Everest Printer Troubleshooting and Repair

Use this procedure to troubleshoot problems on an **Everest III or Everest 600™**.

Notes:

- Your system may not look exactly like the system pictured.
- The term “Everest” is used throughout this document to refer to both the Everest III and Everest 600.

Before you begin

1. Stop or pause all jobs.
2. Power off the **external or embedded control center (PC)**.
3. Power off the **Rimage System**.
4. Disconnect the **power cord** from the power outlet.
5. Remove the Everest printer from the Rimage autoloader.

Required tools:

- Refer to the appropriate repair procedure for the required tools

1. ☐ Visually inspect for missing, loose, or bent parts.
   a. Rollers
   b. Sensors
   c. Stopper tabs on the peeling roller assembly
   d. Screws
2. ☐ Replace any missing, broken, or bent parts.
3. ☐ Check the firmware, copy count and record. If count is >100,000 set it aside.
4. ☐ Run a pretest of 2 or more discs.
   a. Determine print quality.
   b. Watch for disc snapping (ITS Motor).
   c. Overall functioning of the printer.
5. ☐ Remove all **covers**.
   a. Front
   b. Right
   c. Left
6. ☐ Remove **latch #3**. Resolder the cable connector and switch if needed.
7. ☐ Remove the **print head bracket assembly**.
   a. Clean inside the printer (head compartment and ITS drawer compartment).
   b. Tighten the **head mounting shaft screw**.
   c. Clean the **print head** if <30k discs and no streaking on label.
   d. Replace the whole **print head bracket assembly** if streaking or >30k discs.
8. ☐ Replace the **platen roller** if count is >30k or if the roller is starting to crack.
9. ☐ Remove the **heat roller bracket assembly**.
   a. Tighten the **set-screw** on <u>all</u> printers.
   b. Tighten the **heat roller end cap screws**. (4).
   c. Check for broken **heat roller springs** (4).
   d. Check for bent **heat roller cam shaft.**
   e. Pull test the **DC fuse cable harness** and the **thermistor cable harness**.
   f. Replace **heat roller end cap screws** if >30k discs.
   g. Replace **heat roller bracket assembly** if any damaged parts or >50k prints.

10. ☐ Remove the **ITS drawer** if it has not recently been worked on. Check the records if necessary.
    a. Clean the **capstan rollers** with alcohol and a razor blade.
    b. Check for damage to the **ITS guide roller 2** or **ITS roller shaft 3**. If >30k on old style replace with new.
    c. Adjust and tighten the **side bracket.**
    d. Adjust and tighten the **peeling roller** to be in line with other roller.
    e. Replace the whole **peeling roller assembly** if needed.
    f. Check the **ITS Bobbin** and **Shaft**. Replace if old style or cracked.
11. ☐ Remove the **RT upper sensor** and **RT lower sensor** if the inside is dirty.
    a. Clean them with a brush and 409.
    b. Rinse with water and blow with high pressure air to dry.
    c. Replace them if needed.
12. ☐ Replace the Torque limiters 300 and 2500 if >30k and replace Torque limiter 2000 at >50k.
13. ☐ Repair any additional items found during pretest from step 4.
14. ☐ Reassemble, except for covers, and blow out dust.
15. ☐ Final test and adjustment, 20+ discs.
    a. Align the print head to eliminate wrinkles.
    b. Calibrate registration.
    c. Adjust vertical and horizontal positions.
    d. Adjust color density.
16. ☐ Look for any additional problems.

Additional time offer:

- Cleaning the filter, CD-pad, and cleaning unit.
- Looking under the tray (you may need to remove the ribbon platform and check the tray gear and look for any debris from broken discs)
- Checking and cleaning the color ribbon carrier.
- Cleaning all covers.
- Picking up and readying for shipment.

Everest Printer throughput part replacement schedule:

This schedule is a guide only, printer performance and customer needs should be considered when deciding what parts should be replaced.

