Auricle II

The Film Composer's Time Processor

Fitting a piece of music to precise timings of already recorded film and TV material can be a composer's nightmare. But with the help of well-designed computer software, you can relieve the task of most of its arithmetic.

Review by Chris Many.

REVIEW

SCORING MUSIC for a visual medium, such as film or television, is a highly specialized form of composition. Compared with music videos, where the song is written, arranged and recorded, followed by the scripting, shooting and cutting of a video based on the tune, film and TV composing reverses the process.

It's much easier to cut a video when you have music there to cut to; the rhythm, the beat dictate where the cuts are to be made, setting the pacing and tempo for a video editor. However, when you are handed a piece of film that requires a number of musical cues that must hit precisely at certain times, not sooner or later, but *exactly* in sync with the picture, the job of the composer can become that of a mathematician.

Screen photos by Richard Benjamin Grant

What is the best tempo to use if you have three hits to catch, one at 43 seconds in, the next at 1:12 and the last at 2:22? At what point in the chart do you reach your crescendo when all you know is that the climactic scene peaks 326ft into the last reel? And if you're using SMPTE, how do you convert a scene that starts at 01:03:48.12 and ends at 01:04:13.26 into a musical concept? What meter should you choose, and when should you change it, if at all?

These questions and countless others have plagued film and television composers for years. And as you can imagine, this amount of timing administration has created tedious and time-consuming calculations. To ease the pain somewhat, thick manuals of timing charts and matrices have been developed and published, allowing a composer to determine exactly where a hit might occur if, for example, a tempo of 128 were used.

Several short years ago, two enterprising brothers, Ron and Richard Grant, developed a software program that turned this nightmare of mathematical mumbo jumbo into a godsend for composers, making an ordinary Commodore 64 a mandatory item in the film composers' arsenal of tools.

This program, Auricle, so increased the ease with which the tedious processes described above could be executed, that it won an EMMY for Outstanding Technical and Scientific Achievement in 1985, I won't mention the hundreds of feature films or prime-time television shows and commercials on which this program has been used extensively, but suffice it to say that the release of Auricle had a major impact on the way music was created for these media.

AND NOW, AURICLE, Part II. This program pushes the standards set with the original release to new levels, and includes many new features to keep pace with the demands of composers and technological advances. It performs all the calculations required and translates them visually into useful information. It's very user-friendly, and after using it, even if only for a few hours, it's hard to imagine doing a score without it.

The general idea of Auricle II is this: spot your film/cue/show and establish your hits. Depending on your format (SMPTE in its various forms, film footage, or just regular stopwatch time), input the hit timings, set the proposed tempo of the music to be written, either in clicks or BPM, press a button, and.-.voila! A graphic repre-

sentation of where every hit occurs in fractions of beats and bars. It reads out whether or not the hit occurs right on the beat or if it's a little late or early. If the hits aren't sitting just right, change the tempo and see how that affects the cue. Speed it up some more, slow it down a little until you've found just the right tempo for your music. This is an oversimplification of All, but it should give you an idea of the immediate use such a program has to the film/TV composer.

But Auricle II is **much more than a** glorified calculator for timings. It has over 150 commands available to the user, giving you complete control over every facet of time as it relates to music. In fact, it's been designed to be a phrase-to-frame synchronizer: a 'hit maker' rather than a 'hit finder'. All outputs click, actually a much clearer click than you've heard the C64 producing on well-known sequencer programs (the programmer didn't even use the SID chip of the C64, he just accesses the audible pop generated by the hardware when you turn the volume **on or off** — much cleaner that way).

The **degree of** flexibility you have over MT APRIL 1987 your music's timing is extensive; ritards, accellerandos, meter changes, radical tempo shifts for 1 beat or 20, or 200 for that matter. You can slow down the tempo slightly just preceding the hit you want to catch, so that it hits precisely on the downbeat, rather than a frame off beat, then speed it back up to the previous tempo. Such slight tempo shifts are barely perceptible by the listener, but when you're trying to get your hits 'picture perfect', it makes a big difference.

Using this variable click in conjunction with a Roland SBX80 or Garfield Dr Click, or one of the other click-to-code conversion boxes, you can also use All to drive external sequencers. Simply record the click into the conversion box, and the SBX80 (or whatever device you use) converts the click to MIDI clock, or the 24. 48, or 96ppqn clock format **you need to** drive your sequencer.

This means the calculations and exact music timings you've done with All are now directly converted to any music you have recorded in your favorite sequencer. Believe me - it's quite something to see every single hit fall precisely where **you** planned it to in the first run-through.

