



CLEANING AND CARE

Thank you for choosing MalRay for your radiation protection needs. X-ray aprons serve a very specific purpose, to protect and shield you from the potentially harmful effects of ionizing radiation. Shielding, one of the three concepts of basic radiation safety, should always be used when the use of time and distance principles are not possible.

Protective x-ray aprons constructed of lead or a non-lead equivalent are designed to protect the radiosensitive areas of the body when it is necessary for the healthcare worker to be near the source of radiation. Typically, x-ray aprons will offer protection from 0.25mm to 0.5 mm lead equivalency. In some instances, wrap-around x-ray aprons are required when medical personnel will have their backs exposed to the radiation source.

Lead rubber is a very flexible and durable lead shielding products however, it still requires proper care in order to maximize its use and produce best result in term of radiation safety.

The following are recommended actions for the care of X-ray protective apron:

1. Regular Inspect and check apron for defects, cracks, creases, and perforations

X-ray aprons should be evaluated every 12 months to determine if replacement is needed, depending on the amount of usage and general wear and tear. It is advisable to perform more frequent inspection once it have been used for more than 5 years. To ensure proper inspection procedure, it is recommended to send the lead apron to a qualified lab to perform annual inspection and safety validation.

2. Clean Regularly

X-ray Aprons should be cleaned daily or weekly (depend on usage) and deodorized by scrubbing with a soft bristle brush, using cold water and a mild detergent. Completely remove cleaning residue by thoroughly rinsing with clean, cold water.

- Never use products that contain bleach.
- Do not soak or submerge x-ray apron in water.
- Do not machine launder, autoclave or dry-clean.
- Once cleaning is complete, if possible, hang the apron on the designated apron wall rack to air dry.

3. Properly Store X-Ray Aprons

The x-ray apron manufacturer's recommendation regarding the proper handling and storage of the apron must be strictly observed. When not in use, x-ray aprons must be stored on hangers to prevent cracks in the protective lead. If possible, do not store the x-ray apron on a flat surface. Aprons should be hung by the shoulder or on an approved apron hanger. Aprons should never be folded or creased, to avoid damaging the lead lining or lead rubber. "Cracks in the lead lining can develop at the fold, reducing the useful life of the apron¹." Hook and loop fasteners must be secured properly to avoid snagging or tearing of fabric, always store apron with fasteners completely secured.

4. Dispose of Lead Aprons Properly

X-ray protective aprons that contain lead cannot be disposed of as municipal solid waste. Consequently, they must be disposed of as hazardous waste or recycled. The user may send it back to us or contact us for any further information on handling of disposal.

5. Sit While Wearing Your Apron

Unless the x-ray apron has been designed specifically for seated procedures, you will want to avoid sitting while wearing your apron. Cracks in the lead lining can develop while wearing the apron if seated. Also, you will want to avoid sitting on the apron for the same reason.

6. Expose Apron to Extreme Temperatures

The x-ray apron shall be avoid for being exposed to extreme hot or cold temperatures or to direct sunlight.

7. Lean Against Pointed Objects or Sharp Edges

Avoid storing sharp objects in the pockets. X-ray aprons can become damaged while leaning up against sharp or pointed objects, creating perforations in the lead lining and reducing the attenuating qualities of the lead.

8. Store Aprons Over Chair Backs or Equipment

Laying aprons over a chair back or piece of equipment can create creases in the lead lining and can reduce the useful life of the apron.