is based on Morel's linear dynamic under-hung voice coil configuration, which allows the voice coil to move in a significantly higher magnetic field and remain there during operation. This configuration enables linear excursion of the coil and higher magnetic flux, eliminating inter-modulation distortion while considerably improving the dynamic range, transient response, and efficiency.

The Supremo Piccolo tweeter uses Morel's 28mm (1 1/8") Acuflex soft dome for wider dispersion and warmer sound characteristics. Supremo Piccolo's double neodymium magnet structure and its Hexatech aluminum voice coil

construction enable a low resonance point of 800Hz which contributes to a wider frequency response and better off-axis performance. Designed for ease of installation, Supremo Piccolo utilizes a smaller faceplate of 67mm (2 5/8").

Supremo SW woofers employ an aerodynamic die-cast Uniflow chassis to minimize sound reflection distortion and provide shallow mounting capabilities. The 3" EVC Hexatech voice coil, coupled with its unique Hybrid magnet motor structure (combined ferrite and neodymium magnets) produces remarkably high power capability, high efficiency, as well as wide and natural dynamic range. Supremo SW woofers are available in 5", 6", and 9".

The Supremo 2-way component system was engineered to be an active speaker system in order to maximize the full potential of its drivers and enable installers to employ various frequency cutoff points and slopes.

	Supremo 5	Supremo 6
	4 ohm	4 ohm
	160W	200W
	1000W	1000W
	88dB	89dB
	30-25000Hz	25-25000Hz
	Min. 1400Hz Max. 5000Hz	Min. 1400Hz Max. 5000Hz
	6-12-18-24 dB/Octave	6-12-18-24 dB/Octave
Woofer: Tweeter:	75mm (3.00") 28mm (1.10")	75mm (3.00") 28mm (1.10")
Woofer: Tweeter:	Hexatech Aluminum Hexatech Aluminum	Hexatech Aluminum Hexatech Aluminum
Woofer: Tweeter:	Linear Dynamic Hybrid, rear vented Neodymium flat pancake design	Linear Dynamic Hybrid, rear vented Neodymium flat pancake design
Woofer: Tweeter:	135mm (5.25") 67mm (2.63")	165mm (6.50") 67mm (2.63")
Woofer: Tweeter:	60mm (2.36") 32mm (1.25")	61mm (2.40") 32mm (1.25")
	Woofer: Tweeter:Woofer: Tweeter:Woofer: Tweeter:Woofer: Tweeter:Woofer: Tweeter:Woofer: Tweeter:Woofer: Tweeter:	160W 1000W 88dB 30-25000Hz Min. 1400Hz Max. 5000Hz 6-12-18-24 dB/Octave Woofer: 75mm (3.00") Tweeter: 28mm (1.10") Woofer: Hexatech Aluminum Tweeter: Linear Dynamic Hybrid, rear vented Woofer: 135mm (5.25") Tweeter: 67mm (2.63") Woofer: 60mm (2.36")





SUPREMO™ TWEETERS



Innovative Supremo tweeters – Supremo and Supremo Piccolo – deliver unsurpassed performance, redefining the state-of-the-art in car audio. Built for audiophiles, these mobile audio tweeters are the result of intensive R&D dedicated to meeting the unique challenges posed by car audio.

Morel has developed some innovative technologies, which among other audible benefits, results in a wider soundstage and improved stereo imaging. The Supremo tweeters employs Acuflex coated 28mm (1 1/8") diameter soft dome for wider dispersion and softer sound characteristics. The large aluminum Hexatech voice coil provides a radiating dome surface that is 25% larger than conventional 1-inch domes, enabling a low resonance point, as well as wider frequency response for improved off-axis performance.

Morel's unique linear dynamic under-hung configuration is designed to increase performance by allowing the voice coil to move in a significantly higher magnetic field and remain there during operation. This configuration enables linear excursion of the coil and higher magnetic flux, eliminating inter-modulation distortion while considerably improving the dynamic range, transient response, and efficiency.

Supremo handles low-mid frequencies with ease — the low resonance point of 680Hz enables a low crossover point and the ability to reproduce lower frequencies, which provide installers with greater flexibility in system design and enhances soundstage and image.

The Supremo is available in 100mm (4") diameter faceplate while the Supremo Piccolo is available in 67mm (2 5/8") diameter faceplate, making it ideal for dashboard and A-pillar installations in most cars.

Supremo tweeters use Van Den Hul silver-plated linear crystal cables for its input connections, enabling a long working life of clean signal transmission. To ensure optimal results, Supremo tweeters are individually tested and match paired.

Tweeters	Supremo	Supremo Piccolo
Nominal Impedance	6 ohm	6 ohm
Power Handling	220W	200W
Max. Transient Power Handling	1000W	1000W
Sensitivity (2.83V/1M)	92dB	90dB
Frequency Response	1400-25000Hz Limit: 300-50000Hz	1400-25000Hz Limit: 300-50000Hz
Voice Coil Diameter	28mm (1.10")	28mm (1.10")
Voice Coil Wire	Hexatech aluminum	Hexatech aluminum
Magnet System	Neodymium flat pancake design	Neodymium flat pancake design
Dome Type	Acuflex hand coated soft dome	Acuflex hand coated soft dome
Unit Diameter	100mm (4.00")	67mm (2.63")
Mounting Depth	50mm (2.00")	32mm (1.25")



ELATE[™] 3-WAY COMPONENT SYSTEM



Extraordinary technological know-how and high-fidelity sound are the hallmarks of the Elate series. The distinctive Elate SW woofers feature Morel's solution for deep and accurate bass reproduction. Designed for use in many different applications, the Elate series presents the elite of Morel's component line.

The Uniflow aluminum die-cast chassis has a shallow aerodynamic design to minimize sound reflection distortion. The large diameter 75mm (3") Hexatech voice coil supports a one-piece DPC shallow cone, preventing cone breakup distortion at high levels. The Elate series combines outstanding power handling capability with surprisingly compact size.

Morel's signature "sweet and warm" sound comes to the fore with the MT-23 tweeter and its powerful double neodymium magnet and Acuflex coated soft dome tweeter. Built to perform, it utilizes a 28mm (1 1/8") diameter aluminum Hexatech voice coil to provide better power handling. Its powerful double magnet motor, coupled with its low resonance point, makes the MT-23 a highly transient and dynamic tweeter that delivers a high and wide soundstage and an accurate image.

For those who demand more, the new CDM-88 — optimized for high-end audio systems, is the obvious choice. The CDM-88 soft dome midrange features a large 54mm (2 1/8") diameter aluminum Hexatech voice coil that drives a soft dome membrane with a larger than normal sound radiating surface CDM-88 has a low resonance point of only 280Hz providing the full midrange frequency spectrum and deep, clear sound. The CDM-88 employs a C.A.R. Filter, providing an excellent acoustic loading while eliminating the need for a rear chamber. Only 3.5" (88mm) in diameter, the new CDM-88 midrange, was engineered to offer installers a small, high-quality midrange that can be easily installed in the dashboard or A-pillars for better sound stage and imaging.

Designed with installers in mind, the Accuset MX-33.3 crossover network offers a variety of adjustment capabilities: Frequency slope selection, level attenuation for all of the components, and bi-wiring and bi-amping assure optimum adaptability of the speaker's performance to any car environment. The new Accuset crossover alignment system further eases the tuning process by enabling easy adjustment of the crossover from any desired location, thereby achieving optimal performance.

