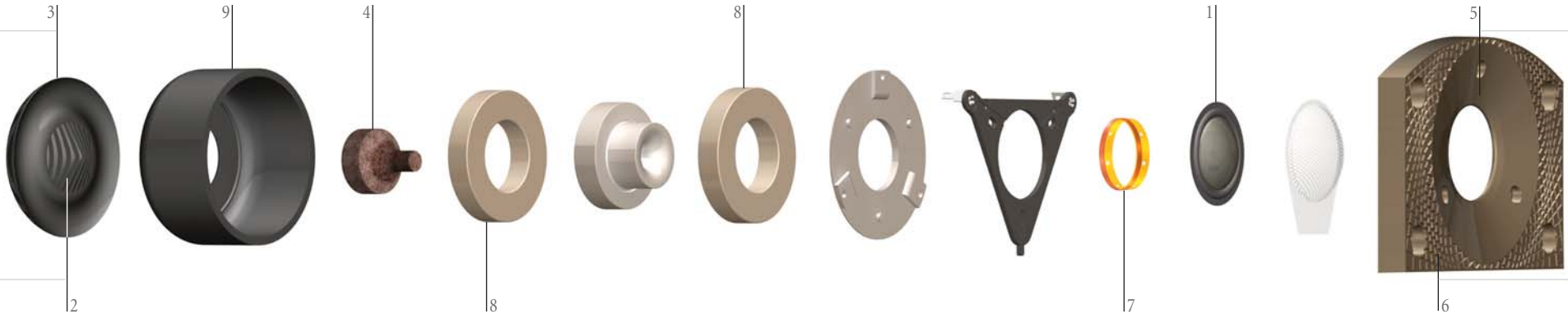
Signature. Love to listen.

The finest speakers in the world are a medium for the music, an open window on the original performance. They take us from the mundane to the magical, beyond the ordinary to the extraordinary. They are a reflection of character. Not the sonic character of the speaker, since speakers claiming to be the finest must be devoid of acoustic personality. Rather, the finest speakers deliver an intimate unfolding of the songwriter's mood, the composer's message, the director's vision.

For music or home theater there is no more sonically coherent choice than Paradigm® Reference Signature speakers. They allow us to feel the music, hear the magic, and see, through the mind's eye, into the very heart of the performance.



Paradigm® Reference *Signature* High-Frequency Drive Units

1 **P-Be™ Pure-Beryllium Tweeter Domes:**
Pure beryllium was chosen for its exceptional mechanical properties: lighter than aluminum with unmatched rigidity. Power response is instantaneous and extraordinarily uniform. The elevated dome promotes optimal off-axis dispersion.

2 **ARB™ Aperiodic Resonance Breakup Fins:**
Die-cast aluminum fins in rear damping chamber capture and quickly disperse residual internal resonances, rendering them inert.

3 **Unique Exterior Heatsink Fins:**
Heat dissipation fins on exterior of chamber promote superior power handling.

4 **Proprietary High-Loss Felted Acoustic Dampers:**
Provide critical damping of internal resonances.

5 **Die-Cast Aluminum WaveGuide™ Coupling:**
Fosters controlled, uniform dispersion as well as accurate phase response throughout a large listening window.

6 **High-Pressure Die-Cast Aluminum Heatsink Chassis:**
Exceptionally rigid, eliminating mechanical flexing and ringing while also providing a heatsink for superior power handling.

7 **High-Temperature Copper-Clad Aluminum-Wire Voice Coils:**
A rigid low-mass design wound on an Apical™ former promotes much higher power handling, ultra-low distortion and long-term reliability.

8 **Dual Super-Neodymium Magnet Structures:**
Dwarfs all other neodymium magnet structures found in high-end tweeters, supplying superior sensitivity, ultra-low distortion and far greater power handling. The intense energy created in the magnetic gap (20,000 gauss) allows for overfilling of ferro-fluid effecting superior heat transfer. The tweeter virtually "idles" under normal operating conditions.

