

## **IS 7466:2023 for Rubber Gaskets for Pressure Cookers**

The use of pressure cookers is very common in present day living. For proper functioning of the cookers, it is essential that the various components used should be of good quality. Rubber gasket is an essential part of the cooker and subjected to heat and moisture throughout its use. It is, therefore, essential that the rubber mix used for making gasket is of good quality and they are tested for various requirements given in this standard. It is not uncommon to find often gasket contain harmful ingredients, which are likely to go into the solution/steam and contaminate the food. Further, they often impart undesirable odour, taste or discolouration.

Gaskets typically need replacement every 1-2 years, depending on the frequency of use and how well they are maintained. When replacing the gasket, it's important to choose the correct size and material to match your pressure cooker model to ensure proper sealing and safety.

Indian Standard IS 7466:2023 for Rubber Gaskets for Pressure Cookers specifies the requirements, testing methods, and sampling procedures for rubber gaskets used in pressure cookers. This standard outlines the specifications for rubber gaskets used in pressure cookers.

This standard was first published in 1974 and subsequently revised in 1994. This standard has been revised in 2023 to incorporate requirements for silicone rubber and other safety requirements like requirements of volatile matter, discolouration, odour, taste, migration of certain elements, release of harmful ingredients such as *N*-Nitrosamines, *N*-Nitrosatable substances, extractables and polycyclic aromatic hydrocarbons (PAHs). Further, the scope of the standard has been modified to cover the requirements of rubber gasket used in the commercial pressure cooker as given in IS 17870:2022.

It covers two types of gaskets: nitrile rubber (Type 1) and silicone rubber (Type 2), ensuring they are safe for food contact and free from harmful substances. The standard defines material, testing requirements, including physical properties like hardness, tensile strength, aging resistance, volatile matter, hardness, undesirable odour, taste or discolouration etc. Tests also evaluate the migration of harmful elements such as heavy metals, PAHs, and *N*-nitrosamines, *N*-Nitrosatable substances etc.

Packing and marking guidelines ensure traceability, including details like the manufacturer's name, cooker capacity to which the gasket will fit, and batch number. Sampling procedures are provided to ensure quality control across production lots.

The DPIIT Quality Control Order mandates that Rubber Gaskets for Pressure Cookers, sold, manufactured, or imported in India shall comply with IS 7466:2023 and shall bear the Standard Mark under a license from the Bureau of Indian Standards as per Scheme-1 of Schedule-II to the Bureau of Indian Standards (Conformity Assessment) Regulations, 2018.

In summary, this standard aims to ensure the gaskets are safe, durable, and suitable for extended use in pressure cookers.