>30,000 prints

- Print head bracket assembly
- Platen roller
- Heat roller end cap screws
- ITS guide roller 2. if damaged
- ITS roller shaft 3, if damaged or old style
- Torque limiter 300
- Torque limiter 2500

>50,000 prints

All of the above parts plus:

- Heat roller bracket assembly
- Torque limiter 2000

>100,000 prints

- If this is a rapid exchange printer you should consider taking it out of production.
- If this is a customer printer it can be fixed and checked.

>200,000 prints

The customer should consider replacing the printer.

Triage and Diagnose Everest Printer Problems

Refer to *Rimage™ Everest II / Everest III Printers Diagnostic Information* (PN 2000453_A) for more information on diagnosing and correcting these printer problems.

Damaged Print Head

Description of Problem:

A vertical line running from top to bottom in the same location on every disk.

Possible Solutions:

- Clean the print head, tacky rollers, platen roller, and guide rollers.
- Replace the print head bracket assembly.
- Check the print head cable connections and look for bent connector pins.

Possible Causes:

- Infrequent or improper cleaning and maintenance of the printer.
- Equipment placed in a dusty location or missing, damaged, or dirty fan filters.
- High number of prints on the printer.

Lower Retransfer Sensor

Description of Problem:

A 1/4 inch (1cm) or more vertical shift in the position of the print on all discs. This shift is consistent and too large to fix using the vertical position adjustment.

Possible Solutions:

- Remove and straighten the lower retransfer sensor mounting bracket.
- Replace the lower retransfer sensor and mounting bracket.
- Clean the lower RT sensor.

Possible Causes:

- Internal Everest printer packing material was improperly installed when shipped.
- High number of prints on the printer.

Ribbon Torque Limiter, 2500

Description of Problem:

Narrow bands of different color that run horizontally across the print. The problem is most easily seen in a solid color and can vary in size and color.

Possible Solutions:

- Replace the ribbon torque limiter (2500).

Possible Causes:

- High number of prints on the printer.
- If less then 10k prints it could be a defective part.

Heat Roller

Narrow to wide vertical voids in the print on one side of the disk.

Description of Problem:

A vertical void in the print that starts from one edge of the disk and extends inward ¼ inch to over an inch. If you look at the retransfer sheet the color will still be there. If the color is not there look at head alignment and platen problems.

Possible Solutions:

- Inspect and clean the platen roller, replace if damaged.
- Check the heat roller for damage, loose screws, and broken springs, repair or replace as needed.
- Make sure the heat roller runs in the printer tray guides and that they are clean.

Possible Causes:

- High number of prints on the printer.
- Infrequent or improper cleaning and maintenance of the printer.
- Printer frame bent so that heat roller is out of alignment, printer dropped or damaged.

Print Head Alignment

Description of Problem:

Small curved void(s) in the print at the top or side of the disk and could be in one or more of the color panels.

Possible Solutions:

- Inspect the ribbon carriage for damage, tighten screws, and make sure it sits squarely in the printer.
- Make sure the print head mount shaft is tight on both ends, that the mounting screws are tight, and that the head assembly is properly aligned.
- Clean the print head, tacky rollers, platen roller and guide rollers.

Possible Causes:

- High number of prints on the printer.
- Infrequent or improper cleaning and maintenance of the printer.
- Rough handling of the ribbon carriage during installation and removal.

Controller Card

Description of Problem:

The print looks faded and there are lines of off color and pixilation over the face of the entire disc.

