"... STAGGERING ... A SENSATIONAL JOB ... second to nothing I'm familiar with."

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HOME THEATER

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"The Signature series is the real deal ... sounds effortless at any playback level ... breathtaking imaging and incredible dynamics."

by Kris Deering

PARADIGM ELEVATES THE ART

A few years ago, I had the opportunity to attend a demonstration of Paradigm's Reference Signature Series at its quasi-premiere. I'd been a long-time fan of Paradigm's Reference line of loudspeakers, and I was excited to see its new flagship paired with Anthem's Statement products.

When I walked into the room, I immediately felt bad for the folks at Paradigm. The demo room was overly large and poorly treated. Given the conditions, I didn't think Paradigm had much of a chance to shine. Boy, was I wrong. Not only did the Signatures perform at a level few demonstrations I've heard have ever provided, they were the buzz of the event. Every person I met with over the next few days talked about how amazing that demo was, despite other outstanding demos from other speaker manufacturers at the same event.

Ever since then, I've been eager to have a go at Paradigm's flagship line of speakers. The fact that they sounded so effortless in that enormous room made me wonder how they would sound in a more realistic home theater environment. Now several years later, I have that chance.

DIFFERENT CABINETS, ONE VOICE

I put together a five-channel system for this review. Paradigm's flagship S8 floorstander handled the main speaker duties. To round out the system, I chose the C5 center channel and a pair of ADP3 surrounds. All of these models share the same drivers, and Paradigm went out of its way to ensure timbre matching across the series.

This isn't the first time *Home Theater* has reviewed the Signature speakers, but Paradigm has made some changes to the line in the last few years. The original Signature line featured aluminum-domed tweeters, which the industry has praised for their light weight and stiffness. The new line goes different route and features beryllium-domed tweeters. Manufacturers have used beryllium in tweeter designs for some time now, mainly as a strengthening agent. Beryllium-domed tweeters are now a burgeoning trend in high-end designs. Beryllium's combination

Paradigm Reference Signature S8 Speaker System

PERFORMANCE ★★★★★

VALUE ★★★★½

BUILD QUALITY ★★★★½


C5

of low weight and extremely high rigidity make it an intriguing tweeter diaphragm material. We haven't seen a lot of beryllium-domed tweeters because the metal is hard to work with. Plus, inhaling beryllium's dust (usually only an issue during manufacturing) is toxic. Paradigm is one of those rare companies that is so vertically integrated, it was able to tool for safely working with the metal and make its tweeter domes from a pure sheet.

"… the Signatures perform at a level few demonstrations I've heard have ever provided … AMAZING … sounded so effortless in that enormous room made me wonder how they would sound in a more realistic home theater."

Paradigm is notable among speaker manufacturers for making so many of its speakers' components in-house. On these speakers, only the cabinets are outsourced from China. Paradigm's Canadian facilities are world renowned, and the company even makes its own machines for component tooling. Paradigm tests all its speakers in an anechoic chamber and then performs listening tests in a double-blind testing room.


ADP3

The S8 is a three-way design with a total of six drivers. This includes the beryllium-domed tweeter, a cobalt-infused anodized aluminum coned midrange, and four 7-inch bass drivers. The cabinet widens as it flows back, and the top has a nice curve as well. Paradigm designed the grille to aid in sound dispersion, not just to protect your cones from probing fingers.

"The new tweeter sounded effortless at any volume … when you have a large room to fill, speakers tend to fumble in the upper end … the S8's didn't sound the least bit taxed …"

There's a single port below the lowest driver for low-end augmentation. The S8 provides some serious low-end energy, which is useful if the room placement supports it. However, you need to integrate a subwoofer to get the full-bodied effect of synthesized ultra-low-frequency sounds.

