

# OWNER'S MANUAL

MODELS

IM5200 IM8200 IM8300 SERVO 10 SERVO 12



# "EVOLUTION IN PROGRESS FOR THE PLEASURE OF MUSIC"

Congratulations on your choice of a Genesis Technologies loudspeaker.

The product you have just purchased is a result of many years of work.

Indeed, it has been a labor of love. The love of music and love of the art and science of musical reproduction.

It is our sincere belief and, in fact, our personal commitment to you that this "musical instrument" purchased from Genesis will provide years of enjoyment.

All Genesis products carry our personal assurance that it is the finest unit that we know how to make.

Genesis and indeed all our dealers, will make every effort to ensure your satisfaction with this purchase and any future Genesis Technologies' product you may decide to invest in.

Should you have any questions, with respect to the quality of the product or the level of service from your dealer, we would like to know about it.

Good Listening!

Arnie Nudell President

Paul McGowan
Executive Vice President

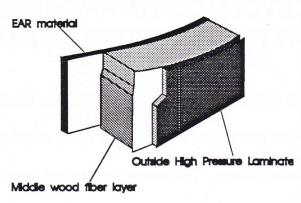
# THE TECHNOLOGY BEHIND YOUR LOUDSPEAKER

# The enclosure

All Genesis loudspeakers have a common style of cylindrical enclosure as standard.

This circular shape is central to the infrastructure of our design.

Like the architectural simplicity of an arch, support is distributed over the entire curvature of the structure. It results in a consistently rigid design that is absolutely immune to back pressure flexing.



The enclosure walls are made of a special tri-laminated material. A central wood fiber laminate core is sandwiched between an inner damping layer and an outer layer.

The inner **EAR** layer is a special composite sound damping material developed for vibration suppression in jet aircraft.

The outer layer is comprised of a special high pressure laminate. Together, the resonant characteristics of the three layers tend to offset one another for an extremely stiff, exceptionally strong combination that's virtually inert to vibration and resonances.

# The drivers

All Genesis woofers are injection molded Kevlar, in a base of polypropylene. These proprietary drivers are found only in Genesis Technology loudspeakers.

Kevlar is an extremely lightweight material with high tensile strength.

It adds a superior degree of rigidly to the excellent damping qualities of polypropylene without adding unnecessary weight.

The overall characteristics of this diaphragm material enable the woofer to respond quickly and accurately to transients without adding coloration or distortion in the



process.

The midrange driver used in the Genesis three way model is also unique. It uses a large 3" voice coil attached to a 3" Titanium silicon carbide dome.

This technology has created one of the lightest and stiffest materials known to science.

This design eliminates breakup modes through the entire middle frequency range.
The large, lightweight dome provides tremendous dispersion and dynamic range while retaining its coherent musical quality.



The high frequency driver, or tweeter, used in all Genesis full range loudspeakers is a proprietary planar design featuring a circular and flat membrane. This incredibly lightweight membrane is actually lower in mass than the air in front of it.

The circular ribbon tweeter extends dispersion evenly over the entire front hemisphere, horizontally, vertically and all points in between.

The advantages of this tweeter will be obvious the first time you hear it. What you'll notice is the speed of the best ribbon/electrostatic designs without the high distortion and poor dispersion that is commonly associated with them.

Practically speaking, it enables the system to accurately image the airy quality and spaciousness of delicate musical passages. Once properly set-up, your new Genesis Loudspeaker will produce highs in a manner most Audiophiles have never had the privilege of enjoying.

# The crossover

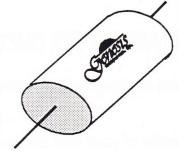
Genesis crossovers are the result of extensive computer modeling. Their designs are quite unique and have taken years to perfect.

All three Imaging Modules, for instance, have unusually deep and non-resonant bass due to a unique anti-resonance circuit that effectively cancels the speaker enclosure/resonance normally associated with all sealed and ported designs.

Every component was carefully chosen for its sonic qualities. Each resistor, coil, and capacitor was extensively listen tested.