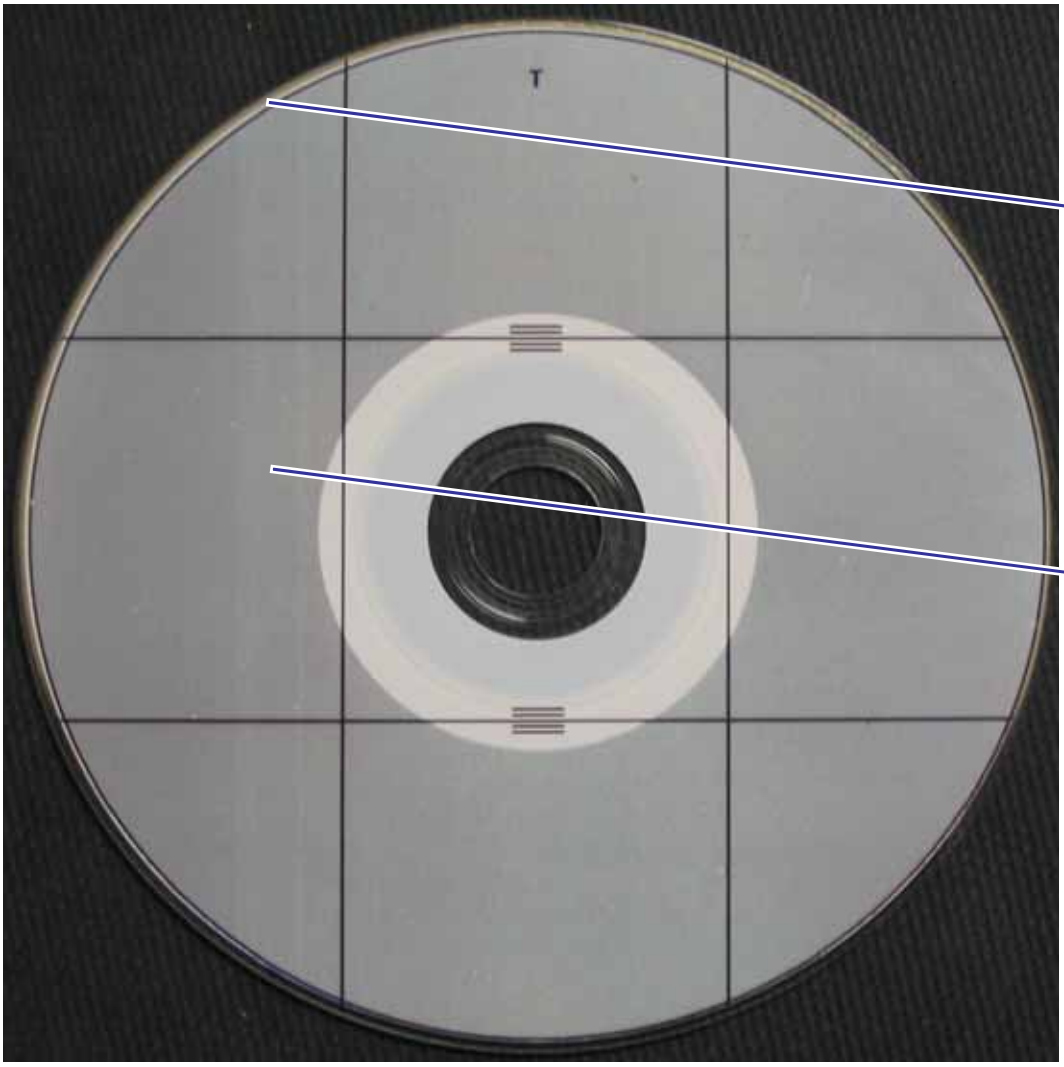
Possible Solutions:

- Make sure all cable connections going to the controller card and the print head are properly seated.
- Replace the controller card.
- Replace the print head bracket assembly.

Possible Causes:

- High number of prints on the printer.
- Static discharge into the printer.
- Part failure.

Print Head, Platen Roller



Description of Problem:

Off color lines in the print that can run horizontal or vertical and extend all or part of the way across the disc.

Possible Solutions:

- Clean the print head, tacky rollers, platen roller, and guide rollers.
- Inspect and clean the platen roller, replace if damaged.
- Replace the print head bracket assembly.

Possible Causes:

- High number of prints on the printer.
- Static discharge into the printer.
- Infrequent or improper cleaning and maintenance of the printer.