Computer-Optimized Magnet/Motor Assemblies:
Magnets and motor components are computer-optimized for ultimate performance.

9 **Integrated Heavy-Walled Shielding Cup** is critically contoured to eliminate stray magnetic fields from the neodymium superstructure. The cup also acts as a thermal conduit for the rear heatsink.

Paradigm® Reference *Signature* Midrange & Bass/Midrange Drive Units

1 | **Co-PAL™ Cobalt-Infused Anodized Pure-Aluminum Midrange and Bass/Midrange Cones:**
Combine high stiffness-to-mass with superior internal damping for an even greater degree of accuracy. The result is smooth, uncolored frequency response and exceptional freedom from unwanted resonances and distortion.

2 | **Dual ATC™ Asymmetrical Tapered Channels** (Midrange driver only)**:**
Dual function, precision die-cast aluminum chamber with dual tapered channels provides optimal internal volume. The asymmetrical design dissipates the back wave from the cone. The center of the chamber is direct-coupled to the magnet structure providing an efficient thermal escape path for heat generated by the voice coil.

3 | **Proprietary High-Loss Felted Acoustic Dampers:**
Provide critical damping of internal resonances.

4 | **Advanced Nomex® Suspensions and Butyl-Rubber Surrounds:**
Foster linear cone excursion, minimizing compliance-induced distortion. High hysteresis and progressive damping eliminate "edge-hole" distortion which occurs when the cone's suspension begins to resonate uncontrollably.

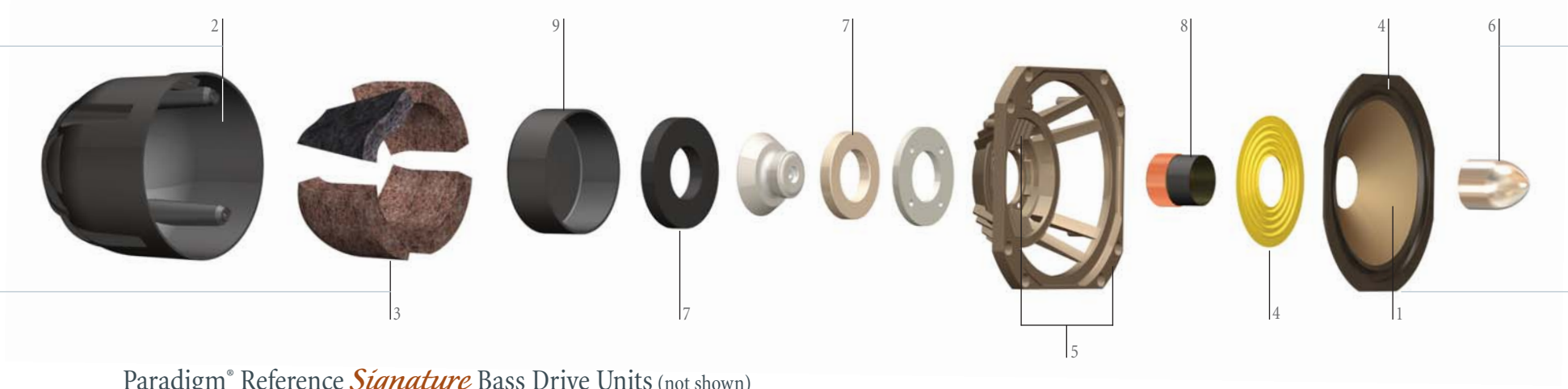
5 | **High-Pressure Die-Cast Aluminum Heatsink Chassis with AVS™ Cooling:**
Exceptionally rigid design eliminates mechanical flexing and ringing. AVS™ Airflow Ventilation System cooling boosts power handling and ensures ultra-low distortion and exceptional reliability. Chassis are CNC-machined to ensure a precision fit.