Even the phase coherent filter slope of the tweeter has been designed with our own proprietary capacitive element.

After months of listening and research, we found



it necessary to develop (along with Rel Cap Inc.) our proprietary capacitor that is found in the tweeter circuit of all Genesis Imaging Modules.

The sonic advantage between this unique polypropylene element and an off the shelf film capacitor are stunning.

# The servo system

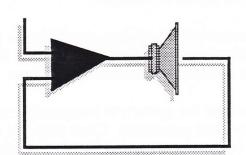
Both Genesis subwoofers are self amplified and servo controlled through the use of a new accelerometer.

The 10 inch subwoofer is powered by a 150 watt amplifier and the 12 inch subwoofer is powered by a 275 watt amplifier.

The response of each of the subwoofers is controllable by an extremely flexible crossover unit that features both high pass and low pass adjustable filters, a volume control and a phase control to help place your subwoofer in the room.

The Genesis servo bass system is a feedback controlled, closed loop device.

An active accelerometer continuously measures the instantaneous acceleration of the cone,



and converts this information into an electrical signal which is then compared to the original input signal.

Differences are always found, and the correction circuitry continuously corrects the difficulties.

This dynamically corrects for the mass of the woofer's moving piston......effectively rendering it as zero mass. The servo system also linearizes the frequency response to be anechoically flat down to any desired low frequency extension. In addition, the driver's distortion is lowered by a factor of 10 (20 dB) in the Genesis servo system.

Sonically, all you hear is the precise servo woofer since the enclosure is acoustically inert.

A servo bass system of this nature produces clean, natural and powerful bass in any room.

# WHAT YOU WILL NEED TO GET STARTED

Genesis loudspeakers require no more complexity in hooking them up than any other loudspeaker.

However, to realize the full sonic benefits of your new Genesis loudspeakers, it is important to pay as much attention as possible to the quality of the electronics that are driving it, the cables that are connecting it, their placement in the room etc..

This section will deal first with the basics of what you need to correctly operate the system, and finally some suggestion on how you can maximize its performance through the use of the appropriate accessories.

### Cables

All loudspeakers must be connected through the use of speaker wire. There are varying grades of speaker wire available from pennies a foot to many dollars per foot.

Do cables sound different? Is it worth it to invest large sums of money?

The answer is generally yes.

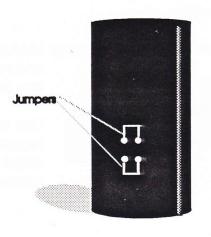
Genesis not only recommends the use of high quality speaker cables, but we can assure you that they can make a significant sonic improvement in your system.

# Bi-wiring

The two larger Genesis Imaging Modules both have bi-wiring (or bi-amping)

capabilities. You may choose to take advantage of this feature or not, depending on the use of the supplied jumpers.

Bi-wiring will be explained in greater detail in the body of the instruction manual, but briefly it involves the use of one set of speaker cables for the bass and another set for the



tweeter and midrange.

You would choose this option because there are sonic benefits to separating the cables' duties with respect to different frequencies.

You will notice on the back of the loudspeaker that there are four terminals instead of two.

This is where you will hook up the two sets of cables.

If you plan to bi-wire your loudspeakers, we recommend That you experiment with different cables.

Some cables are great for bass performance, but aren't quite as good on the top end and vice-versa.

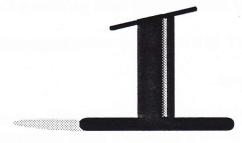
One of the more obvious advantages of bi-wiring is the optimization of cable performance or amplifier performance in the case of bi-amping.

# **Pedestals**

All models of the Genesis Imaging Module (the satellites) should be placed on a stand or pedestal of some kind.

For room applications where pedestals or stands are not feasible, obviously you can place the speakers on shelves or anywhere else appropriate to your room decor.

However, we highly recommend the use of the Genesis Foundation 1 or Foundation 2 (depending on which model of Image Module that you have).



Foundation series of pedestals are specifically designed to acoustically ground the Image Module, and provide the appropriate tilt back that we recommend

(approximately 10 degrees).

