

SETTING UP YOUR HOME THEATER



WITH DIGITAL CABLE RADIO

BY LARRY JAFFEE

Now that you've begun to appreciate all the pristine music offerings your Digital Cable Radio provides, it's time to get even more out of your Digital Cable Radio subscription.

How would you like to have a movie theater — or at least the sound of one — right in your living room? The Digital Cable Radio tuner makes it possible to create an "In Home Theater" and enjoy complete "surround sound" of films on HBO, Cinemax and Showtime (which are simulcast by Digital Cable Radio) through a multi-speaker upgrade of your existing stereo system.

Surround sound lets different parts of the soundtrack move about and reach the audience from various directions, depending upon the action on the screen, which is why you'll need several speakers. Without a multi-speaker set-up, you only receive sound from one direction. But a multi-speaker set-up delivers sound from several different directions, creating the sensation of being right in the center of the action.

"When watching a movie like *Top Gun* on a surround sound audio-video system, you almost feel the wind pulling you

Larry Jaffe's articles on music have appeared in Billboard, Rolling Stone and Pulse.

along," says Steve Farwell, an audio consultant to a Manhattan hi-fi store, about the 3-D realism of surround sound. "That's how real it is."

Hence, when watching films on video-cassette or cable TV, we've been missing out on all kinds of sounds — sometimes even dialogue — that the directors originally intended. And because Digital Cable Radio is delivered digitally, the sound becomes all that much more dramatic.

Broadcast television technology doesn't allow you to pick up the audio nuances recorded during the making of most movies, especially those produced in recent years. But Digital Cable Radio delivers the same CD-quality sound for its simulcasts as it does on its music channels.

"No matter how you receive your TV broadcast — via cable or a satellite dish — a TV set's audio system can't handle the wide dynamic range. Digital Cable Radio provides that full dynamic range," explains Clyde Robbins, Digital Cable Radio's senior staff scientist.

Combine Digital Cable Radio with a surround sound audio-video system, and you'll enjoy all the sonic information embedded in a movie soundtrack, as well as the acoustics of a movie theater, without leaving your home.

One thing to remember when embarking on a home theater system is that you don't need to reconnect your Digital Cable Radio hookup. Just add on your decoder, if it's not built into your receiver, and reposition your speakers, whose placement is of utmost importance.

ESSENTIAL COMPONENTS

All that is required for such an audio-video home entertainment center are the additional "surround" speakers, and an integrated sound processor/decoder. A digital signal processor allows you to choose the ambience of the music, so that — in your living room — your stereo will recreate the live experience of a concert

hall, a jazz club, a church or even a disco. The additional speakers are required to channel certain sounds to different positions when necessary, such as during action scenes. In order to achieve a three-dimensional sound effect, a minimum of four speakers are required. The additional speakers, which will be placed in the rear of the room, don't have to be of particularly high quality, since they will not carry the dialogue sounds. A more sophisticated effect will be created through a six-speaker set-up. This will allow for an even more dramatic positioning of sound.

In the four-speaker set-up (see diagram 1), the better of the two pairs of speakers should be placed in front by the television set, one speaker on either side and a minimum of two feet from the television. The second pair should go in the rear of the room.

In a six-speaker set-up (see diagram 2), position the front two speakers the same way and a third below the television — this speaker will handle most of the dialogue and must be near the TV image. A second pair of speakers should be placed in the rear. The sixth speaker is a subwoofer, which produces the deep bass sounds and can be placed anywhere in the room. Its role is to generate the low bass sounds from special effects and background music.

For someone looking to upgrade an existing system, surround sound can be achieved by adding a decoder/sound pro-

FOUR SPEAKER SET-UP

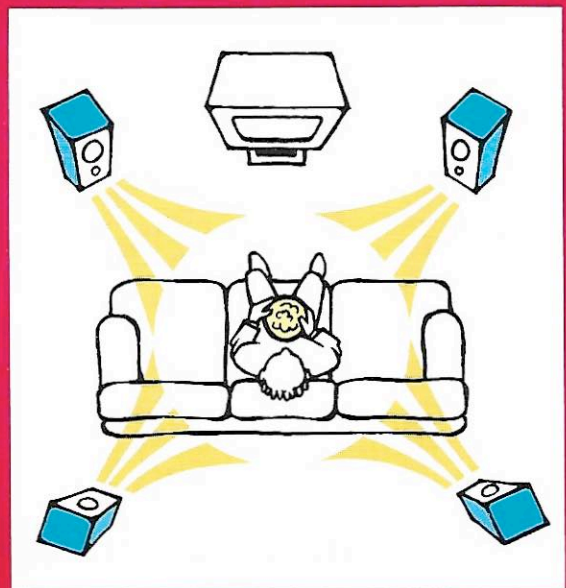


DIAGRAM 1

cessor and a couple of speakers for as little as a few hundred dollars.