3-Way Syst	tem	Elate 5	Elate 6	Elate 9
Nominal Impedance		4 ohm	4 ohm	4 ohm
Power Handling		160W	200W	200W
Max. Transient Power	^r Handling	1000W	1000W	1000W
Sensitivity (2.83V/1	VI)	88dB	89dB	91dB
Frequency Response		35-25000Hz	25-25000Hz	20-25000Hz
Crossover Point		300/3800Hz	300/3800Hz	300/3800Hz
Voice Coil Diameter	Woofer: Tweeter: Midrange:	75mm (3.00") 28mm (1.10") 54mm (2.10")	75mm (3.00") 28mm (1.10") 54mm (2.10")	75mm (3.00") 28mm (1.10") 54mm (2.10")
Voice Coil Wire	Woofer: Tweeter: Midrange:	Hexatech aluminum Hexatech aluminum Hexatech aluminum	Hexatech aluminum Hexatech aluminum Hexatech aluminum	Hexatech aluminum Hexatech aluminum Hexatech aluminum
Magnet System	Woofer: Tweeter: Midrange:	Hybrid rear vented Double Neodymium Neodymium rear vented	Hybrid rear vented Double Neodymium Neodymium rear vented	Hybrid rear vented Double Neodymium Neodymium rear vented
Mounting Depth	Woofer: Tweeter: Midrange:	60mm (2.36") 20mm (0.80") 25mm (1.00")	61mm (2.40") 20mm (0.80") 25mm (1.00")	71mm (2.80") 20mm (0.80") 25mm (1.00")







ELATE[™] 2-WAY COMPONENT SYSTEM





The Elate series presents an exceptional combination of technological knowhow and high-fidelity sound. The Elate SW woofers represent Morel's solution for deep and accurate bass reproduction. Engineered to be utilized in a wide array of installation environments, the Elate series features some of the finest technological innovations Morel has to offer.

The Uniflow aluminum die-cast chassis has a shallow aerodynamic design to minimize sound reflection distortion. The large diameter 75mm (3") Hexatech voice coil supports a one-piece DPC shallow cone, preventing cone breakup distortion at high levels. The Elate series offers outstanding power handling capability and convenient, compact size

Morel's signature "sweet and warm" sound comes to the fore with the MT-23 tweeter and its powerful double neodymium magnet and Acuflex coated soft dome tweeter. Built to perform, it utilizes a 28mm (1 1/8") diameter aluminum Hexatech voice coil to provide better power handling. Its powerful double magnet motor, coupled with its low resonance point, makes the MT-23 a highly transient and dynamic tweeter that delivers a high and wide soundstage and an accurate image.

Designed with installers in mind, the new Accuset MX-22.2E Elate 2-way crossover network offers a variety of adjustment capabilities: Frequency slope selection of 6dB or 12dB for both tweeter and woofer and level adjustment of \pm 4dB in 2dB steps for the tweeter. The crossover network also offers biwiring and bi-amping. The MX-22.2E crossover is built using very high quality components with low-distortion capacitors and resistors, and transparent isolated high-current interconnects.

The new Accuset crossover alignment system further simplifies the tuning process. This exceptional sound-tuning device enables easy and fast adjustment of the crossover from any location, thereby achieving optimal soundstage and performance.

2-Way Sys	tem	Elate 5	Elate 6	Elate 9
Nominal Impedance		4 ohm	4 ohm	4 ohm
Power Handling		160W	200W	200W
Max. Transient Powe	r Handling	1000W	1000W	1000W
Sensitivity (2.83V/1	M)	88dB	89dB	90dB
Frequency Response		35–25000Hz	25-25000Hz	20-25000H
Crossover Point		1800Hz	1800Hz	1800Hz
Voice Coil Diameter	Woofer: Tweeter:	75mm (3.00") 28mm (1.10")	75mm (3.00") 28mm (1.10")	75mm (3.00") 28mm (1.10")
Voice Coil Wire	Woofer: Tweeter:	Hexatech aluminum Hexatech aluminum	Hexatech aluminum Hexatech aluminum	Hexatech aluminum Hexatech aluminum
Magnet System	Woofer: Tweeter:	Hybrid rear vented Doubled Neodymium	Hybrid rear vented Double Neodymium	Hybrid rear vented Doubled Neodymium
Mounting Depth	Woofer: Tweeter:	60mm (2.36") 20mm (0.80")	61mm (2.40") 20mm (0.80")	71mm (2.80") 20mm (0.80")







HYBRID OVATION™ 2-WAY COMPONENT SYSTEM



At the heart of the Morel sound is its unique technology — unconventional, innovative, and highly effective. Compact, slim, and efficient, the Hybrid Ovation series drive unit with Hexatech voice coil and double magnet (neodymium and ferrite) system delivers exceptional sound that is pleasing to the ear.

The MT-22 tweeter with 28mm (1.1") diameter aluminum Hexatech voice coil is hand coated with Acuflex, a special material that provides good damping for the soft dome and reduces distortion. The tweeter offers smoother linear frequency response, enhanced low midrange reproduction, and crystal clear high frequencies. Hybrid Ovation heightens the enjoyment of music, living up to Morel's reputation for delivering more. The new Uniflow aluminum die-cast chassis' aerodynamic design minimizes sound reflection distortion and increases the speaker's overall performance. The low-profile flat spider provides greater support and stability to the voice coil and cone during the most demanding operating conditions. Uniflow's streamlined and stylish design once more illustrates Morel's flair for combining technological breakthroughs with design excellence.

Morel's new Accuset crossover alignment system is designed with installers in mind, enabling easy adjustment of the crossovers (6dB or 12dB slope adjustment and \pm 4dB – in 2dB steps – tweeter level attenuation settings) from any desired location in the car. The new Accuset crossover alignment system simplifies car audio tuning to achieve optimal soundstage and performance. The Accuset MX-22.2 crossover offers bi-wire and bi-amping capabilities.

2-Way Sys	tem	Hybrid Ovation 4	Hybrid Ovation 5	Hybrid Ovation 6
Nominal Impedance		4 ohm	4 ohm	4 ohm
Power Handling		100W	120W	140W
Max. Transient Powe	r Handling	300W	600W	600W
Sensitivity (2.83V/1	M)	89dB	91dB	91dB
Frequency Response		50-25000Hz	40-25000Hz	35-25000Hz
Crossover Point		1800Hz	1800Hz	1800Hz
Voice Coil Diameter	Woofer: Tweeter:	54mm (2.10") 28mm (1.10")	54mm (2.10") 28mm (1.10")	54mm (2.10") 28mm (1.10")
Voice Coil Wire	Woofer: Tweeter:	Hexatech aluminum Hexatech aluminum	Hexatech aluminum Hexatech aluminum	Hexatech aluminum Hexatech aluminum
Magnet System	Woofer: Tweeter:	Hybrid rear vented Neodymium	Hybrid rear vented Neodymium	Hybrid rear vented Neodymium
Mounting Depth	Woofer: Tweeter:	50mm (2.00") 20mm (0.80")	60mm (2.36") 20mm (0.80")	61mm (2.40") 20mm (0.80")









Installing car speakers can be very cumbersome due to the inherent acoustical problems present in off-axis system designs and asymmetrical car environments. These problems make it hard to accurately tune and select the crossing frequency points in two- and three-way component systems.

Keeping your needs in mind, Morel has designed its Accuset crossover alignment system. The Accuset Alignment system provides installers an easy way to tune a sound system to reach optimum performance. The Accuset alignment system is connected to each of the Accuset crossover units using ribbon cables and acts as an extension to the crossovers; enabling installers to make all necessary adjustments from any seat in the car. With the Accuset alignment system, installers now can fine-tune crossover settings in real-time to achieve the best performance and sound quality while listening to music.