They not only improve the sonics, but they are themselves beautiful.

# **Electronics**

The quality of your electronics and source material will have a direct affect on how your new Genesis loudspeakers will sound.

While most any receiver is adequate to power the Image Modules to adequate volume levels, the sonic quality and no less than 100 watts of your amplifier is rms for the 8200 and 8300.

very important.

We recommend the use of no less than 60 watts rms for the smaller 5200 series,

Use of a smaller than recommended amplifier may noticeably affect sound pressure levels.

Do electronics sound different?

Genesis supports the notion that there is **indeed** a major difference in sound quality among amplifiers, preamplifiers and source material reproducers such as CD players, tuners and turntables.

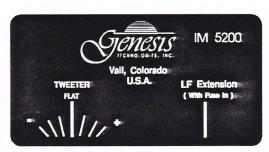
Tubes vs. transistors, big vs. small and so on are all important issues, and our purpose here is to inform you of how we feel about the matter, and that ultimately we highly recommend you visit your dealer for a demonstration of the these differences. We think it will be well worth your while.

# HOOKING UP THE IMAGE MODULES

### IM 5200

The 5200 series of loudspeakers are extremely straightforward to hook up.

Referring to the label on the rear of each of the 5200's, there are two terminals (red and black) one level control for the tweeter, and a fuse.



Connect the red terminal of your loudspeaker to the red (or +) binding post on your power amplifier. Connect the black terminal of the 5200 to the black (ground or -) binding post on your power amplifier.

Repeat this process for both left and right speakers. Be absolutely certain that you connect these up properly or your speakers will be out of phase.

If you are using a tube amplifier, the nominal impedance of the 5200 is 4 ohms. You should use the 4 ohm output terminals on the amplifier.

Place the tweeter's level control almost in the middle (eleven o'clock) position for now. We'll play with that control later.

### IM 8200

The 8200 series of loudspeakers are easy to hook up if you follow these instructions.

Referring to the label on the rear of each of the 8200's, there are four terminals (2 red and 2 black) one level control for the tweeter, and a fuse.

The reason that there are four terminals, instead of two, is the



8200's ability to be bi-wired or bi-amped.

Each set of terminals operates a different driver.

The set on the left hand side of the loudspeaker (as you face the rear) feed the tweeter.

The right hand set of terminals (one red, one black) operate the woofer.

If you are not going to bi-wire/bi-amp the loudspeaker, use the enclosed jumpers to connect both red terminals together, and both black terminals together.

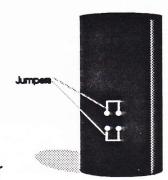
If you single wire the system, using the supplied jumpers, it is best to connect the output of your amplifier up to the tweeter terminals (left hand set as you face the rear). Although a minor point, it will sound slightly better this way.

# If you are NOT going to bi-wire;

First, use the jumpers to connect the two red terminals together, and then use the other set to tie the two black terminals (on the back of the 8200) together.

Next....

Connect the red terminal of your loudspeaker to the red (or +) binding post on your power amplifier. Connect the black



terminal of the 8200 to the black (ground or -) binding post on your power amplifier.

Repeat this process for both left and right speakers. **Be absolutely certain that you connect these up properly or your speakers will be out of phase.** 

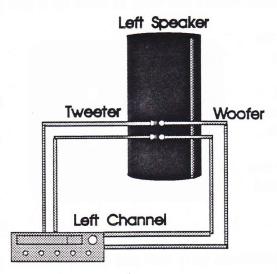
If you are using a tube amplifier, the nominal impedance of the 8200 is 4 ohms. You should use the 4 ohm output terminals on the amplifier.

# If you ARE going to bi-wire;

Remove the jumper wires so that you have four separate terminals on the back of the 8200. You will have two red terminals and two black terminals.

Using two sets of cables to your power amplifier, connect up one set to the red and black pair on the left hand side of the 8200. The terminals go vertically, with the red on top and the black on the bottom. The vertical left hand pair are your tweeter's input.

Place the cable that will give you best high frequency performance



on these terminals.