Some stereo receivers and VCRs have built-in, surround sound decoders. And some high-priced "home theater" television sets advertise built-in "surround sound" speakers, but aren't "true surround sound" unless rear speakers are hooked up. For those building their home theater from scratch, there are a variety of options from which to choose. The type of home theater you set up depends on your budget and the level of sound quality you are hoping to achieve.

A MODESTLY-PRICED SYSTEM

A modestly-priced system can make it possible for you to experience the feel of surround sound. Radio Shack sells a \$129.95 Dolby surround decoder/amplifier that can be hooked up to lower-range priced components. Speakers can cost as little as \$50 a pair. Such a lower-priced system will still create the "you-are-there" effect. And if you happen to turn on a science fiction movie, you will hear the asteroids swooshing across the screen from rear to front speakers like you never have before.

MORE SOPHISTICATED OPTIONS

More sophisticated sound processors/decoders incorporate Dolby Pro-Logic circuitry. These models begin at several hundred dollars more than the model at Radio Shack and go up in price as features and fidelity increase. These processors will allow you to take advantage of the six-speaker set-up even if you don't buy the additional speakers right away. You can add on to your home theater as your pocketbook permits.

For Digital Cable Radio subscribers with limited space for the audio/video system, a solution would be a compact home theater system (such as the Atlantic Technology Pattern 200 System) that con-

SIX SPEAKER SET-UP

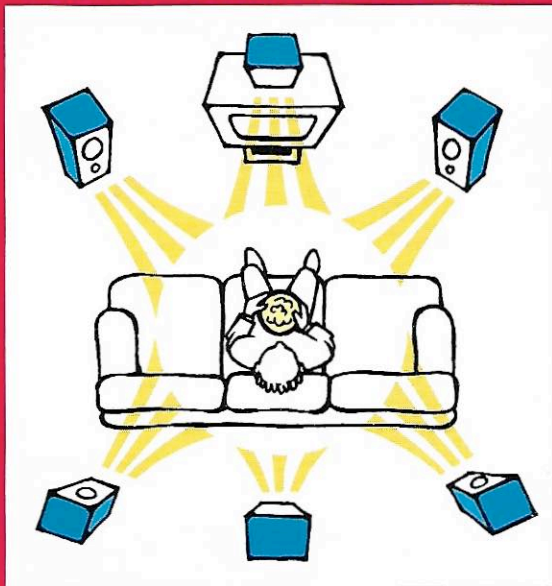


DIAGRAM 2

sists of five tiny speakers, a small book-sized Dolby Pro-Logic decoder and a sub-woofer. The self-powered surround sound system, which sells for about \$1,100, is easy to install with color-coded wires. It's a great way to avoid a rat's nest of wires, and its sound quality will be satisfactory for many people seeking to set up a home theater.

SEPARATE COMPONENT SYSTEMS

It is increasingly common today to buy stereo and video components separately, rather than as a single package from one manufacturer. This gives you the flexibility of tailoring your system to your particular needs and tastes, and it allows you to buy components from a variety of manufacturers based on their strengths. It enables you to mix and match. The first step in buying a component system is to establish a budget. Then the budget must be divided among the various components.

If your budget is a relatively modest one, you still have many options. A recent *Stereo Review* article recommended that a good-sounding, moderately-priced "starter" component system can be put together by making the following purchases: bookshelf speakers, \$300 a pair; AM/FM receiver (30 to 60 watts), \$300; CD player, \$200; a turntable and cartridge, \$200; surround sound processor and rear speakers, \$400; for a total cost of \$1,400. That's omitting a cassette deck.

At the high end, the magazine's recommended "surround sound system" encompasses: floor-standing main speakers, \$700 a pair; center-channel speaker, \$200; surround speakers, \$200 a pair; audio/video receiver, \$800; CD/laser disc combination-player, \$600; turntable and cartridge, \$450; cassette deck, \$500; DAT (digital audio tape) deck, \$750; for a grand total of \$4,200. Regardless of which direction you take, it is suggested that you stick with well-known brands that provide good quality and back up their products with warranties.

BEYOND MOVIES

Not only movies are enhanced with surround sound. Music videos played on MTV and VH-1 (both simulcast by Digital Cable Radio) will sound even better with a decoder and surround sound. "Most people have never been able to hear the music videos the way they should sound," comments Bob Kelly, Digital Cable Radio's technical support manager.

Hence, whether your musical tastes are classical or hard rock, you can relish the subtle string caresses from your favorite concerto or suddenly be shaken by electric guitar power chords, as if the New York Philharmonic or the Who's Peter Townsend were performing in your living room.

MOVIES WITH EXCEPTIONAL SOUND

RAIDERS OF THE LOST ARK

TOP GUN

THE DOORS

BARTON FINK

RAGING BULL

APOCALYPSE NOW

PLATOON

THE BIRDS

GHOST

BATMAN