The Accuset alignment system offers several different adjustment options, giving you greater flexibility in sound system design.

Tweeter Section

The tweeter level can be adjusted from -4dB to +4dB in 2dB increments. It also has 6dB and 12dB crossover slope-cut options.

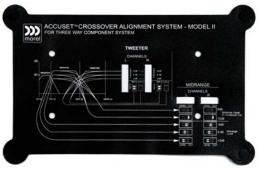
Woofer Section

The woofer can be adjusted to a 6dB or a 12dB crossover slope cut. Woofer adjustment does not affect the tweeter adjustment and vice versa. Both the woofer and the tweeter can be independently adjusted to meet your needs.

Midrange Section

The midrange can be adjusted to a 6dB / 12dB crossover slope cut, and \pm 1.5dB level adjustments.

Accuset Alignment	Elate 3-way	
Compatible for speaker systems	Elate 2-way	
	Hybrid Ovation 2-way	
	MX-33 / 33.3	
Compatible for crossovers	MX-22 / 22.2	
	MX-22E / 22.2E	
Cable length	1.6 meters (5ft)	
Net Weight	2.4Kg (5.28Lb)	



DOTECH OVATION™ 2-WAY COMPONENT SYSTEM



Featuring some of Morel's best technological innovations, the Dotech Ovation series delivers quality, performance, and affordability in one compact stylish system. Dotech Ovation holds great appeal for car audio lovers looking for powerful sound and exceptional value. Dotech represents a sound investment for music lovers.

Dotech Ovation features Morel's Unified one piece chassis with shallow aerodynamic design to reduce sound reflection distortion and mounting depth. Dotech's double magnet drive motor and its large 54mm (2 1/8") diameter Hexatech aluminum voice coil, provides better cone support and higher power handling. The use of Morel's C.A.R. Filter technology improves acoustical loading and enhances the woofer's ability to perform well in free-air environments. Morel's new MT-12 Acuflex coated soft dome tweeter with neodymium magnet motor and large diameter 28mm (1 1/8") voice coil allows wide frequency response and a lower resonance point, providing perfect integration with its mid-bass woofer.

The high-quality Mini-Accuset MX-20 crossover, built using high grade air coils and caps, offers \pm 3dB tweeter level attenuation, making it easier to achieve optimal performance in different car audio environments.

The tuning process is further simplified with the new mini-accuset crossover alignment system, designed to work with the mini-accuset MX-20 crossover. This exceptional sound-tuning device enables easy and fast adjustment of the crossover from any location to achieve optimal soundstage and imaging.

2-Way Sys	tem	Dotech Ovation 4	Dotech Ovation 5	Dotech Ovation 6
Nominal Impedance		4 ohm	4 ohm	4 ohm
Power Handling		100W	120W	140W
Max. Transient Power	Handling	300W	500W	500W
Sensitivity (2.83V/1	M)	88dB	89dB	90dB
Frequency Response		50-22000Hz	45-22000Hz	40-22000Hz
Crossover Point		3200Hz 6dB/octave	3200Hz 6dB/octave	3200Hz 6dB/octave
Voice Coil Diameter	Woofer: Tweeter:	54mm (2.10") 28mm (1.10")	54mm (2.10") 28mm (1.10")	54mm (2.10") 28mm (1.10")
Voice Coil Wire	Woofer: Tweeter:	Hexatech aluminum Copper	Hexatech aluminum Copper	Hexatech aluminum Copper
Magnet System	Woofer: Tweeter:	Double ferrite rear vented Neodymium	Double ferrite rear vented Neodymium	Double ferrite rear vented Neodymium
Mounting Depth	Woofer: Tweeter:	50mm (2.00") 20mm (0.80")	60mm (2.36") 20mm (0.80")	61mm (2.40") 20mm (0.80")

INTEGRA OVATION XOTM POINT SOURCE SPEAKERS



Once again, Morel introduces a new concept in car audio with its new point source Integra Ovation XO. As its name suggests, Integra integrates tweeter and woofer into one compact and powerful point source speaker – expertly engineered for car installations that cannot accommodate component systems. The Integra Ovation XO is the audiophile's ultimate solution, offering superb soundstage, image, and musicality. The Integra Ovation XO offers hours of listening pleasure for ardent music lovers.

Integra Ovation XO utilizes the neodymium magnet motor drive system to achieve reduced mounting depth and increased loudspeaker sensitivity. The large-diameter 54mm (2 1/8") EVC aluminum Hexatech voice coil increases power handling and transient response.

The Acuflex-coated soft dome tweeter delivers the warm, crystal-clear sound Morel is known for. The tweeter is acoustically integrated with the woofer motor drive system, constructed to allow perfect integration and phase linearity with the woofer. This construction ensures smooth and linear frequency response to produce a unique point-source speaker.

The aerodynamic design of the Uniflow aluminum die-cast chassis minimizes sound reflection distortion and increases overall speaker performance.

The Integra Ovation XO is designed to provide installers with optimal flexibility with its separate input tags for the woofer and tweeter and external crossover network. By allowing installers to attenuate tweeter level by ± 3 dB, the new external crossover improves the speaker's performance in off-axis installations and elevates some of the problems of reflective surfaces in a specific frequency range.

	Integra Ovation XO 4	Integra Ovation XO 5	Integra Ovation XO 6
Nominal Impedance	4 ohm	4 ohm	4 ohm
Power Handling	80W	90W	100W
Max. Transient Power	250W	300W	400W
Sensitivity (2.83V/1M)	88dB	89dB	90dB
Frequency Response	60-25000Hz	50-25000Hz	45-25000Hz
Crossover Point (Seperate Unit)	3200Hz 6dB/octave	3200Hz 6dB/octave	3200Hz 6dB/octave
Voice Coil Diameter Woofer: Tweeter:	54mm (2.10") 28mm (1.10")	54mm (2.10") 28mm (1.10")	54mm (2.10") 28mm (1.10")
Voice Coil Wire Woofer: Tweeter:	Hexatech aluminum Copper	Hexatech aluminum Copper	Hexatech aluminum Copper
Magnet System Woofer: Tweeter:	Neodymium Neodymium	Neodymium Neodymium	Neodymium Neodymium
Mounting Depth	50mm (2.00")	60mm (2.36")	61mm (2.40")







TEMPO[™] 2-WAY COMPONENT SYSTEM



Tempo component system is Morel's answer to the demand for performance coupled with competitive pricing. Features some of Morel's innovative technologies, the new Tempo component systems offer car audio enthusiasts the best performance in its class. Now, feeling the tempo as you drive down the street is a whole lot more fun.

The new soft dome 28mm (1 1/8") diameter tweeter utilizes EVC technology to set new performance standards. The soft dome produces an extended frequency response, yielding solid front stage and accurate stereo imaging. The new tweeter installation flexibility offers four different mounting options.

Tempo bass/midrange units feature a new high-grade ferrite magnet, which provides increased magnetic flux, power handling rating, and efficiency. At the same time, it decreases its physical size by 35% compared to standard ferrite magnets to provide smaller mounting depth. The woofer membrane is carefully shaped for clean and linear movement during low midrange frequency reproduction, reducing distortion and increasing bass dynamics.

The crossover network is built using high-grade components to eliminate any distortion. To ensure optimal performance and installation flexibility in dealing with off-axis installations, the Tempo crossover network offers OdB and +3dB tweeter level attenuation.