Using the second set of cables, connect the red and black terminals on the right hand side to the cable. These terminals also go vertically. Red on the top, and black on the bottom as you face the rear of the speaker. This right hand set of terminals will feed the woofer.

Use the cable that will give you best bass performance here.

Tie the other end to the left channel of your amplifier. You will have the two wires you connected up to the 8200's red terminals tied together on the amplifier's red outputs (+) and you will tie the two wires you connected to the 8200's black terminals together at the power amplifier's (or receiver) black (-) terminals.

Repeat this process for the right channel.

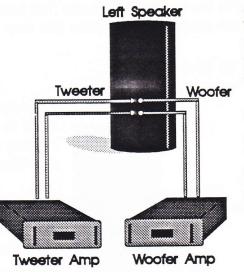
Place the tweeter's level control almost in the middle (eleven o'clock) position for now. We'll play with that control later.

# If you are going to Bi-amp

This is essentially the same procedure as bi-wiring, with respect to connecting the speakers, however the amplifier connections are different.

Refer to the section above on attaching one set of speaker wires to the tweeter's terminals, and another set of speaker cables to the woofer's terminals.

You will now need two power amplifiers. One for the tweeter, and one for the woofer.
The amplifier's gains should be matched as closely as possible.



A smaller amplifier for the tweeter is acceptable, and sometimes desirable, as the tweeter uses less power than the woofer.

Connect the tweeter set of cables to the amplifier you have chosen for the tweeter, and the woofer cables up to a second amplifier.

The inputs of both the tweeter amplifier and the woofer amplifier must be connected to the same output of your preamplifier. Many preamplifiers provide dual main outputs for this purpose. Do not use an external crossover to feed your amplifiers. The crossover remains inside the loudspeaker.

### IM 8300

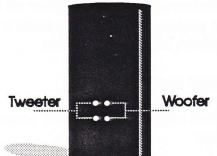
The 8300 series of loudspeakers are easy to hook up if you follow these instructions.

Referring to the label on the rear of each of the 8300's, there are four terminals (2 red and 2 Black) two level controls, one for the tweeter and one for the midrange, and a fuse.

The reason that there are four terminals, instead of two, is the 8300's ability to be bi-wired and or bi-amped.

Each set of terminal operates a different driver.

The set on the left hand side of the loudspeaker (as you face the rear) feed the tweeter.



The right hand set of terminals (one red, one black) operate the woofer.

If you are not going to bi-wire/bi-amp the loudspeaker, use the

enclosed jumpers to connect both red terminals together, and both black terminals together.

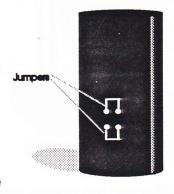
If you single wire the system, using the supplied jumpers, it is best to connect the output of your amplifier up to the tweeter terminals (left hand set as you face the rear). Although a minor point, it will sound slightly better this way.

# If you are NOT going to bi-wire;

First, use the jumpers to connect the two red terminals together, and then use the other set to tie the two black terminals (on the back of the 8300) together.

Next....

Connect the red terminal of your loudspeaker to the red (or +) binding post on your power amplifier.



Connect the black terminal of the 8300 to the black (ground or -) binding post on your power amplifier.

Repeat this process for both left and right speakers. Be absolutely certain that you connect these up properly or your speakers will be out of phase.

If you are using a tube amplifier, the nominal impedance of the 8300 is 4 ohms. You should use the 4 ohm output terminals on the amplifier.

# If you ARE going to bi-wire;

Remove the jumper wires so that you have four separate terminals on the back of the 8300. You will have two red terminals and two black terminals.

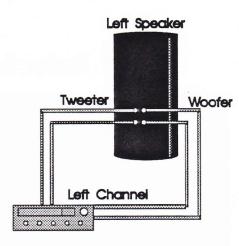
Using two sets of cables to your power amplifier, connect up one set to the red and black pair on the left hand side of the 8300. The terminals go vertically, with the red on top and the black on the bottom. The vertical left hand pair are your tweeter's input.

Place the cable that will give you best high frequency performance on these terminals.