Print Head Alignment, Platen Roller

Small lines or voids in one or more of the ribbon colors

Description of Problem:

Small to medium lines or voids in the print that effect one or more of the ribbon colors. The lines can be on the left or right side and angle up or down.

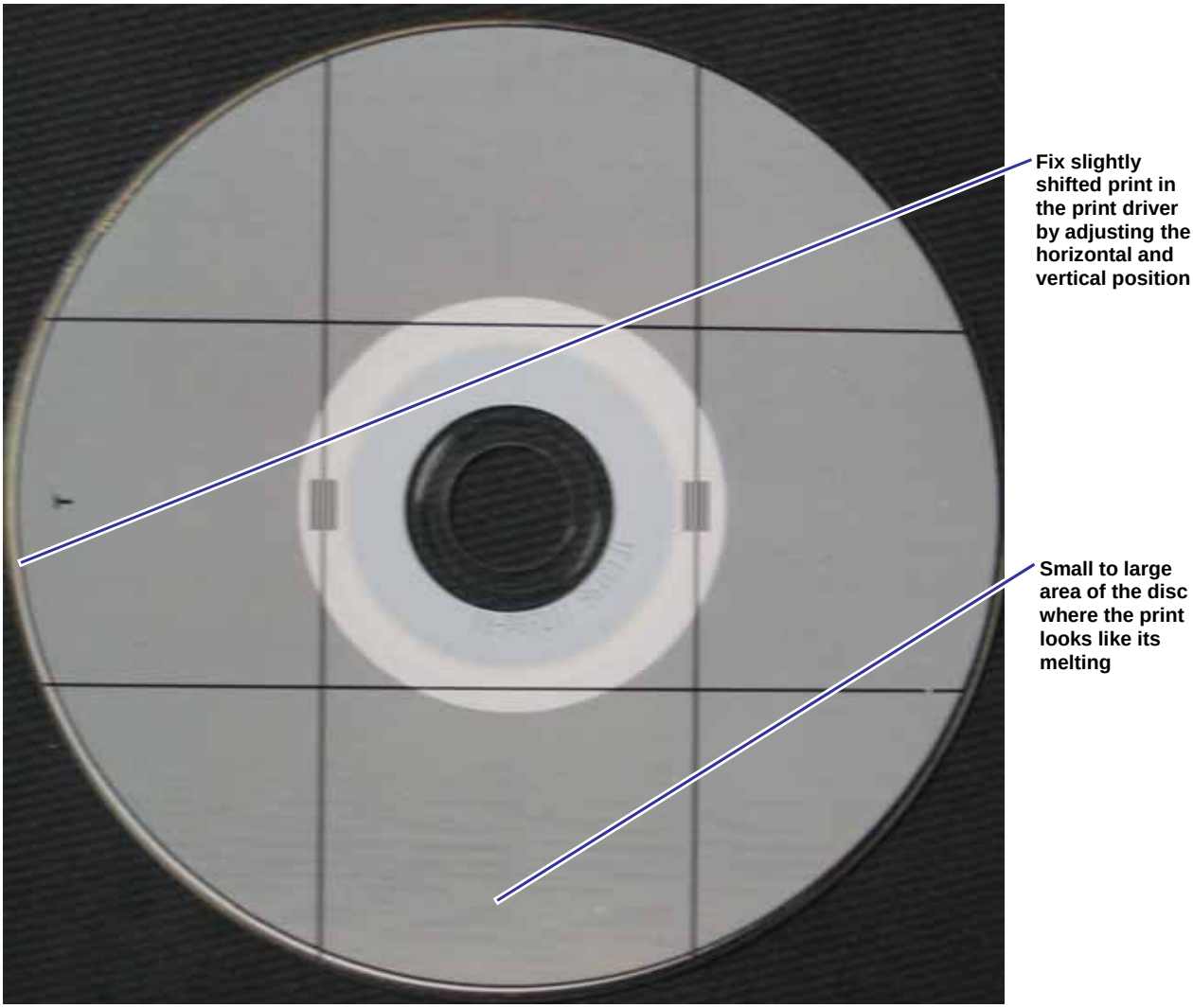
Possible Solutions:

- Inspect the ribbon carriage for damage, tighten screws, and make sure it sits squarely in the printer.
- Make sure the print head mount shaft is tight on both ends, that the mounting screws are tight, and that the head assembly is properly aligned.
- Inspect and clean the platen roller, replace if damaged.
- Replace the print head bracket assembly.