2-Way System	n	Tempo 5	Tempo 6	
Nominal Impedance		4 ohm	4 ohm	
Power Handling		110W	120W	_
Max. Transient Power Handl	ing	270W	280W	
Sensitivity (2.83V/1M)		89dB	90dB	
Frequency Response		46-22000Hz	40-22000Hz	
Crossover Point		3800Hz 6dB/octave	3800Hz 6dB/octave	
Voice Coil Diameter	Woofer: Tweeter:	25mm (1.00") 28mm (1.10")	25mm (1.00") 28mm (1.10")	
Voice Coil Wire	Woofer: Tweeter:	Copper Copper	Copper Copper	
Magnet System	Woofer: Tweeter:	T-type high-grade ferrite Neodymium	T-type high-grade ferrite Neodymium	
Mounting Depth	Woofer: Tweeter:	59mm (2.32") 20mm (0.80")	62mm (2.44") 20mm (0.80")	





TEMPO COAX™ COAXIAL SPEAKERS



For performance coupled with competitive pricing, nothing beats Morel's new Tempo Coaxial speakers. Featuring some of Morel's innovative technologies, Tempo offers car audio enthusiasts the best performance in its class. For those who like their car audio loud and proud, Tempo is the power-packed solution.

The Tempo Coax speakers feature a 25mm (1") soft dome tweeter with a low resonance point, which enables the tweeter to produce a wider frequency range in the lower midrange band. The tweeter can be swiveled to optimize speaker performance and enhance the listening experience.

Morel's new high-grade ferrite magnet provides increased magnetic flux, power handling rating, and efficiency. At the same time, the smaller size

(35% smaller than standard ferrite magnets) provides shallow mounting depth. The woofer membrane is carefully shaped for clean and linear movement during low midrange frequency reproduction, reducing distortion and increasing bass dynamics.

For added flexibility, the Tempo Coax provides installers with an external plug and play crossover that enables the use of two separate inputs in bi-amping or bi-wiring installations.

Available in 4", 5 1/4", 6 1/2", 5x7, and 6x9" size speakers, Tempo Coax fits in any speaker placement, providing superior sound quality to any sound system.

Tempo Coa	ах	4	5	6	5 x 7	6x9
Nominal Impedance		4 ohm				
Power Handling		50W	100W	110W	90W	140W
Max. Transient Powe	r Handling	120W	200W	200W	200W	250W
Sensitivity (2.83V/1	M)	85dB	89dB	90dB	90dB	91dB
Frequency Response		70-22000Hz	55-22000Hz	40-22000Hz	50-22000Hz	35-22000Hz
Crossover Point		4000Hz	4000Hz	4000Hz	4000Hz	3800Hz
Voice Coil Diameter	Woofer: Tweeter:	25mm (1.00") 25mm (1.00")	25mm (1.00") 25mm (1.00")	25mm (1.00") 25mm (1.00")	25mm (1.00") 25mm (1.00")	30mm (1.18") 25mm (1.00")
Voice Coil Wire	Woofer: Tweeter:	Copper Copper	Copper Copper	Copper Copper	Copper Copper	Copper Copper
Magnet System	Woofer: Tweeter:	High-grade ferrite magnet Neodymium				
Mounting Depth		48mm (1.89")	60mm (2.36")	64mm (2.51")	60mm (2.36")	86mm (3.38")

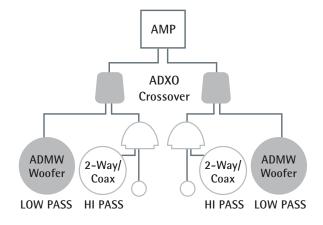


ADMW 3-WAY ADD-ON KIT



Improving a 2-way component system has never been easier with Morel's 3-way add-on kit. Available in 6", 9" and 10" and with a high quality Hi-Pass/Low-Pass crossover, installers can upgrade most 2-way component systems or coaxial speakers by adding another bass woofer to improve dynamic range and bass response and overall sound quality.

3-Way Add-On Kit	ADMW 6	ADMW 9	ADMW 10
Nominal Impedance	4 ohm	4 ohm	4 ohm
Power Handling	160W	180W	200W
Max. Transient Power Handling	1000W	1000W	1000W
Sensitivity (2.83V/1M)	87dB	88dB	89dB
Frequency Response	30-3500Hz	25-3000 Hz	20-2500 Hz
Crossover Point	150 Hz HP/LP	150 Hz HP/LP	150 Hz HP/LP
Voice Coil Diameter	75mm (3.00")	75mm (3.00")	75mm (3.00")
Voice Coil Wire	Aluminium Hexatech	Aluminium Hexatech	Aluminium Hexatech
Magnet System	Double ferrite	Double ferrite	Double ferrite
Mounting Depth	61mm (2.40")	71mm (2.80")	74mm (2.91")



COMPONENTS

WOOFERS

	Supremo SW5	Supremo SW 6	Supremo SW 9	Elate SW 5	Elate SW 6	Elate SW 9
Nominal Impedance	4 ohm	4 ohm	4 ohm	4 ohm	4 ohm	4 ohm
Power Handling	160W	180W	220W	160W	180W	200W
Max. Transient Power Handling	1000W	1000W	1000W	1000W	1000W	1000W
Sensitivity (2.83V/1M)	88dB	89dB	92dB	88dB	89dB	91dB
Frequency Response	30-5000Hz	25-4000Hz	20-3500Hz	35-5000Hz	25-4000Hz	20-3300Hz
Unit Diameter	135mm (5.25")	165mm (6.50")	222mm (8.75")	135mm (5.25")	165mm (6.50")	222mm (8.75")
Mounting Depth	60mm (2.36")	61mm (2.37")	71mm (2.80")	60mm (2.36")	61mm (2.40")	71mm (2.80")

COMPONENTS

Morel car audio components offer powerful performance coupled with superb style. Morel rises to the challenges of car audio system design, developing a wide range of speaker components to meet the needs of installers and consumers alike.

Knowing that flexibility in system design is fundamental to car audio enthusiasts, Morel is offering these components to meet individual needs.

At Morel, there is no compromise on quality. Morel's state-of-the-art technology and unique styling provides an unrivaled car audio experience. With Morel, you get more.

MIDRANGES			TWEETERS					
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	CDM-54	CDM-88	Supremo	Supremo Piccolo	MT-37	MT-23	MT-22	MT-12
Nominal Impedance	4 ohm	4 ohm	6 ohm	6 ohm	6 ohm	6 ohm	4 ohm	4 ohm
Power Handling	100W	100W	220W	200W	200W	130W	110W	80W
Max. Transient Power Handling	300W	300W	1000W	1000W	1000W	350W	300W	250W
Sensitivity (2.83V/1M)	91dB	90dB	92dB	90dB	93dB	91dB	91dB	91dB
Frequency Response	450-7000Hz	450-7000Hz	1400-25000Hz	1400-25000Hz	1800-22000Hz	1400-25000Hz	1600-25000Hz	1800-22000Hz
Unit Diameter	100mm (4.00")	88mm (3.50")	100mm (4.00")	67mm (2.63")	94mm (3.70")	45mm (1.80")	45mm (1.80")	45mm (1.80")
Mounting Depth	25mm (1.00")	25mm (1.00")	50mm (2.00")	32mm (1.25")	58mm (2.30")	20mm (0.80")	20mm (0.80")	20mm (0.80")