Using the second set of cables, connect the red and black terminals on the right hand side to the cable. These terminals also go vertically. Red on the top, and black on the bottom as you face the rear of the speaker. This right hand set of terminals will feed the woofer.

Use the cable that will give you best bass performance here.

Tie the other end to the left and right channels of your amplifier.



You will have the two wires you connected up to the 8300's red terminals tied together on the amplifier's red outputs (+) and you will tie the two wires you connected to the 8300's black terminals together at the power amplifier's (or receiver) black (-) terminals.

# If you are going to Bi-amp

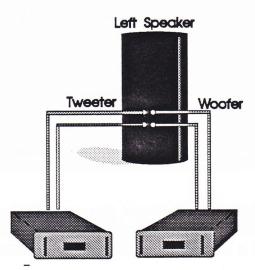
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The amplifier's gains should be



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A smaller amplifier for the tweeter is acceptable, and sometimes desirable, as tweeters need less power than woofers.

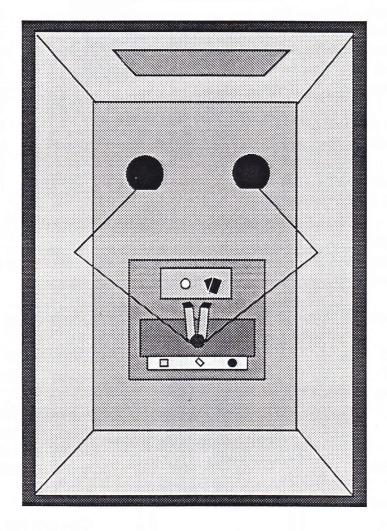
Connect the tweeter set of cables to the amplifier you have chosen for the tweeter, and the woofer cables up to a second amplifier you have chosen for the woofer amplifier.

The inputs of both the tweeter amplifier and the woofer amplifier must be connected to the output of your preamplifier. *Do not use an external crossover to feed your amplifiers. The crossover remains inside the loudspeaker.* 

# Conditioning your room

No room is perfect, and all of them can use some help. Correcting your rooms problems can be a major project, but there are a few easy things you can do to simplify that process.

# First Reflection



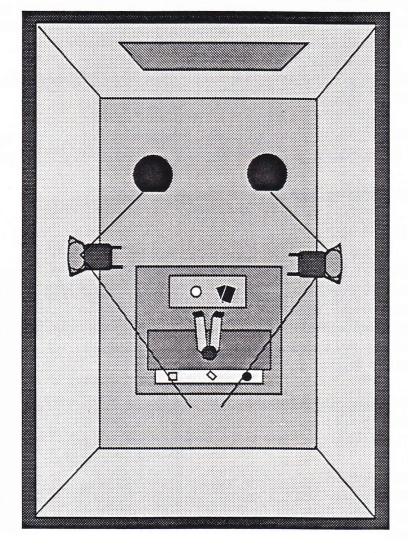
Point of first reflection -----

One of the first places to look and make sure that your room is properly treated is in the wall area where the sound is first reflected back to your listening position slightly out of time with the direct sound (that is because the reflected sound takes longer to arrive).

Short of using an appropriate deadening panel or diffuser at this point on the wall, you can employ a piece of furniture to help break up the reflections.

A chair, table, anything that will get in the way of the sound at that point.

# Corrected with furniture



Place a chair or any piece of furniture to help diffuse the reflection

There are, of course, second and third reflections that occur at different places along the wall, but the first reflection is the most important to try and eliminate.

If you really want to get it correct here is a neat trick you can use.

Place a small hand mirror along the part of the wall you suspect is where the first reflection hits. Sit in your listening position and have someone adjust the mirror so that you can see the loudspeaker. At this point the placement of the mirror represents the point of first reflection.

# SPEAKER PLACEMENT IN YOUR ROOM

Once you have done what you can to "treat" your room for best sound, the next consideration is the placement of your loudspeakers in your room. It can have a dramatic effect on how the system eventually sounds.

At Genesis, we understand all too well that **practical** considerations can get in the way of the ultimate speaker position.