Possible Causes:

- High number of prints on the printer.
- Infrequent or improper cleaning and maintenance of the printer.

Print Head, Platen Roller, Upper RT Sensor



Description of Problem:

A small to large area of the disk usually at the top or bottom where the color varies giving the print a “melting” or “scaly” look.

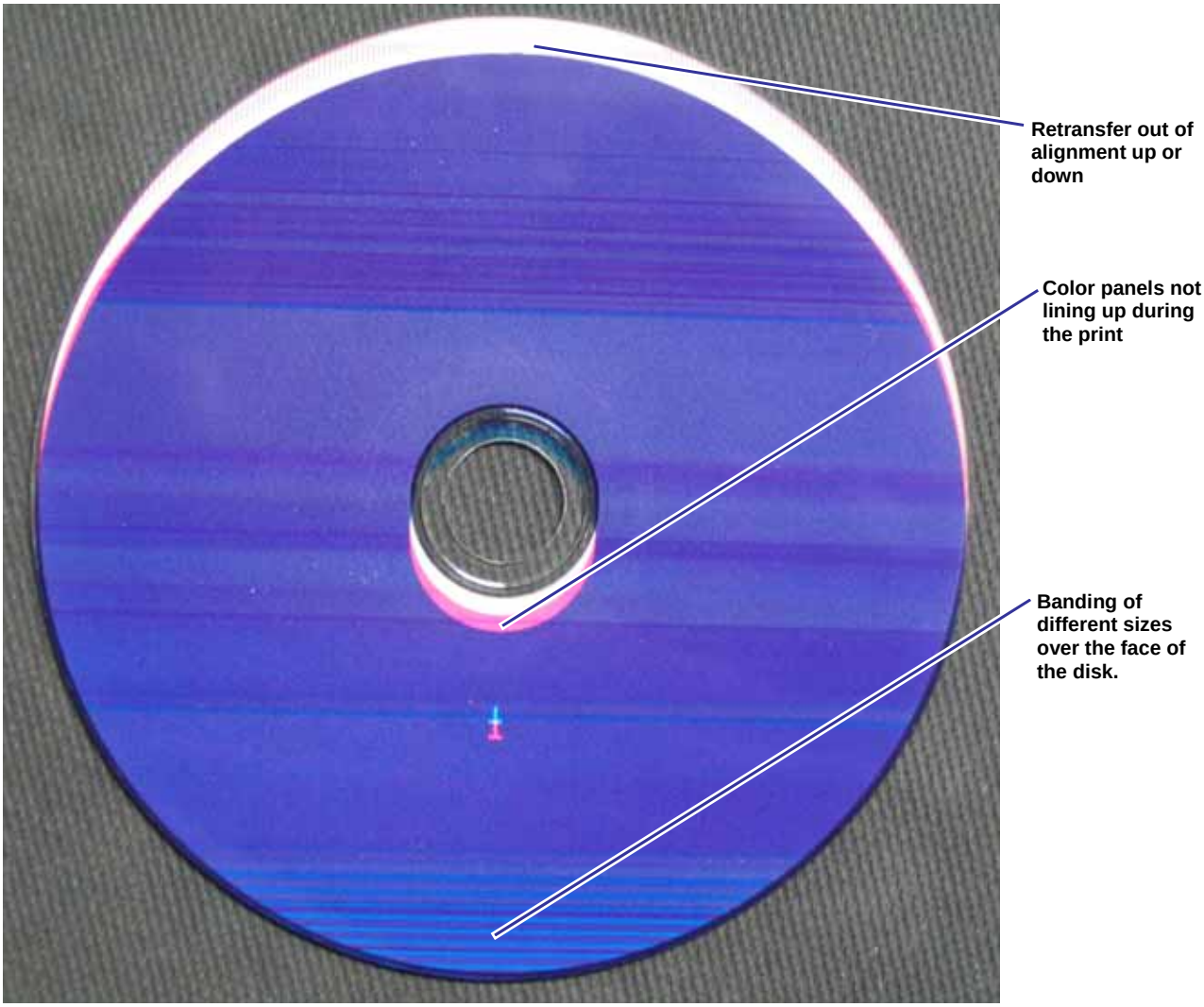
Possible Solutions:

- Clean the print head, tacky rollers, platen roller and guide rollers. Pay very close attention to the guide rollers on the head assembly.
- Make sure the print head mount shaft is tight on both ends, that the mounting screws are tight and that the head assembly is properly aligned.
- Inspect and clean the platen roller, replace if damaged.
- Replace the print head bracket assembly.

Possible Causes:

- High number of prints on the printer.
- Dirty head guide roller.
- Infrequent or improper cleaning and maintenance of the printer.

Platen Roller, Ribbon Sensor



Description of Problem:

The retransfer has shifted but it is not the same on each disc. There is banding over the full surface. The color panels don't line up.

Possible Solutions:

- Check to make sure that the platen roller pulley and mounting screws are tight.
- Make sure that the ribbon sensor is undamaged, clean, and the screws are tight.
- Inspect and clean the platen roller, replace if damaged.

Possible Causes:

- High number of prints on the printer.

Ribbon Carriage

Description of Problem:

A large or small area, usually starting at the edge of the disk and narrowing to a point. The area will look like a shadow or is the wrong color.

Possible Solutions:

- Inspect the ribbon carriage for damage, tighten screws, and make sure it sits squarely in the printer.
- Make sure the print head mount shaft is tight on both ends, that the mounting screws are tight and that the head assembly is properly aligned.
- Inspect and clean the platen roller, replace if damaged.
- Clean the print head, tacky rollers, platen roller, and guide rollers.

Possible Causes:

- High number of prints on the printer.
- Rough handling of the ribbon carriage during installation and removal.

Ribbon Sensor, Controller Card, Upper RT Sensor

Description of Problem:

There is banding over the full surface of the disc. The color panels don't line up. The retransfer may or may not line up.