CROSSOVER NETWORKS









	Accuset MX-33.3	Accuset MX-22.2E	Accuset MX-22.2	Mini Accuset MX-20-4,5/6
Nominal Impedance	4 ohm	4 ohm	4 ohm	4 ohm
Power Handling	250W	280W	250W	150W
Crossover Point	Woofer: 300Hz/12dB Midrange: low 300dB 6dB, High 3800 Hz 6/12dB (Variable) Tweeter: 3800Hz 6/12db (variable)	1800Hz	1800Hz	3200Hz
Crossover Controls	Midrange upper frequency slope cut: 6/12dB Midrange level: -2dB, 0dB, +2dB Tweeter frequency slope cut: 6/12dB/octave Tweeter level: -2dB, 0dB, +2dB	Frequency slope cut: 6/12dB Tweeter level: ±4dB (2dB steps)	Frequency slope cut: 6/12dB Tweeter level: ±4dB (2dB steps)	Tweeter level -3dB, 0dB, +3dB
Wiring Options	Standard, bi-amp, bi-wire	Standard, bi-amp, bi-wire	Standard, bi-amp, bi-wire	Standard



PRODUCT SPECIFICATIONS

WOOFERS

	Supremo SW 5	Supremo SW 6	Supremo SW 9	Elate SW 5	Elate SW 6	Elate SW 9	Elate SW 10
Nominal Impedance	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm
Power Handling	160W	200W	200W	160W	200W	200W	200W
Max. Transient Power Handling	1000W	1000W	1000W	1000W	1000W	1000W	1000W
Sensitivity (2.83V/1M)	88dB	89dB	91dB	88dB	89dB	91dB	92dB
Frequency Response	35-4200Hz	25-5000Hz	20-2600Hz	35-5000Hz	25-4000Hz	20-3300Hz	15-3000Hz
FS	65Hz	62Hz	56Hz	55Hz	50Hz	40Hz	32Hz
Voice Coil Diameter	75.00mm (3.00")	75.00mm (3.00")	75.00mm (3.00")	75.00mm (3.00")	75.00mm (3.00")	75.00mm (3.00")	75.00mm (3.00")
Voice Coil Height	5.00mm (0.20")	5.00mm (0.20")	5.00mm (0.20")	14.50mm (0.57")	14.50mm (0.57")	14.50mm (0.57")	14.50mm (0.57")
Voice Coil Type/ Former	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum
Voice Coil Wire	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum
DC Resistance	3.50 ohm	3.50 ohm	3.50 ohm	3.70 ohm	3.70 ohm	3.70 ohm	3.80 ohm
Voice Coil Inductance @1kHz	0.20MH	0.22MH	0.22MH	0.39MH	0.38MH	0.72MH	0.63MH
Magnet System	Supremo Hybrid rear vented	Supremo Hybrid rear vented	Supremo Hybrid rear vented	Hybrid rear vented	Hybrid rear vented	Hybrid rear vented	Hybrid rear vented
HE-Magnetic Gap Height	16.00mm (0.64")	16.00mm (0.64")	16.00mm (0.64")	6.00mm (0.25")	6.00mm (0.25")	6.00mm (0.25")	6.00mm (0.25")
B-Flux Density	0.70T	0.70T	0.70T	0.80T	0.80T	0.90T	0.95T
BL Product/BXL	4.32	4.32	4.32	6.15	6.35	7.04	9.36
Max. Linear Excursion/Xmax	11.00mm (-5.5mm)	11.00mm (-5.5mm)	11.00mm (-5.5mm)	8.50mm (-4.25mm)	8.50mm (-4.25mm)	8.50mm (-4.25mm)	8.50mm (-4.25mm)
Suspension Compliance CMS	714	727	425	676	721	706	518
Mechanical Q Factor QES	0.61	0.75	1.20	0.42	0.39	0.42	0.46
Total Q Factor Q/T	0.45	0.55	0.72	0.35	0.33	0.35	0.36
QMS	1.72	2.14	2.70	1.99	2.06	2.09	1.69
Mechanical Resistance RMS	1.85kgS1	1.49kgS1	1.49kgS1	1.03kgS1	1.03kgS1	1.28kgS1	2.92kgS1
Moving Mass MMS	7.82gr	8.20gr	15.20gr	11.80gr	13.56gr	21.63gr	49.20gr
Equivalent Cas Air Load VAS	8.00L (0.28ft ³)	14.35L (0.51ft ³)	32.00L (1.14ft ³)	8.00L (0.28ft ³)	14.35L (0.51ft ³)	47.50L (1.68ft ³)	76.40L (2.70ft ³)
Effective Piston Area SD	90cm ² (13.95in ²)	119cm² (18.45in²)	219cm ² (33.95in ²)	90cm ² (13.95in ²)	119cm² (18.45in²)	219cm ² (33.95in ²)	324cm ² (50.22in ²)
Cone Type	One-piece formed	One-piece formed	One-piece formed	One-piece formed	One-piece formed	One-piece formed	One-piece formed
Cone Material	Coated cellular fiber	Coated cellular fiber	Coated cellular fiber	DPC	DPC	DPC	DPC
Unit Diameter	135.00mm (5.25")	165.00mm (6.50")	222.00mm (8.75")	135.00mm (5.25")	165.00mm (6.50")	222.00mm (8.75")	263.00mm (10.35")
Mounting Depth	60.00mm (2.36")	61.00mm (2.40")	71.00mm (2.80")	60.00mm (2.36")	61.00mm (2.40")	71.00mm (2.80")	74.00mm (2.91")
Mounting Cutout	120.00mm (4.72")	141.00mm (5.55")	192.00mm (7.56")	120.00mm (4.72")	141.00mm (5.55")	192.00mm (7.56")	230.00mm (9.05")
Net Weight	1.35kg (3.00lb)	1.47kg (3.20lb)	1.60kg (3.55lb)	1.05kg (2.31lb)	1.18kg (2.60lb)	1.42kg (3.13lb)	1.47kg (3.24lb)

MIDRANGE TWEETERS

	CDM-54	CDM-88	Tempo	MT-12	MT-22	MT-23	MT-37	Supremo	Supremo Piccolo
Nominal Impedance	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	6.00 ohm	6.00 ohm	6.00 ohm	6.00 ohm
Power Handling	100W	100W	80W	80W	110W	130W	200W	220W	200W
Max. Transient Power Handling	300W	300W	250W	250W	300W	350W	1000W	1000W	1000W
Sensitivity (2.83V/1M)	91dB	89dB	91dB	91dB	91dB	91dB	93dB	92dB	90dB
Frequency Response	450-7000Hz	450-7000Hz	1800-22000Hz	1800-22000Hz	1600-25000Hz	1400-25000Hz	1800-22000Hz	1.40 to 25KHz Limit: 0.30–50KHz	1.40 to 25KHz Limit: 0.30–50KHz
FS	300Hz	280Hz	950Hz	950Hz	950Hz	950Hz	700Hz	680Hz	800Hz
Voice Coil Diameter	54.00mm (2.10")	54.00mm (2.10")	28.00mm (1.10")	28.00mm (1.10")	28.00mm (1.10")	28.00mm (1.10")	28.00mm (1.10")	28.00mm (1.10")	28.00mm (1.10")
Voice Coil Former	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum
Voice Coil Wire	Hexatech aluminum	Hexatech aluminum	Copper	Copper	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum
DC Resistance	3.50 ohm	3.50 ohm	3.40 ohm	3.40 ohm	3.40 ohm	5.20 ohm	5.20 ohm	5.20 ohm	5.20 ohm
Magnet System	Neodymium rear vented	Neodymium rear vented	Neodymium	Neodymium	Neodymium	Double magnet neodymium	Ferrite	Neodymium flat pancake design	Neodymium flat pancake design
Dome Type	Acuflex soft dome	Acuflex soft dome	Soft dome	Soft dome	Acuflex soft dome	Acuflex soft dome	Acuflex soft dome	Acuflex soft dome	Acuflex soft dome
Dome Material	Silk	Silk	Silk	Silk	Silk	Silk	Silk	Silk	Silk
Unit Diameter	94.00mm (3.70")	88.00mm (3.50")	45.00mm (1.80")	45.00mm (1.80")	45.00mm (1.80")	45.00mm (1.80")	94.00mm (3.70")	100.00mm (4.00")	67.00mm (2.63")
Mounting Depth	25.00mm (1.00")	25.00mm (1.00")	20.00mm (0.80")	20.00mm (0.80")	20.00mm (0.80")	20.00mm (0.80")	58.00mm (2.30")	50.00mm (2.00")	32.00mm (1.25")
Mounting Cutout	84.00mm (3.30")	84.00mm (3.30")	49.00mm (2.00")	50.00mm (2.00")	50.00mm (2.00")	50.00mm (2.00")	76.00mm (3.00")	100.00mm (4.00")	55.00mm (2.16")
Net Weight	0.25kg (0.55lb)	0.25kg (0.55lb)	0.06kg (0.13lb)	0.06kg (0.13lb)	0.06kg (0.13lb)	0.07kg (0.15lb)	0.56kg (1.23lb)	0.45kg (1.00lb)	0.35kg (0.80lb)

