



PHONOPHILE NANOMOUNT SYSTEM OWNER'S MANUAL

INTRODUCTION AND DESIGN CONCEPT

The LP groove imparts energy to the stylus. The good part of that energy creates the musical signal; the remaining energy vibrates the cartridge—and from there the arm—creating music-muddying resonances. The more of that vibrational energy that's cleanly drained out of the cartridge and arm down into the turntable plinth, the better the music sounds. (That's what good arm design is all about). The great impediment to the clean draining of energy is the flat contact area between cartridge and headshell—and the even larger flat contact area between arm base and plinth. The energy reflections and distortions at these large, low-pressure contacts restrict the performance of even the best-designed cartridge and arm.

Fortunately, our experiments point to a straightforward solution: couple the cartridge to the arm—and the arm to the plinth—through near-microscopic versions of our proven Triplepoint brass footers. The high-pressure point contact (not area contact) ensures clean, distortion-free transfer of energy. Our very first prototype listening tests showed startling sonic improvements.

That left two practical problems: How do you machine Triplepoints almost too small to see? And, how do you install them without a microscope? After two years of refinements, the final Nanomount System consists of:

1. Three Nanomounts (each with 3 micro-points on the bottom, 1 on the top side) bonded to a 3/4" diameter thin film disc you place on top of your cartridge before mounting;
2. Two metric or U.S. brass mounting screws to fit your cartridge, in itself, a serious upgrade;



3. Four 1/2" diameter thin film washers, each with two Nanomounts that slip between the tone arm base and the plinth.

INSTALLATION – CARTRIDGE

1. Be careful when handling the Nanomount discs. Because too much adhesive can overdamp the Nanomounts, they are only lightly bonded to their discs.
2. Remove the cartridge and place the 3/4" diameter clear three-Nanomount disc on top of the cartridge with its two holes aligned with the cartridge mounting holes. Make sure the Nanomounts are above the disc; note that they are very directional. Also, make sure each of the Nanomounts sits directly above a *flat* surface, not a depression or corrugation in the upper face of the cartridge body. Similarly, make sure that the single point on top of each Nanomount mates with a *flat* surface on the underside of the headshell. The single, centered Nanomount can face either the front or the back of the cartridge, depending on which fits the cartridge body and headshell dimensions.
3. If you need to move one or more of the Nanomounts to fit your cartridge and headshell shapes (or to avoid an uneven surface on either), you will find them easy to pull off the clear plastic with a pair of tweezers. To remount, use a *tiny* drop of the Super Glue we have provided, applied with a toothpick to the new mounting spot. Place the Nanomount with the three points down on the glue dot and press hard for 15 seconds. It helps if you first scratch off the old glue with the point of a pin. If you find it more convenient, you can glue Nanomounts directly to the cartridge or the headshell without the clear plastic disc. Just remember the single point always has to face the headshell.
4. If you remount all three Nanomounts, try to arrange their geometry so that:
 - A) The single, centered Nanomount is approximately twice as far from the line connecting the mounting holes as the two Nanomounts on the other side of the line.



- B) The two Nanomounts near the mounting holes should be spread as far apart as possible, within the constraints of the headshell and cartridge shape.
- 5. With the cartridge and Nanomount disc in place under the headshell, screw in the mounting screws—using the brass ones provided in the kit. Brass sounds very noticeably better than nylon, aluminum or stainless steel.
- 6. USE VERY LIGHT TORQUE TO TIGHTEN THE CARTRIDGE SCREWS—ONLY SLIGHTLY MORE THAN FINGER TIGHT (this is the best-sounding torque, whether you're using Nanomounts or not). Everyone tightens cartridge screws too much! Overtightening makes the cartridge sound dull, rolled-off and undynamic. The right torque leaves the cartridge slightly vulnerable to shifting if you twist or push it. Amazingly, if you tighten to the point where the cartridge is locked down hard and can't be shifted, you've already deadened the sound of your vinyl.

INSTALLATION – NON-REGA ARMS

- 1. Loosen the arm mounting screws enough so you can lift the arm mounting base about 1/16". You can keep it propped up with toothpicks.
- 2. Slide a two-Nanomount clear plastic washer (with Nanomounts underneath) under the arm base next to each mounting screw. Alternatively, cut a slit in one side of the washer and then you can push the washer in to surround each mounting screw. There is a *tiny* sonic advantage to the latter.
- 3. Retighten the arm base mounting screws. TIGHTEN THEM ONLY SLIGHTLY MORE THAN FINGER TIGHT (a bit more torque than for the cartridge screws). Overtightened arm bases seriously suppress dynamics and treble, whether you're using Nanomounts or not. The right torque is light enough to *not* rigidly lock down the arm base. You'll have to be gentle because the arm base will be somewhat vulnerable to shifting.



INSTALLATION – REGA-STYLE ARMS

1. Cut three of the two-Nanomount washers in half with the cut very close to the Nanomounts.
2. Loosen the big arm-mounting nut on the underside of the plinth enough so that you can raise the arm 1/16". Slip three single Nanomounts (with the single point down) under the arm base ring at three equally spaced points under the circumference. You can use the plastic half-washer as a tab to push the Nanomounts into place. For convenience, you can put a tiny dot of Super Glue on top of the plastic half-washer so that it will stay in place on the underside of the arm ring.
3. Holding the arm tight up against the plinth, turn the turntable over and repeat Step 2 for the underside of the big arm-mounting nut. As in Step 2, the Nanomounts *must* have their single point facing the plinth, not the nut.
4. Tighten slowly and gently so that the Nanomounts do not pop out from under the nut.
5. TIGHTEN THE NUT ONLY SLIGHTLY MORE THAN FINGER TIGHT. Read Section C, Step 3 and take it to heart.

INSTALLATION – SCHRODER ARMS

1. You'll need three extra Nanomounts to place between Schroder's cartridge-mounting crossbar and the arm's headshell. (Call the Mapleshade order line for supplemental Nanomounts.)
2. Glue two Nanomounts (single point up, facing the bottom of the headshell) at the rear corners of the crossbar, just inboard of the headshell edge. Glue the third Nanomount at the front edge of the crossbar to the left of the central crossbar-mounting screw.
3. The remainder of the cartridge and tonearm Nanomount installation is as described in the beginning of these instructions.

Mapleshade