Our recommendation is that you try your best to get as close to optimum as possible, and then fine tune the placement in by listening and making minute changes.

# Where do you start?

With the rule of thirds.

This simple formula says that you should mentally break your room up into thirds. The couch or listening area would be in one of the sections, the speakers in another as the illustration shows.

The speakers should, therefore, be placed a third of the room away from the wall.

As previously mentioned, it may be impractical to achieve this, so what's important is distance from the rear wall.

# 1/3

The rule of thirds

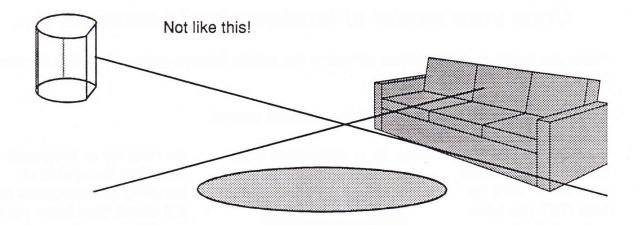
Certainly Genesis speakers are no where near as critical about proximity to the rear wall as most dipolar speakers (speakers with drivers on the front and the back), but for optimal imaging they should be as far away from the rear wall as practical.

# After you've roughed it in

Now that you have laid out your listening area with the rule of thirds in mind, it will be necessary to start refining the process.

There is one very important factor to bear in mind with the Genesis Imaging Module.

DO NOT TOE THEM IN.



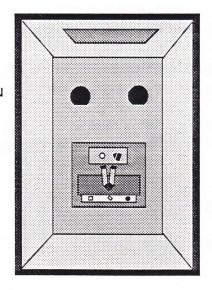
# Make very sure that the speakers are parallel to you as you sit in your listening position.

This is quite important if you are to achieve the optimum imaging capabilities that are possible with a Genesis Imaging Module.

note: (Most loudspeakers are designed to be acoustically flat on axis. Only when you sit directly in front of one speaker ((rather than between them as you would with a stereo pair)) will it sound properly. To correct for this problem we normally toe the speakers in, or point them at our listening position, so that we have good center fill. The downside of this is that it hampers the image to the left and right of the speaker.

To compensate for this situation Genesis loudspeakers have a slightly rising top end, on axis, but perfectly flat off axis).

This allows you to keep the speakers perfectly parallel to you, which gives you both center fill and the remarkable side image that all Genesis Imaging Modules are capable of producing.



The illustration shows how the setup should look. Parallel, not toed in.

# Once your model of loudspeaker is connected....

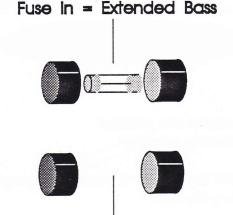
Place the tweeter's level control almost in the middle (eleven o'clock) position for now. We'll play with that control later.

Now for the fuse. It is actually a bass extension control.

With the fuse IN you have maximum bass extension. With the fuse OUT you have reduced the bass extension a small amount.

You will choose the bass extension IN or OUT based on the abilities of your power amplifier.

If your power amplifier



Fuse out = Less Extension

(or receiver or integrated amplifier) is capable of handling an impedance of 2.8 ohms, then leave your fuse IN for maximum bass extension.

If you are unsure of your amplifier's ability to handle lower impedance, leave the fuse OUT.

Consult your dealer about any specifics regarding your particular amplifier, receiver or integrated amplifier.

Note: Most modern amplifiers, receivers or integrated amplifiers are capable of handling an impedance of 2.8 ohms without a problem.

Now that you have correctly positioned your loudspeakers, it's time to sit and listen and tweak.

Listen for proper imaging, tonal balance, and musical sound.

It is preferable to use listening material with natural instruments. 

For instance, many people more easily recognize a piano or male or female voice.

The parameters you can vary are; the distance between the left and right pair of loudspeakers, the distance to you, the distance from the rear wall, and the controls in the back.

# What does good imaging sound like?

First, and foremost, the loudspeakers should disappear.

By that we mean that as little sound as possible should appear to come directly from the speaker.

A seamless field of music should appear from **behind** the loudspeakers.