Elate, Hybrid Ovation, Dotech Ovation, Supremo, Supremo Piccolo, Integra Ovation XO, Tempo, Tempo Coax, and Accuset are trademarks of Morel. Specifications and design are subject to change without notice.

WOOFERS

10.50mm (0.41")10.50mm (0.41")8.00mm (0.57")12.00mm (0.48")1.00mm (0.48")<	Hybrid Ovation 4	Hybrid Ovation 5	Hybrid Ovation 6	Dotech Ovation 4	Dotech Ovation 5	Dotech Ovation 6	Integra Ovation XO 4	Integra Ovation XO 5	Integra Ovation XO 6
300V500V500V500V500V500V500V500V600V600VB8G918918986 <td>4.00 ohm</td>	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm
9h8d 9h8d <th< td=""><td>100W</td><td>120W</td><td>140W</td><td>100W</td><td>120W</td><td>140W</td><td>70W</td><td>80W</td><td>100W</td></th<>	100W	120W	140W	100W	120W	140W	70W	80W	100W
b2-200Hz35-300Hz35-300Hz55-300H	300W	500W	600W	300W	300W	300W	250W	250W	400W
Bit/t Bit/t Sit/t	89dB	91dB	91dB	88dB	89dB	90dB	89dB	90dB	90dB
b400m (210")5400m (210")5400m (210")5400m (210")5400m (210")5400m (210")5400m (210")1050m (041")1050m (041")1050m (047)1200m (047)1200m (047)1200m (047)<	50-4200Hz	35-3000Hz	35-3000Hz	50-4000Hz	45-4500Hz	40-4000Hz	60-5000Hz	50-3800Hz	45-3300Hz
10.50mm (0.417)10.50mm (0.417)8.00mm (0.577)12.00mm (0.478)12.00mm (0.478)42.00 mm37.00 mm32.00 mm32.00 mm35.00 mm35.0	82Hz	60Hz	55Hz	95Hz	67Hz	65Hz	92Hz	70Hz	65Hz
AluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumAluminumHexatech aluminumHexatech aluminum6.30416.30416.30416.304	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")	54.00mm (2.10")
Heatech aluminunHeatech aluminunHeate	10.50mm (0.41")	10.50mm (0.41")	10.50mm (0.41")	8.00mm (0.57")	12.00mm (0.48")	12.00mm (0.48")	-	-	-
42 ohm37 ohm32 ohm30 ohm36 oh	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum
0.43MH0.42MH0.17MH0.17MH0.21MH0.17MH0.17MH0.4MH0.4MH0.5MHHybrid rear ventedHybrid rear ventedDouble ferrit rear ventedDouble ferrit rear ventedDouble ferrit rear ventedNoom (0.16")Noom (0.17")Noom (0.20")Somm (0.20")	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum	Hexatech aluminum
Hybrid rear ventedHybrid rear ventedDouble ferrite rear ventedDouble ferrite rear ventedNeodyniumNeodyniumNeodyniumNeodynium5.00mn (0.20°)5.00mn (0.20°)5.00mn (0.20°)4.00mn (0.16°)4.00mn (0.16°)4.00mn (0.16°)4.00mn (0.16°)5.00mn (0.20°)5.00mn (4.20 ohm	3.70 ohm	3.20 ohm	3.00 ohm	3.50 ohm	3.50 ohm	3.40 ohm	3.50 ohm	3.20 ohm
Somm (0.20°)Somm (0.20°)Somm (0.20°)A0mm (0.16°)A0mm (0.16°)A0mm (0.16°)A0mm (0.18°)Somm (0.20°)Somm (0.20°)0.85T1.00T1.00T0.66T0.68T0.68T0.90T0.90T0.85T0.85T5.924.334.472.532.952.973.864.123.953.55mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.00mm (-2.00mm)4.00mm (-2.00mm)4.00mm (-2.00mm)4.00mm (-2.00mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)4.00m (-2.00mm)4.00mm (-2.00mm)4.00mm (-2.00mm)4.00mm (-2.00mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)4.00mm (-2.00mm)4.00mm (-2.00mm)4.00mm (-2.00mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)4.00mm (-2.00mm)4.00mm (-2.00mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)4.00mm (-2.00mm)4.00mm (-2.00mm)4.00mm (-2.00mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)5.50mm (-2.75mm)4.00mm (-2.00mm)4.00mm (-2.00mm)5.50mm (-2.75mm)5.50mm (-2.75mm)<	0.34MH	0.31MH	0.24MH	0.17MH	0.21MH	0.21MH	0.17MH	0.44MH	0.58MH
0.85T1.00T1.00T0.65T0.68T0.68T0.68T0.90T	Hybrid rear vented	Hybrid rear vented	Hybrid rear vented	Double ferrite rear vented	Double ferrite rear vented	Double ferrite rear vented	Neodymium	Neodymium	Neodymium
592433447533295297386412395550m (-2.75m)5.0m (-2.75m)5.0m (-2.75m)6.0m (-2.00m)4.00m (-2.00m)4.00m (-2.00m)5.0m (-2.75m)5.0m (-2.75m)<	5.00mm (0.20")	5.00mm (0.20")	5.00mm (0.20")	4.00mm (0.16")	4.00mm (0.16")	4.00mm (0.16")	4.00mm (0.18")	5.00mm (0.20")	5.00mm (0.20")
S50m (-2.75mm)S10m (-2.75mm)A00m (-2.00mm)A00m (-4.00mm)A00m (-2.00mm)A00m (-2.00mm)S50m (-2.75m)S50m (-2.75m)55191708704567446134699208660.410.550.491.411281.350.700.520.500.500.500.500.500.500.500.500.500.500.500.520.500.520.520.520.520.520.520.520.520.520.520.500.520.520.520.500.520.50<	0.85T	1.00T	1.00T	0.65T	0.68T	0.68T	0.90T	0.90T	0.85T
551 921 70 456 74 613 469 920 806 0.41 0.55 0.49 1.41 1.28 1.35 0.70 0.52 0.57 0.35 0.45 0.42 0.98 0.90 1.09 0.58 0.45 0.52 0.50 2.44 2.54 2.69 3.29 2.99 5.60 3.27 3.23 3.35 0.68kgS1 0.52kgS1 0.60kgS1 0.39kgS1 0.30kgS1 0.32kgS1 0.42kgS1 0.42kgS1 0.42kgS1 0.32kgS1 0.32kgS1 0.32kgS1 0.42kgS1 0.42kgS1 0.32kgS1 0.32kgS1 0.32kgS1 0.32kgS1 0.42kgS1 0.42kgS1 0.32kgS1 0.32kgS1 0.32kgS1 0.32kgS1 0.32kgS1 0.42kgS1 0.42kgS1 0.32kgS1	5.92	4.33	4.47	2.53	2.95	2.97	3.86	4.12	3.95