6 | **Anodized Solid-Aluminum Phase Plugs:**
Promote smooth, extended frequency response and ultra-efficient heat dissipation. Critically shaped to ensure wide, uniform off-axis dispersion.

7 | **Computer-Optimized Super-Neodymium Magnet Structures** (Midrange driver only)**:**
Provide 50% more energy in the magnetic gap, saturating the pole piece and virtually eliminating inductive distortion.

8 | **Lightweight Copper-Wire Voice Coils:**
High-temperature rigid low-mass design wound on ventilated Kapton® former ensures superb accuracy and reliability.

9 | **Heavy-Walled Shielding Cup** is mounted on the magnet system to help eliminate stray magnetic fields.



Paradigm® Reference *Signature* Bass Drive Units (not shown)

Mineral-Filled Polypropylene Bass Cones:
Superior stiffness-to-mass ratio with critical internal damping. Precision engineered for higher sensitivity, higher power handling and ultra-low levels of distortion.

Massive Optimized Magnet/Motor Assemblies with Focused-Field Geometry:
Breakthrough design/technology allows the use of massive ceramic/ferrite-composite magnet/motor structures (3.6 kg / 8 lb each in the S8!) yielding extremely high output, remarkably low distortion and excellent power handling.

High-Pressure Die-Cast Aluminum Chassis with AVS™ Cooling:
Rigid design eliminates mechanical flexing and ringing. Heatsink chassis and AVS™ Airflow Ventilation System cooling boost power handling while also ensuring ultra-low distortion and greater reliability. Chassis are CNC-machined to ensure precision fit.

Lightweight Long-Travel Aluminum- or Copper-Wire Voice Coils:
High-temperature rigid low-mass voice coils wound on ventilated Kapton® or Apical™ formers guarantee superb accuracy and exceptional reliability.

Technical Specifications

Design
3-driver, 2-1/2-way,
bookshelf / stand-mounted,
shown on J-23 stand*

S4

Crossovers
3rd-order electro-acoustic at 1.9 kHz;
2nd-order electro-acoustic at 400 Hz
(bass driver)

High-Frequency Driver
25-mm (1 in) P-Be™ dome; ferro-fluid damped / cooled; rear damping chamber with ARB™ fins and integrated heatsink; dual super neodymium magnets; die-cast heatsink chassis; IMS/SHOCK-MOUNT™

Bass / Midrange Driver
178-mm (7 in) Co-PAL™ cone; anodized solid-aluminum phase plug; 38-mm (1-1/2 in) dual-layer voice coil; ceramic / ferrite magnets; AVS™ die-cast heatsink chassis; IMS/SHOCK-MOUNT™

Bass Driver
178-mm (7 in) mineral-filled polypropylene cone; 38-mm (1-1/2 in) dual-layer voice coil; massive ceramic / ferrite magnets; AVS™ die-cast heatsink chassis; IMS/SHOCK-MOUNT™

Low-Frequency Extension*
35 Hz (DIN)

Frequency Response
On-Axis:
±2 dB from 56 Hz – 45 kHz

30º Off-Axis:
±2 dB from 56 Hz – 20 kHz

Sensitivity – Room / Anechoic
91 dB / 88 dB

Suitable Amplifier Power Range
15 – 325 watts

Maximum Input Power†
180 watts

Impedance
Compatible with 8 ohms

Internal Volume
21.4 L / 0.75 cu ft

Height, Width, Depth
55.9 cm x 21.0 cm x 35.6 cm
22 in x 8-1/4 in x 14 in

Weight
39 kg / 86 lb per pair

Available Finishes
Cherry, Natural Birdseye Maple,
Piano Black

Matching Paradigm® Speaker Stand
J-23

**DIN 45 500. Indicates -3 dB in a typical listening room. †With typical program source, provided the amplifier clips no more than 10% of the time. Heights for floorstanding models include spikes and outrigger feet; widths do not include feet. Paradigm® stands sold separately, see your Dealer.*