The center image should be palpable, as if there were an imaginary third and center loudspeaker producing the middle image.

The sound should not be confined within the inner bounds of the two loudspeakers. Rather, depending on the source material, there should be an image that appears beyond the outer edges of the two Imaging Modules.

**note:** if you are not getting an image that is spacious and appears to come from **behind** the Imaging Module, the speakers are probably too close to the rear wall. In addition, you may have to experiment with different cables and electronics.

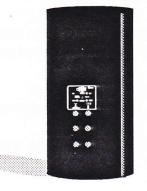
# The rear controls

Depending on the model loudspeaker you have purchased, there are one or two level controls and a fuse that controls the low frequency extension.

All models of the Genesis Imaging Module have a tweeter level control.

The IM 8300 has both a tweeter level control and a midrange level control.

Most speaker manufacturers do not include the luxury of a level control.



Genesis does, on all its models, because of several fairly straightforward facts; all rooms are not the same, and all drivers cannot be made perfectly.

In order to have any hope of achieving a true life-like image with your modules, you must

have the ability to fine tune the levels of the drivers so that they are the same when they reach you in your listening position.

# Adjusting the controls

Start with the knob of the tweeter and or the midrange in the eleven o'clock position.

Play music that you are familiar with and that has an ability to create an image. Adjust the tweeter and or midrange to your liking. Try and keep them as even as possible, but don't be afraid if they wind up slightly different.

The reason you have controls at all is to make up for differences between drivers and room settings. Your chances of having the controls wind up in the same place for the left and the right side are rather slim.

If it is too bright, turn the control counter-clockwise. If you need it brighter, turn the control clockwise.

We suggest that you make small changes, and take your time. It has been our experience that once you have the controls close to correct, even very minute differences in the knob's position will make a large change in the way the speaker images.

If you can make the speaker disappear, and the image appear to come from behind the loudspeaker, then you have done a good job of setting them up and adjusting the controls.

# The low frequency extension control

All Genesis Imaging modules have a low frequency extension control. This allows the use of any amplifier with the modules.

With the bass in the extended position, your amplifier should be capable of handling an impedance of 2.8 ohms. As previously mentioned, most modern amplifiers and receivers are easily capable of this requirement.

To place the bass in the extended position the fuse must be in. The fuse is located on the back of the Imaging module, by the tweeter level control.

If you are unsure that your amplifier will handle the lower impedance, place the Image Module in the non-extended position.

To place the bass in the non-extended position, the fuse must be out.

# USING A SERVO SUBWOOFER

Adding a Genesis servo subwoofer is simple for several reasons, the most important of which is that you don't have to change the Image Modules to accommodate it.

You simply hook up one or two subwoofers and you're in business.

This makes the Genesis servo subwoofer/Imaging Module system somewhat unique. Typically you must roll off the bottom of the upper speaker (the satellite) to accommodate the subwoofer. This, unfortunately, compromises the performance of the upper loudspeaker. We feel that the better solution is the one we have chosen. In that

system we leave the upper speakers full range, and through the use of an extensive crossover (built into the subwoofer) we tailor the subwoofer to match the upper speaker.

# Hooking up the subwoofer

Connection is rather simple, but you do have several choices to make.

First choice is mono or stereo. If you only have one subwoofer then you are mono, and if you have two or more you are stereo. Your second choice is high level or low level.

If you have a receiver or integrated amplifier, high level is probably the choice.

If you have a separate preamplifier, then the choice is yours although we recommend the preamp's output if it has two. Therefore, with a separate preamplifier we suggest that you use the low level inputs.

To be fair, many people believe that even with separate components you should use the high level inputs for the blending of sonics. If the question nags at you, we recommend you try both and see which one works the best for this particular situation.

# Connecting your subwoofer

Once you have made the appropriate choices as given above, it is time to connect the subwoofer (s) up. Please refer to your installation manual in the owner's book that comes with your subwoofer.

# Integrating your subwoofer with the Image Modules

First choice to make is placement. Fortunately, because of the phase control on the subwoofers, this is not too critical.