0.410.550.490.491.411.281.350.700.700.520.570.350.450.420.980.90 </td <td>5.50mm (-2.75mm)</td> <td>5.50mm (-2.75mm)</td> <td>5.10mm (-2.75mm)</td> <td>4.00mm (-2.00mm)</td> <td>8.00mm (-4.00mm)</td> <td>4.00mm (-2.00mm)</td> <td>4.00mm (-2.00mm)</td> <td>5.50mm (-2.75mm)</td> <td>5.50mm (-2.75mm)</td>	5.50mm (-2.75mm)	5.50mm (-2.75mm)	5.10mm (-2.75mm)	4.00mm (-2.00mm)	8.00mm (-4.00mm)	4.00mm (-2.00mm)	4.00mm (-2.00mm)	5.50mm (-2.75mm)	5.50mm (-2.75mm)
0.35 0.45 0.42 0.92 0.92 0.90 1.99 0.92 0.58 0.45 0.45 0.59 2.44 2.54 2.69 2.92 2.99 5.00 3.27 3.23 3.25 3.25 $0.686y^5$ $0.52y^5$ $0.6y^5y$ $0.3y^5y$ $0.3y^5y$ $0.3y^5y$ $0.3y^5y$ $0.4y^5y$ $0.4y^5y$ $0.4y^5y$ $0.3y^5y$ $0.3y^5y$ $0.3y^5y$ $0.3y^5y$ $0.3y^5y^5$ $0.4y^5y^5$ $0.4y^5y^5$ $0.4y^5y^5$ $0.3y^5y^5$ $0.4y^5y^5$ $0.4y^5y$	551	921	870	456	744	613	469	920	806
244 254 269 3.29 5.60 3.27 3.23 3.56 0.686y5 0.52y5 0.60y5 0.39y5 0.36y5 0.32y5 0.42y5	0.41	0.55	0.49	1.41	1.28	1.35	0.70	0.52	0.57
6.68kgS4 0.52kgS4 0.60kgS4 0.39kgS4 0.36kgS4 0.32kgS4 0.42kgS4 0.42kgS4 0.42kgS4 0.38kgS4 6.48gr 7.00gr 9.30gr 4.35gr 7.46gr 10.00gr 4.40gr 5.67gr 6.54gr 3.17L (11ft) 10.50L (0.37ft) 17.30L (0.61ft) 2.68L (0.09ft) 8.47L (0.30ft) 13.00L (0.4ft) 3.00L (11ft) 1.50L (0.37ft) 16.00L (0.57ft) 64ca ² (9.22ir ²) 90cm ² (13.59ir ³) 119cc ² (18.45ir ²) 64ca ⁰ (9.22ir ²) 90cm ² (13.59ir ³) 19cc ² (18.45ir ²) 64cn ⁰ (9.22ir ²) 90cm ² (13.59ir ³) 19cc ² (13.59ir ³) 19cc ² (18.45ir ²) 64cn ⁰ (9.22ir ²) 90cm ² (13.59ir ³) 19cc ² (13.59ir ³)	0.35	0.45	0.42	0.98	0.90	1.09	0.58	0.45	0.50
6.48gr 7.0gr 9.30gr 4.35gr 7.46gr 10.00gr 4.40gr 5.67gr 6.54gr 3.17L (0.11ft?) 10.50L (0.37ft?) 17.30L (0.61ft?) 2.68L (0.09ft?) 8.47L (0.30ft?) 13.00L (0.46ft?) 3.00L (0.11ft?) 10.50L (0.37ft?) 16.50L (0.37ft?) 64cm² (9.92in?) 90cm² (13.95in?) 119cm² (18.45in?) 0ne-piece formed 0ne-piece injected - <td< td=""><td>2.44</td><td>2.54</td><td>2.69</td><td>3.29</td><td>2.99</td><td>5.60</td><td>3.27</td><td>3.23</td><td>3.95</td></td<>	2.44	2.54	2.69	3.29	2.99	5.60	3.27	3.23	3.95
3.17L (0.11ft ³) 10.50L (0.37ft ³) 17.30L (0.61ft ³) 2.68L (0.09ft ³) 8.47L (0.30ft ³) 13.00L (0.46ft ³) 3.00L (0.11ft ³) 10.50L (0.37ft ³) 16.00L (0.57ft ³) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) 64cm ² (9.92in ²) 90cm ² (13.95in ²) 119cm ² (18.45in ²) One-piece formed One-piece injected - <th< td=""><td>0.68kgS1</td><td>0.52kgS1</td><td>0.60kgS1</td><td>0.39kgS1</td><td>0.36kgS1</td><td>0.32kgS1</td><td>0.42kgS1</td><td>0.42kgS1</td><td>0.38kgS1</td></th<>	0.68kgS1	0.52kgS1	0.60kgS1	0.39kgS1	0.36kgS1	0.32kgS1	0.42kgS1	0.42kgS1	0.38kgS1
64cm² (9.92in²) 90cm² (13.95in²) 119cm² (18.45in²) 64cm² (9.92in²) 90cm² (13.95in²) 119cm² (18.45in²) 64cm² (9.92in²) 90cm² (13.95in²) 90cm² (13.95in²) </td <td>6.48gr</td> <td>7.00gr</td> <td>9.30gr</td> <td>4.35gr</td> <td>7.46gr</td> <td>10.00gr</td> <td>4.40gr</td> <td>5.67gr</td> <td>6.54gr</td>	6.48gr	7.00gr	9.30gr	4.35gr	7.46gr	10.00gr	4.40gr	5.67gr	6.54gr
One-piece formed One-piece ingred One-piece ingred<	3.17L (0.11ft ³)	10.50L (0.37ft ³)	17.30L (0.61ft ³)	2.68L (0.09ft ³)	8.47L (0.30ft ³)	13.00L (0.46ft ³)	3.00L (0.11ft ³)	10.50L (0.37ft ³)	16.00L (0.57ft ³)
DPC DPC Composite cellular fiber Composi	64cm ² (9.92in ²)	90cm² (13.95in²)	119cm ² (18.45in ²)	64cm ² (9.92in ²)	90cm ² (13.95in ²)	119cm ² (18.45in ²)	64cm ² (9.92in ²)	90cm ² (13.95in ²)	119cm ² (18.45in ²)
104.00mm (4.00") 135.00mm (5.25") 165.00mm (6.50") 50.00mm (2.00") 60.00mm (2.40") 50.00mm (2.40") 60.00mm (2.40") 60.	One-piece formed	One-piece formed	One-piece injected	-	-	-	-	-	-
50.00mm (2.00°) 60.00mm (2.36°) 61.00mm (2.40°) 50.00mm (2.00°) 60.00mm (2.36°) 50.00mm (2.00°) 60.00mm (2.36°) 61.00mm (2.40°) 95.00mm (3.74°) 120.00mm (4.72°) 141.00mm (5.55°) 120.00mm (3.74°) 120.00mm (DPC	DPC	DPC	Composite cellular fiber	Composite cellular fiber	Composite cellular fiber	Composite cellular fiber	Composite cellular fiber	Composite cellular fiber
95.00mm (3.74") 120.00mm (4.72") 141.00mm (5.55") 95.00mm (3.74") 120.00mm (4.72") 141.00mm (5.55") 95.00mm (3.74") 120.00mm (4.72") 141.00mm (5.55")	104.00mm (4.00")	135.00mm (5.25")	165.00mm (6.50")	104.00mm (4.00")	135.00mm (5.25")	165.00mm (6.50")	104.00mm (4.00")	135.00mm (5.25")	165.00mm (6.50")
	50.00mm (2.00")	60.00mm (2.36")	61.00mm (2.40")	50.00mm (2.00")	60.00mm (2.36")	60.00mm (2.36")	50.00mm (2.00")	60.00mm (2.36")	61.00mm (2.40")
0.53kg (1.17lb) 0.60kg (1.32lb) 0.73kg (1.61lb) 0.54kg (1.19lb) 0.55kg (1.21lb) 0.60kg (1.32lb) 0.50kg (1.10lb) 0.60kg (1.32lb) 0.75kg (1.65lb)	95.00mm (3.74")	120.00mm (4.72")	141.00mm (5.55")	95.00mm (3.74")	120.00mm (4.72")	141.00mm (5.55")	95.00mm (3.74")	120.00mm (4.72")	141.00mm (5.55")
	0.53kg (1.17lb)	0.60kg (1.32lb)	0.73kg (1.61lb)	0.54kg (1.19lb)	0.55kg (1.21lb)	0.60kg (1.32lb)	0.50kg (1.10lb)	0.60kg (1.32lb)	0.75kg (1.65lb)