The flagship C5 is a beast of a center; it weighs in at more than 80 pounds. The cabinet curves back from the front baffle and tapers in the back. Like the rest of the Signature line, it's available in a wide variety of high-gloss finishes and is designed for use with the front grille on. The C5 is a three-and-a-half-way speaker that adds a smaller aluminum-coned midrange driver right below the beryllium tweeter. This configuration eliminates many of the problems associated with center speakers that use horizontally configured drivers. A pair of 7-inch aluminum-coned mid bass drivers and two 7-inch bass drivers flank the tweeter and midrange, for a total of six drivers. Paradigm designed the upper models of the Signature line as full-range loudspeakers. The company rates all of these speakers' bass extension in the mid-20-hertz range. I was definitely impressed with their low-frequency performance, even at very loud listening levels.

"I was impressed by the S8's low end … standup bass never sounded bloated … plucked notes were tight … a great balance of body without sounding loose."

For surround speakers, I used Paradigm's Signature ADP 3. Movie theaters use an array of speakers for their surround sound duties, which creates a very enveloping surround soundfield. It's hard to localize where that sound is coming from. Dipolar speakers mimic this envelopment by casting the sound out from the sides rather than directly at the listener. This helps keep the listener in a null zone, which makes it difficult to localize the surround speakers. The ADP 3 uses matched beryllium-domed tweeters on each side, along with two 4-inch cobalt-infused anodized-aluminum-coned midrange drivers. Although it is considerably smaller than the rest of the Signature models, Paradigm still wanted full-range performance. In order to do this, the ADP 3 utilizes a single 8-inch low-bass driver that is located in the center of the cabinet. Since low bass is omni directional, it doesn't have any negative effect on the speaker's imaging. Like the C5, the

ADP 3 is a large speaker for its duties, and I was a bit worried about mounting it. However, Paradigm includes a template for wall mounting as well as the appropriate hardware, which makes installation pretty painless.

"The C5 is one of the best centers I've used for its ability to disappear … voicing blended seamlessly with the flanking S8's … an extremely cohesive soundstage … no change in timbre during pans … imaged beautifully …"

PERFORMANCE

Since I had such an amazing first impression of the Signature line, I wondered if they would live up to my high expectations. I also wondered how much difference I would detect in performance now that they had a new tweeter. I positioned the main speakers about 3 to 4 feet from my front and sidewalls, which gave them plenty of breathing room. I started with the speakers positioned in a perfect equilateral triangle, but I eventually moved the S8's in just a touch and toed them in slightly. This gave me the best balance of low-bass performance and imaging.

Without a doubt, the S8's most captivating quality is its upper end. The new tweeter sounded effortless at any volume I tried. I like to play my music loud, and when you have a large room to fill, speakers tend to fumble in the upper end and cause fatigue and strain. I auditioned a number of concert videos, including selections from the Eagles, Diana Krall, and my personal favorite, Nine Inch Nails. The latter provided a system threatening level of dynamics on Blu-ray. The speakers I used before the S8's had a hard time keeping up with this release at near-reference levels in my theater room. The S8's didn't sound the least bit taxed, although my ears (and wife) started to complain.

"Movie dialogue seemed to float effortlessly above the C5 … it anchored perfectly with the image …"

With Diana Krall in the mix, I was impressed by the S8's low end. The standup bass never sounded bloated, while plucked notes were tight and provided a great balance of body without sounding loose.

The C5 is one of the best centers I've used for its ability to disappear. I set up the C5 on the matching floor stand below my screen, about 3 feet forward from the front wall. The C5's voicing blended seamlessly with the flanking S8's. It created an extremely cohesive soundstage with no change in timbre during pans across the main soundstage. I'm always a bit skeptical of center channels with tweeters that are located considerably higher or lower than the main speakers. However, the C5 imaged beautifully within the vertical soundstage.

"The ADP 3 provided a wide soundfield … lived up to its promise of non-localization … a sensational job creating a realistic surround soundfield — reproducing discrete sounds or just the sense of enveloping ambience … engulfing … better than my matched surrounds."

Movie dialogue seemed to float effortlessly above the C5, and it anchored perfectly with the image. This sensation of vertical sonic imaging became even more evident with multichannel music. I used a wide assortment of DVD-Audio content to test the main soundstage, and I never had an issue with imaging or tonal balance.