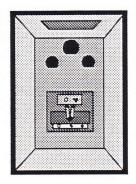
If you are using a mono set-up, the sub-woofer would generally be placed between the two Image Modules. It can, however, easily and effectively be placed off to the side.

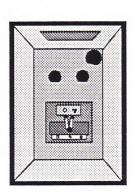
If you choose to place the sub woofer off to the side, it is OK. In fact, in some instances it may produce better bass from the side than it does from placing it in the middle.

The reason you can choose either the middle or side positions are that bass frequencies will still appear to come from the middle channel or wherever they are supposed to be, even when the subwoofer is placed over to the side. This is because of the long wave lengths that are produced by the subwoofer.

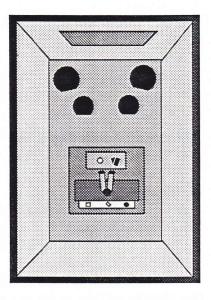
If you are using a stereo set-up, placement is not critical but generally place one to the left (outside of the left speaker), and one to the outside (right) of the right speaker.

If two are used, our recommendation is to slightly toe them in for best performance (point them at your listening position).





Be very careful (if you are using a stereo pair) that the left and right signals are going to the appropriate subwoofer.



# The subwoofer controls

The subwoofer controls are explained in detail in your subwoofer's owner's manual.

Here, in this section, we will cover the suggested settings for each Image Module.

The first two controls should be the same, for start-up on all models of Imaging Module.

**Level control**. This controls the volume of the subwoofer and is typically set at 4 or 5. You will adjust this control for more or less bass.

**Phase control.** This control will be the most valuable control you have for integrating the Image Modules and subwoofer together. It changes the relative phase of the subwoofer from 0 to 180 degrees. This is typically set at 0 degrees to start with.

# IM5200

**Low pass.** This rolls off the top end of the woofer. With a smaller speaker like the 5200 you would roll the top end of the subwoofer up higher than a larger speaker that does not go down as low.

A good rule of thumb to remember is that the low pass control should be set to a relatively *higher* number with a smaller speaker, and a lower number with a larger speaker.

We suggest you start with 100 Hz.

**High pass.** This controls how low the woofer goes. The Servo 10 can go to 32 Hz and the Servo 12 can go to 22 Hz.

We suggest you start with the lowest setting each has to offer.

### IM8200 and IM8300

**Low pass.** This controls how high the subwoofer goes. We suggest you start with 70 Hz.

**High pass.** This controls how low the subwoofer goes. We suggest you start with the lowest setting each has to offer.

# Adjusting the phase control

As mentioned before, this control may well be the most valuable feature of the subwoofer, with respect to achieving a seamless blend between the Imaging Module and the subwoofer.

Start with the control at 0 degrees phase.

Position the subwoofers for best bass in the room, and adjust the level and crossover controls to where they sound best.

Using a source with good bass, such as a bowed or plucked double bass, listen carefully for a seamless integration of the subwoofer and the Image Module.

If the two seem slightly disjointed, the next step is to turn the phase control clockwise to the 10 degree position (for example).

You should hear, when you play the same cut over again, that the presentation is more coherent.

Keep making minute adjustments to this control until the subwoofers and the Image Modules sound like one loudspeaker, rather than separate entities.

Hint: the further the subwoofers are physically behind the Image Module, the more you will have to turn the phase control knob in order to blend the two sounds together.

The control offers a maximum phase change of 180 degrees.

# CARE AND CLEANING OF YOUR GENESIS LOUDSPEAKER

The finish of your Genesis Technologies loudspeaker is a beautiful piano black.

You can care for it in several different ways.

Being careful not to spray onto the drivers, it is permissible to use a standard spray on glass cleaner like "Glass Plus" or "Windex". Products like "Pledge" and other spray on waxes are also a possibility.

To truly beautify and protect your new loudspeakers, a coat of fine car wax is most highly recommended. Products like "McGuires" car waxes are perfect.

Take care of your new speakers and they will take care of your listening needs and protect the investment that you have made in them for years to come.

Good Listening!

