

The In-House Report: MXR Series 2000

When word got out on the most recent line of MXR effects pedals, the Series 2000, we decided it was time for an evaluation. The series we received consisted of six units (201 Phaser; 202 Dyna Comp; 203 Stereo Flanger; 204 Distortion +; 205 Stereo Chorus; and 206 Time Delay) all made from sturdy, impact-resistant plastic—well-molded and very lightweight. The units all have two outputs, which supply the user with two combinations of effects plus dry signal. The exceptions are the Time Delay pedal, the two outputs of which provide a mix or a delay-only signal; or the Dyna Comp, which has its two outputs connected in parallel.

The Series 2000 effects pedals are battery-operated (but may also be powered by optional power converter or AC adapter); accept quarter-inch (two-conductor) phone plugs (input and output); and are footpad-actuated by alternately stepping on the pad for on/off. The pedals are essentially black with color graphics. MXR should make the control knob graphics easier to read. Forget reading the control labels on a darkened stage; you'd need a miner's cap.

We tried all the pedals live and in the studio. They're easy to set up and easy to carry. The noise levels from all the pedals was very low; even the Dyna Comp was relatively quiet when in use. I don't ordinarily use or recommend the use of footpedals in the studio (the noise levels can drive you to distraction), but these were very quiet. If you must use pedals in the studio, try these and see what you think.

Now let's get to it on to individual assessments. We will assign each one a letter grade, for clarity's sake.

Stereo Chorus 205: This wonderful-sounding pedal is smooth, warm and very quiet. It's not dramatic, so many of you who are into rapid-fire, single-note lines with Chorus on full may not like this unit. But it handles chording very well and jazz-like lines great, and you should definitely try this out on your electric piano—lush, full-sounding notes are your reward. (A.)

Time Delay 206: The Time Delay is also a good pedal: with its delay-only output, you can accomplish "cross-stage" effects (with an additional amp, of course), and with its delay, regeneration and mix controls you can set up some very nice delay effects in your music. Feedback did not seem to be a problem. But for \$215.00, you can find rack-type gear that for a third more can give

you far more flexibility. (B.)

204 Distortion +: I've never really liked distortion pedals. If the music called for distortion, I much preferred to crank up an old tube amp (or two) and bang it out. However, sometimes you want the sound but can't afford the volume, so the Distortion + works well. It supplies the player with fuzz-type sounds even at low levels. I don't feel it does a good imitation of a tube-type amp, but you can't have everything. With the level control and drive control properly adjusted, the unit works well for lead lines. (B - .)

Stereo Flanger 203: Everyone was surprised at how quiet the flanger was in operation—a real plus, since many flangers are much too noisy. I like the flanging effect because it had a good range: it can be dramatically or subtly sweeping. Here, MXR has given the user a nice choice. The manual states that in a mono mode, "Output 2 is recommended because of a more intense flanging effect." Either internal wiring on our unit was crossed or I beg to differ; Output 1 was the more dramatic in mono or stereo. Regardless, a good pedal. Should rate a B+, but with a suggested retail price of \$165.00. (B.)

Dyna Comp 202: Compressor-type pedals are also not my favorites, but MXR has convinced me. The Dyna Comp doesn't steal your attack the way so many compressor pedals do; rather, it allows you to set up a nice balance between your unprocessed signal and your compressed signal. Whether you're playing hard or soft, you will get all the punch and bit you want if you have set the controls properly. Surprisingly quiet for a pedal of this type. (B.)

Phaser 201: This was a disappointment to us all: the unit simply doesn't sound good. It's either too wimpy or too overbearing. If you push it, it will actually sound like a bathtub draining. MXR states in its manual that the "phaser is designed to allow maximum regeneration effects without runaway feedback." They also state the same for the Time Delay, but the design *works* on the Time Delay. If you turn up the Regeneration control on the Phaser, it will not only run away, it will gallop. (C.)

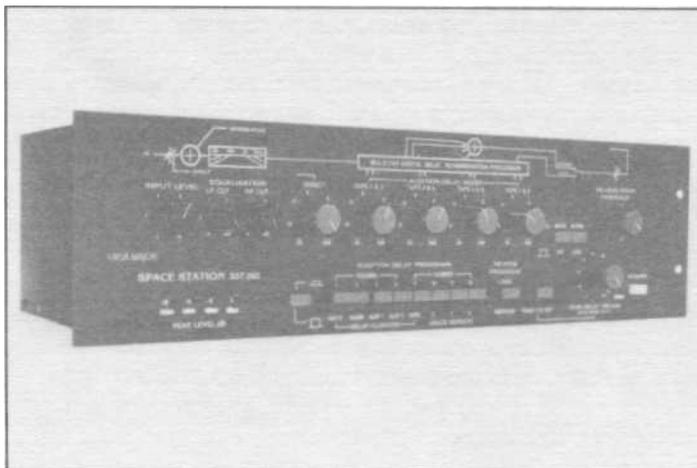
All in all, MXR has some winners in its Series 2000 line. Most impressive were the quiet operation and the sound quality; least impressive was the price scale. In 1984, prices for this type of unit should be down. However, if you listen to these pedals you may buy them at any cost. They're some of the best we've heard. -H.G.L.

Ursa Major Space Station~

by Robert Musso

C] he Ursa Major SST-282 Space Station™ (list price: \$2,195.00) is a multi-tap digital delay signal processor. To describe all the effects possible from the Space Station would take more space than this column could hold; it is truly a multi-effects processor able to provide digital delay, digital reverb, echo and comb filter effects.