The ADP3 provided a wide soundfield and lived up to its promise of non-localization. This was incredibly apparent with the Blu-ray release of *Master and Commander: The Far Side of the World*. The movie has an incredibly engrossing soundtrack that images better than just about anything I've heard. The soundfield is seamless from front to back and even overhead, which is a rarity in my experience. The ADP3s did a sensational job creating a realistic surround soundfield, whether it was reproducing discrete sounds or just the sense of enveloping ambience. I was somewhat worried about how a dipole design would do with multichannel music selections. I've used matched surrounds for quite a few years now, and I love how perfectly they blend with the mains as music pans from front to back. Although the ADP 3's gave up some of that pinpoint imaging, they still did a great job creating an engulfing soundfield. With 5.1-channel music recorded with an audience mix that puts you in the crowd, they actually did better than my matched surrounds. The sense of environment that the ADP 3's provided was staggering. There was just a better sense of atmosphere and space.

Since the ADP3s strive for an open soundfield, music with a stage mix sounded a bit too diffuse. It didn't distract me as much as I thought it would, but choir recordings just didn't have the same effect as they do with a direct-radiating matched speaker. But given the ADP3's performance with movie soundtracks and concert performances, I would be more than happy to give up that last degree of imaging precision.

CONCLUSION

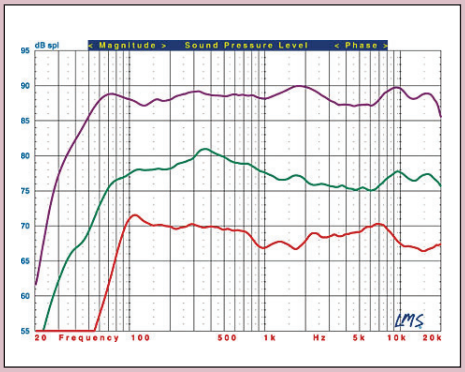
As a cohesive unit, the Signature setup was second to nothing I'm familiar with. The experience I had with this setup was just as impressive as my experience a few years ago. The Signatures rendered the most demanding 5.1 mixes with no signs of fatigue at all—even at reference levels. They deliver dynamics with aplomb, and the seamless imaging from speaker to speaker is a testament to their design.

"The sense of environment that the ADP 3's provided was staggering … a better sense of atmosphere and space."

It's always a lot of fun to see what a world-class speaker manufacturer can deliver when it sets out to create a flagship design. The Signature series is the real deal. It sounds effortless at any playback level and provides breathtaking imaging and incredible dynamics. I've found my new reference.

HT LABS MEASURES

This graph shows the quasi-anechoic (employing close-miking of all woofers) frequency response of the S8 L/R (purple trace), C5 center channel (green trace), and ADP3 surround (red trace). All loudspeakers were measured with grilles at a distance of 1 meter with a 2.83-volt input and scaled for display purposes.



The S8's listening-window response (a five-point average of axial and +/-15-degree horizontal and vertical responses) measures +0.97/-1.90 decibels from 200 hertz to 10 kilohertz. The -3-dB point is at 51 Hz, and the -6-dB point is at 42 Hz. Impedance reaches a minimum of 4.21 ohms at 98 Hz and a phase angle of -83.18 degrees at 57 Hz.

The C5's listening-window response measures +3.47/-2.46 dB from 200 Hz to 10 kHz. An average of axial and +/-15-degree horizontal responses measures +3.50/-3.17 dB from 200 Hz to 10 kHz. The -3-dB point is at 66 Hz, and the -6-dB point is at 56 Hz. Impedance reaches a minimum of 4.55 ohms at 992 Hz and a phase angle of -55.48 degrees at 84 Hz.

The ADP3's three-face averaged response measures +0.19/-3.39 dB from 200 Hz to 10 kHz. The -3dB point is at 83 Hz, and the -6 dB point is at 75 Hz. Impedance reaches a minimum of 3.87 ohms at 17.4 kHz and a phase angle of -69.92 degrees at 93 Hz.

–MJP