Product Information

Processing of ZrO₂ | Abrasives ZR

Special abrasives for use in milling technique.

Primary crowns made of zirconium dioxide (ZrO₂) – simply called zirconium oxide by the experts – are used more and more often in connection with removable prostheses. The combination of zirconium oxide primary crowns and galvanic secondary crowns is considered a particularly high-grade solution in case of telescopic work. The advantages of high-performance ceramics, for example their excellent physical and biochemical properties, have become common knowledge. Next to their well-known physical and biochemical properties, it is most of all the excellent fit of primary and secondary elements in this combination and the simplified handling for patients regarding insertion and removal of the prosthesis which are most convincing. In addition, the aesthetic fundamental colour of the abutment teeth can be retained. An excellent surface quality of the zirconium oxide primary crown is essential to guarantee its trouble-free function. In order to shorten the often time-consuming retouching process, Komet developed special ZR abrasives designed for use in the milling device turbine. The exactly congruent abrasives with coordinated grit sizes in a high-performance bond allow to obtain precise results. Only four work steps are required to achieve an optimal surface.

The different grit sizes are coded by ISO colour rings. This helps the technician to observe the correct sequence. The golden shank facilitates recognition and allocation of the specially coordinated abrasive instruments. Komet ZR abrasives are the ultimate choice when it comes to precise work on zirconium oxide primary crowns.
**Application:**

1. Shaping with medium grit (M) colour code: blue/white

2. Fine grinding with fine grit (F) colour code: red/white

3. Pre-polishing with extra-fine grit (EF) colour code: yellow/white

4. High-shine polishing with ultra-fine grit (UF) colour code: white/white

**Recommendations for use:**

- **Recommended speed:** The abrasive instruments reach their optimal efficiency at a speed of **160,000 rpm**.

- The instruments are to be used in a precision laboratory turbine with water cooling, inserted in a milling device.

- Apply low contact pressure (<2N) during the entire process.