Let's look at the controls. Starting from left to right, the Space Station has an input volume knob and a four-segment peak LED volume indicator. Next are high and



low frequency 6 dB/octave roll-off equalizers that can cut the lows from 60 Hz to 300 Hz and the highs from 7 Hz to 2 kHz. Located in the center of the device are five large knobs and an 11-button switch bank underneath. The five knobs are actually a mixer that controls the volumes of the direct signal and the eight delay taps, in pairs, to the output of the Space Station. The bank of switches under the "mixer section" determines the delay programs. The 16 different programs are rooms 1-4; combs 6, 10, 22 and 38; delay clusters-fatty, cloud, slap 1, slap 2, and echo, also space repeats 2, 3 and 4. Other controls on the Space Station are a long or medium reverb program switch, an echo delay time set switch and corresponding adjust knob, a reverb mix/dry switch, and a reverb/echo switch with a corresponding reverb/echo feedback knob. There's also a power on/off switch on the bottom right. The back has a mono input and stereo outputs on XLR-or cannon-type jacks.

The room sounds 1-4 are straight delays starting *very* close to the direct signal and ending up to 256 milliseconds away about a quarter of a second. The taps are set up on all the programs in such a way so that taps 1 and 2 (the first mixer volume control) are the shortest delays, taps 3 and 4 are a little longer, etc., until taps 7 and 8, which control the longest delays on all programs. This set-up might take a little getting used to if you're familiar with most delay lines; but after you get used to the Space Station, it's not hard to use. The way the delay taps are arranged makes it easy to drop the last delay or echo repeat just by turning the last mixer tap volume control down (or vice versa if the first taps are too close).

The comb settings are the result of combining the direct signal with one or more delayed versions of itself. It's called a comb because "periodic nulls and peaks are produced across the spectrum, placed at frequencies related

to the reciprocal of the delay time." Fatty, cloud, slap 1, slap 2 and echo are grouped under the "delay cluster" title next because, as Ursa Major puts it, "this family of programs uses delay taps spaced closely together, in clusters on the time axis." The clusters move progressively farther away from the direct signal as the programs go from fatty to echo. Fatty has all its taps under 40 milliseconds, while cloud's cluster appears later with a gap in between the direct signal and the cluster. Slaps 1 and 2 are delayed long enough to be heard as slap echo, and echo has all its taps about 250 milliseconds away from the direct signal.

So in truth, the Space Station has 16 pre-set programs with 8 delay taps each, and each of the 8 taps are spaced from 1 to 256 milliseconds away from the direct signal.

The feedback knob controls the amount of regeneration of delayed and direct signals in such a way that short resonance effects to long repeating echoes can be had depending on the delay settings chosen. The reverb program medium or long switch changes the reverb program to medium or long decay times, which really aren't that different in sound or length. The echo delay time set switch and knob are useful because they set the amount of delay before the reverb is heard; in a sense the same as a delayed chamber.

A setting I like to use is the room sound(s) on snare drum. A single snare hit can sound like a mini-drum roll. The only real drawback is the bandwidth, which only goes to 7 kHz.

I like the Space Station and have been using it for a while, but it's one of those devices that sounds great on some instruments (or sounds) and not so great on others. It doesn't sound like other digital reverbs costing four or five times as much, and it does take a while to get used to. An initial try-out period is necessary to fully understand the Space Station.

The In-House Report:

Ursa Major SST-282 Space Station™

The Ursa Major SST-282 Space Station™ is quite a unique piece of equipment. In theory, the Space Station is simply a signal processor which produces time delays for use as slap echo, delay, reverb, echo, repeat delays and comb-filter techniques. In practice, there is simply no way to describe what effects you can conjure up by using the unit—the best we can do is to describe parameters. It's worth taking a trip to your sound dealer and using an SST-282 yourself.

The Space Station has one input (XLR) and two outputs (XLR), so that it takes a mono sound source and sends it back as a stereo signal. It uses multiple taps to accomplish its purpose; these taps are essentially divided into two groups (for the sake of simplicity), as the manufacturer states: "...one group is for auditioning and the other for reverberation ... operating independently of each other, the Audition Delay Taps set up a way of hearing the contents of the memory, while the Reverberation or Echo Taps when fed back determine the kind of reverberant sound existing in the memory..."

Looking at the Space Station can be slightly intimidating. There are 10 knobs on the front panel relating to everything from input level to EQ (LF cut, +0/-10 dB, shelving at 20 Hz; HF cut, +0/-10 dB, shelving at 7 kHz) to Reverb/Echo Feedback control.

Don't be put off by all the knobs and buttons. The Owner's Manual is precise and easy to understand. The down-to-earth language is a real help, as is the multitude of diagrams in the rear of the manual. These diagrams show you how to set the controls for specific functions, which is fine because it enables you to attain results immediately after set-up. After that, it becomes simple to plunge in and find your own combination of effects.

The Space Station is extremely versatile and creates great sounds. It generates tight echoes, long delays, repeats (not infinite), unusual comb filter creations (great for A/V work) and more. And it does it all very simply. We used it on vocals, guitar and synthesizer, and it was very effective. One of my favorite settings was for "Fatty or Cloud," which resembles a doubling effect. You don't hear any delay or echoes, but you do hear a "bigger" voice or instrument. I tried this mode when I wanted a vocal to "pop" out a little more in the mix without upsetting the overall ambience, and it worked to perfection.

We were pleased with all the creations the Space Station was capable of producing. It is not going to replace EMTs with its echo, or some of the expensive hotshot delay lines now out on the market; but at its retail price, this device makes a great steal for the smaller studio as an all-in-one unit or a great add-on for the bigger studio which wants additional special effects. The Ursa Major engineers have developed a marvelous piece of gear with the Space Station.

-H.G.L.