Claims

1. Method for producing a roofing detail (12) part for sealing a roof element (1), the method comprising the steps of:
   (a) Providing and/or obtaining a digital model (6) of a roof element (1) to be sealed;
   (b) Based on the digital model (6), producing a roofing detail part (12) fitting on the outer shape of the roof element (1) by additive manufacturing,
   whereby the roof element (1) is a roof curb, a roof drain, a roof edge, a roof expansion joint, a roof parapet wall, a roof penetration, a roof sleeper, a roof transition, a roof corner, a roof tie-in and/or a roof wall.

2. Method according to claim 1, whereby in step a), the digital model (6) of the roof element (1) is obtained by 3D scanning of the roof element.

3. Method according to any of claims 1 - 2, whereby the scanning of the roof element (1) is performed with a handheld and/or portable 3D scanner (3).

4. Method according to any of claims 1 - 3, whereby additive manufacturing is effected by 3D printing, especially by fused deposition modeling (FDM) or fused particle fabrication (FPF).

5. Method according to any of claims 1 - 4, whereby the roofing detail part (12) is produced from a plastic material, especially from a thermoplastic material, in particular from thermoplastic polyolefins (TPO), polyvinylchloride (PVC) and/or keton ethylene ester (KEE).

6. Method according to any of claims 1 - 5, whereby the plastic material additionally comprises antioxidants, fillers, pigments, reinforcing materials and/or further thermoplastic polymers.

7. Method according to any of claims 1 - 6, whereby the roofing detail part is produced with a single ply structure.

8. Method according to any of claims 1 - 7, whereby a wall thickness of the roofing detail part (12) produced is from 0.1 - 10 mm, especially 1 - 5 mm.

9. Method according to any of claims 1 - 8, whereby in step b) the roofing detail part (12) is produced with an inner shape corresponding to the negative form of the digital model (6) of the roof element (1).

10. Method according to any of claims 1 - 9, whereby the production of the roofing detail part (12) is effected such that an outer surface of the roofing detail part (12) is similar to the outer surface of the roof element, especially the outer surface of the roofing detail part (12) represents a uniformly scaled shape of the outer surface of the roof element (1).

11. Method according to any of claims 1 - 10, whereby in step b), based on the digital model (6) of the roof element (1), a further digital model (10) of the roofing detail part (12) to be produced is generated.

12. Method for sealing a roof element (1) comprising the following steps:
(i) Performing the method according to any of claims 1 - 11 in order to obtain a roofing detail part (12) fitting on the roof element (1);
(ii) Installing the roofing detail part (12) on the roof element (1);
(iii) Optionally, connecting the installed roofing detail part (12) with a further sealing element (2) on the roof, especially by heat welding.

13. Method according to any of claims 1 - 12, whereby the roofing detail part (12) is a cover, a hood, a cap or a revetment for a roof element, especially for a roof curb, a roof drain, a roof edge, a roof expansion joint, a roof parapet wall, a roof penetration, a roof sleeper, a roof transition, a roof corner, a roof tie-in and/or a roof wall.