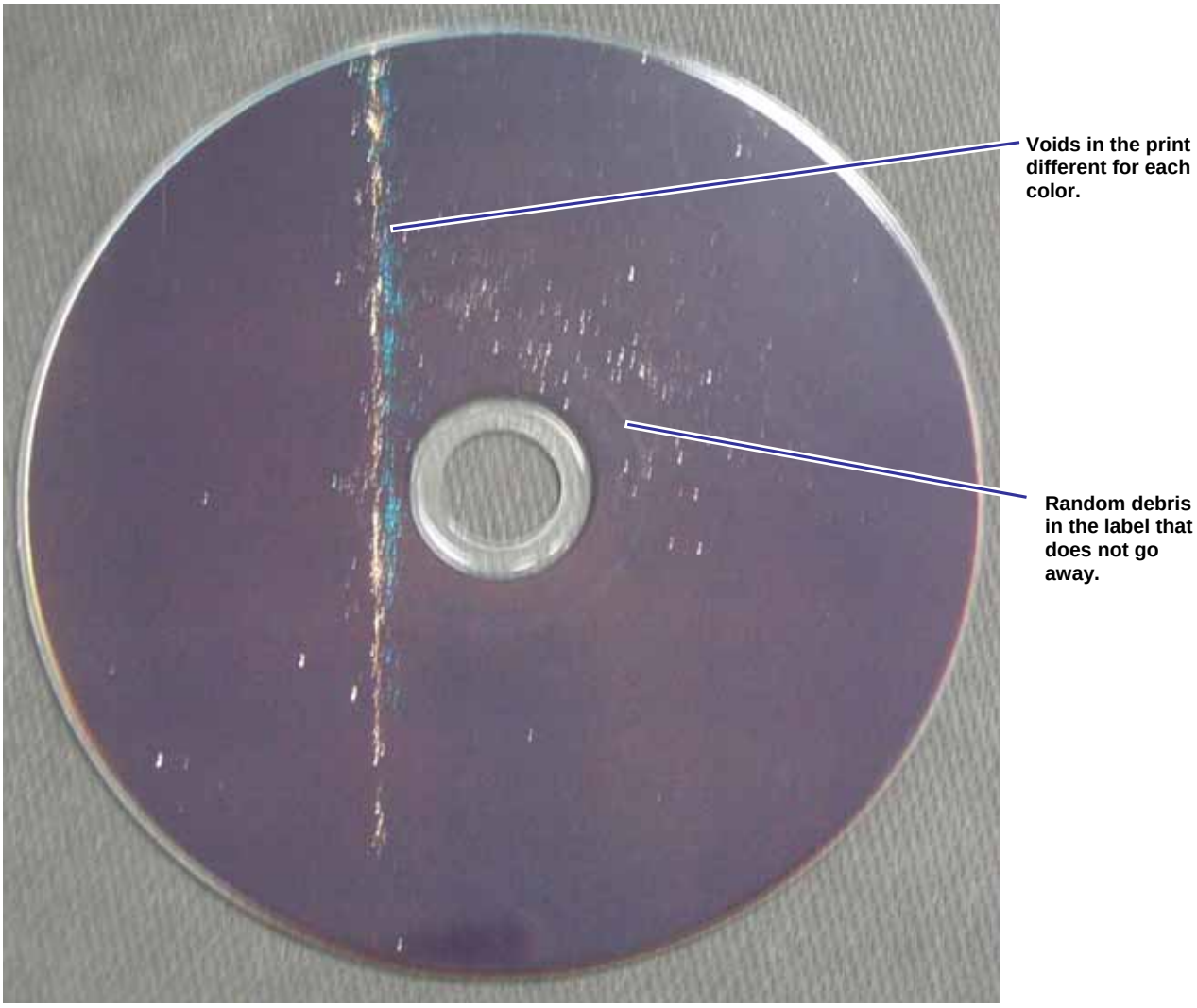
Possible Solutions:

- Make sure that the ribbon sensor is undamaged, clean, and the screws are tight, replace if needed.
- Make sure the Everest printer has the latest firmware.
- Make sure all connections to the controller card are secure. Replace the controller card if needed.

Possible Causes:

- High number of prints on the printer.
- Internal Everest printer packing material was improperly installed when shipped.

Tension Roller 2, Shaft 3



Description of Problem:

A line of debris in the label the goes most or part of the way down the disc. The voids change with each color and there is a large amount of debris on the label that does not go away.

Possible Solutions:

- Check the ITS guide roller 2 and ITS roller shaft 3 for damage. Make sure the screws are tight and the bushings are not damaged.
- Clean the print head, tacky rollers, platen roller and guide rollers.
- Inspect and clean the platen roller, replace if damaged.

Possible Causes:

- High number of prints on the printer.

Support information

US, Asia/Pacific, Mexico/Latin America	When you contact Rimage Services, please provide:
Contact Rimage Services: www.rimage.com/support.html **Email:** http://www.rimage.com/support_form.cfm **Tel:** North America: 800-553-8312 Asia/Pacific, Mexico/ Latin America: 952-946-0004	• Unit serial number and software version. • Functional and technical description of the problem. • Exact error message received.
Europe	
Contact Rimage Services Europe: www.rimage.com/support.html **Email:** support@rimage.de **Tel:** +49-(0) 1805-7462-43	