CROSSOVER NETWORKS

	MX-20-4,5,6	Accuset MX-22.2	Accuset MX-22.2E	Accuset MX-33.3	Tempo Crossover
	MX-20-4,5,6	Accuset MA-LE.E	ACCUSEL MA-LE.LE	Accuset MA-00.0	Tempo Orossover
Nominal Impedance	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm	4.00 ohm
Power Handling	150W	280W	280W	250W	150W
Crossover Point	3200Hz 6dB/octave	1800Hz	1800Hz	Woofer: 300Hz/12dB Midrange: Iow 300dB 6dB, High 3800 Hz 6/12dB (Variable) Tweeter: 3800Hz 6/12db (variable)	3800Hz 6dB/octave
Crossover Controls	Tweeter level -3dB, OdB, +3dB	Frequency slope cut: 6/12 dB Tweeter level: –4dB (2dB steps)	Frequency slope cut: 6/12 dB Tweeter level: –4dB (2dB steps)	Midrange upper frequency slope cut: 6/12dB Midrange level: - 2dB, 0dB, +2dB Tweeter frequency slope cut: 6/12dB/octave Tweeter level: - 2dB,0dB,+2dB	Tweeter level: 0dB, +3dB
Wiring Options	Standard	Standard, bi-amp, bi-wire	Standard, bi-amp, bi-wire	Standard, bi-amp, bi-wire	Standard
Housing Material	Black ABS	Die-cast aluminum (black)	Die-cast aluminum (black)	Die-cast aluminum (black)	Black ABS
Terminal Type	Large screws gold plated	Large screws gold plated	Large screws gold plated	Fully insulated gold plated screw taps	Large screws gold plated
Net Weight	0.21kg (0.46lb)	1.05kg (2.31lb)	1.10kg (2.40lb)	1.20kg (2.65lb)	0.21kg (0.46lb)

Morel Worldwide Partners

Africa

South Africa Pinsh Ltd Tel: +27 11 914 1886 E-mail: sudhir@pinsh.com

Europe

Morel Europe E-mail: europe@morel.co.il

Austria Audio Exklusive Tel: +43 226 662315 E-mail: audio.exklusive@utanet.at

Belaium Eltim Audio Tel: +31 595 491748 E-mail: info@eltimaudio.com

Denmark Euro Guard Tel: +45 702 00043 E-mail: msl@hot-el.dk

England **Flagship Products** Tel: +44 20 8838 8838 E-mail: info@autoaudio.uk.com

Germany Schnabel's Tel: + 49 6241 52249 E-mail: schnabel.worms@t-online.de

Greece Electric Life Hellas S.A. Tel. +30 210 6918450 E-mail: mary@electriclife.gr

Ireland **Incar Solutions** Tel: +353 42 935 4530 E-mail: incarsolutions@eircom.ie

Italy/San Marino Unicars Italia srl Tel: +39 039 62410 228 E-mail: info@unicars.it

Lithuania D.Kubiliaus firma Muzkinis Garazas Tel: +370 7 310080 E-mail: info@audiovideo.lt

Luxembourg Eltim Audio Tel: +31 595 491748 E-mail: info@eltimaudio.com

Netherlands Eltim Audio Tel: +31 595 491748 E-mail: louis.timmers@eltim.nl

Norway Bergene AV & Bilstereo Tel: +47 901 11 101 E-mail: post@morel.no

Poland P.H.U. Sonia Draga Tel: +48 32 782 64 75 E-mail: info@soniadraga.com.pl

Russia Anex Tel: +7 095 285 0550 E-mail: info@anexaudio.com

Slovak Premium HP Tel: +42 12 44 451 000 E-mail: info@premiumhp.sk

Slovenia Unicars Italia srl Tel: +39 039 62410 228 E-mail: info@unicars.it

Spain Car Gourmet Import . Tel: +34 96 149 80 67 E-mail: comercial@cargourmetimport.com

Switzerland Unicars Italia srl Tel: +39 039 62410 228 E-mail: info@unicars.it

Turkey Ulka co. Tel: +9 0216 540 81 00 E-mail: ulkao@ulkainsaat.com

America

Canada MR Acoustics Ltd. Tel: +1 604 277 7897 E-mail: mracoustics@shaw.ca

Chile Equipa Tel: +56 2 4368011 E-mail: rlittle@equipa.cl

Mexico **G&R** Electronics Tel: +52 33 36298458 E-mail: morelmexico@prodigy.net.mx

Pacific Rim

Australia R.M. Audio Tel: +61 3 938 02211 E-mail: sales@rmaudio.com.au

China / Hong Kong Galance Technology Tel: +852 2 604 9284 E-mail: gtechi@hkstar.com

India Preeti Trading Cooporation Tel: + 91 22 2385 9820 E-mail: kamaldhingreja@hotmail.com

Indonesia Roma Motors Tel: +62 21 639 1617 E-mail: roma@centrin.net.id

Japan American Audio Enterprise Co. Ltd. Tel: +81 45 624 3253 E-mail: office@american-audio.co.jp

Korea Sovico AV Tel: +82 2 070 4525 E-mail: webmaster@sovico.co.kr

Malaysia Autocraft Tel: +60 3 807 09231 E-mail: autocraft@po.jaring.my

Philippines **Xyver Trading Corporation** Tel: +632 641 0693 E-mail: xyver@mydestiny.net

Singapore Roma Motors Pte Ltd. Tel: +65 674 27710 E-mail: romasin@singnet.com.sg

Taiwan Meileye Enterprise Co. Ltd. Tel: +886 2 221 16518 E-mail: A2310017@ms15.hinet.net

Thailand Car Audio & Accessories Co. Ltd. Tel: +66 2 559 3795 E-mail: zuwim@mozart.co.th



Morel, Ness Ziona 70400, Israel E-mail: info@morel.co.il Phone: +972 8 930 1161 Fax: +972 8 930 1312

Morel America Inc. Astoria, NY E-mail: usa@morel.co.il Phone: +1 800 464 8569 Fax: +1 718 721 1560 www.mo<u>relhifi.com</u>