

Claims

1. A plastic container product, in particular produced according to the blow-molding, filling and sealing process, having a container wall which can be pierced by means of a cannula in predefinable piercing regions for the purpose of accessing the container contents, wherein in order to prevent stamped parts, which are produced when the container wall is pierced with the cannula, the mathematical product of the container wall thickness in a piercing region (33) and the tensile modulus according to ISO 527 of the plastic material is less than 400 MPa·mm, particularly preferably less than 300 MPa·mm, and wherein the container product comprises a head part (7), characterized in that, the piercing region (33) on a top side (9) of the head part (7) is from 1 to 70 mm² and the wall thickness of the container region to be pierced is at least 0.3 mm.
2. The container product according to Claim 1, characterized in that, as the plastic material, at least one polymer is used with
 - a high heat resistance, in particular with a melting temperature according to ISO 3146 of at least 130 °C, and
 - an average elongation according to ISO 527 of more than 12 %.
3. The container product according to one of the preceding claims, characterized in that, as the plastic material, a polypropylene, a polypropylene copolymer or a blend with PP-based elastomers is used for the production thereof.
4. The container product according to one of the preceding claims, characterized in that the head part (7) of the container is covered with a cap (12), which is firmly connected to the head part (7).
5. The container product according to Claim 4, characterized in that at least one pierceable insert (19), preferably formed from elastomer material, is provided between the cap (12) and the head part top side (9) of the container so that, at least during the piercing, said insert presses on the head part top side (9) with a surface pressure of preferably more than 20 N/cm².
6. The container product according to Claim 5, characterized in that at least two pierceable inserts (19, 21) which are different from one another are provided, with said inserts serving different purposes, the one (19) serving for piercing by means of a cannula, and the other (21) serving for piercing by means of a hollow spike.
7. The container product according to Claim 5 or 6, characterized in that the hardness of at least one pierceable insert (19) is from 20 to 70 Shore A, particularly preferably from 25 to 50 Shore A.
8. The container product according to one of the preceding claims, characterized in that the piercing region (33) on the head part top side (9) is from 20 to 50 mm².
9. The container product according to one of the preceding claims, characterized in that the head part (7) of the container (1) has a reinforcing rib (15).
10. The container product according to one of the preceding claims, characterized in that the head part (7) of the container (1) has a reinforcing rib (15) and is firmly connected to a housing (17) of the cap (12).
11. The container product according to claim 7, characterized in that the at least one pierceable insert (14) is an elastomer.