Auricle Control Systems is also planning a hardware development of their own devising, an All-compatible MIDI interface, that will take the place of these conversion boxes. Word is, it will read and write SMPTE as well, but this is still in the development stage, with no promises being made.

HERE'S AN EXAMPLE that most film/TV composers face regularly. You have a cue that's 1:30 long exactly, with a hard hit at the exact end of that time. Just as you're going into recording, the editor calls to tell you 20 frames have been trimmed from the scene. Let's say we're dealing with video (although All deals equally well with 16 or 35mm film) so that 20 frames equals two-thirds of a second. Now your final hit is almost a second late! You can try speeding up your cue by 1 or 2 BPM to compensate, but it turns out that it just doesn't land as precisely as it did before. Maybe you could drop a beat somewhere; possible, but for argument's sake, let's say that solution doesn't work either. However, with one command you could instruct All to evenly redistribute the two-thirds-of-a-second loss over the entire cue so as to perfectly realign your music.

So as you can see, the Time Processor aspect of All works to fit your music to picture, in any video or film format, regardless of the intricacies of ritards, rhythmic or metric patterns, or any form of music that can be written.

There are a number of screen displays available, aside from the hit screen described earlier. Graphic representation of a variety of timing information is helpful in seeing just what has been laid out. For example, in order to get your hits occurring on the downbeats of measures, you've changed five bars to 3/4, two bars to 7/4 and one bar to 5/4, while leaving the rest **of** your piece at 4/4. Accessing the Meter Map shows which bars were changed, and color-codes the different meters. A SMPTE map shows where the downbeat of each bar is and what the SMPTE readout is at those moments.

A video map, footage map, click map and others all perform the same type of conversion; each a useful and helpful piece of data for film/TV scoring. Each time you issue a command to alter timings, meter, tempo, and so forth, the information is automatically updated for each display, so whenever you access one of these maps, it is always a correct reflection of the current state of affairs.

There are many more technical features that Auricle II sports - functional, bug-free, and handy just when you need to have them. There is another point I've yet to mention, though, and that's the actual interface developed to run this whole show. This is one of the easiest programs to run despite

the depth, power and complexity that is inherent in such a complete tool. Commands are typed in English in a dialog box, which is usually present on the screen, or can be called up with a keystroke.

One of the nicest features I've seen, in this or *any* program, is the ability to customize the interface for your own use. Simple macros (as they are known in well-used business software) allow you to rename lengthy commands to whatever acronym or letter you wish to assign. For example, should you find yourself resetting the start point of cues often, rather than type in 'set start to 01:02:03.04' every time, you could assign the command 'set start to" to the letter 'S'; then typing just 'S 01:02:03.04' resets the start of the cue to the appropriate start point.

Equating the system to respond to your individualized keystrokes makes it a very personal system, and speeds things up a lot while giving commands. Several screens are available that lay out every command the program responds to, so if you forget how to do something and you've mislaid the wonderfully clear documentation, you can call up one of these screens and locate the command in a few seconds. You can change the colors, write messages to yourself that scroll across the bottom of the screen, set the date, and add other touches that make this a friendly program. (Forgive my use of the overused terms 'user-friendly', 'friendly software', and on, but nothing else describes how well this program interfaces with its outside environment – namely the user.)

A full array of disk management features rounds out the Auricle ll's functions. An additional file that is kept on the master program disk contains the information of your customization of the Auricle II, loading in with the program **as** you boot the system up. This can be updated at any time, providing you haven't write-protected the master disk.

Conclusion:

I've really only scratched the surface in terms of just what you can do with this program. There are features like tacit bars which turn off the click so you can conduct in free time, with the ability to start a specified tempo at the exact point where the rubato section ends; acceleration of a bar or bars so that the tempo arrives at the exact point of a hit **as** expressed in SMPTE, film footage or time; options to account for streamers and leaders; on and on they go.

Having used the original Auricle for scoring over the past year and a half, and now using Auricle II for the past several months, I have nothing but the highest recommendations to give. Any faults are so minimal as to be left unmentioned, as they are so far overshadowed by the sheer power packed into this piece of software. The ease with which it allows any user – computer expert or novice – to get immediate results that not only save loads of time but also ease the scoring process. is remarkable.

Truth be told, Auricle II is one of the most complete pieces of software I have ever seen. It does its job 110%, and without problems. It is, literally, a necessity for the modern-day film or television composer, and will soon pay for itself many times over just in the time it saves.

Every field develops a standard of comparison. Without a doubt, Auricle II is that standard for film compositional tools.

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