WHAT IS CLAIMED IS:

1. An assembly alignment structure for optical component, comprising:

an optical fiber, comprising a combined fiber segment and a plurality of bare fiber segments;

a cover plate, having a first installation surface, the first installation surface being disposed with a plurality of guide grooves corresponding to the plurality of bare fiber segments, an installation groove, and at least one first coupling groove, the bare fiber segments being arranged in the corresponding guide grooves;

a lens, disposed in the installation groove;

a chip, having a signal receiving surface;

a carrier plate, having a second installation surface, the second installation surface being disposed with at least one second coupling groove, the chip being fixed on the second installation surface; and

at least one positioning post;

wherein, when the cover plate is aligned to cover the carrier plate, the positioning post is located in the first coupling groove and the second coupling groove, the optical fiber and the lens are accurately fixed between the carrier plate and the cover plate, and the optical signal of the optical fiber is projectable to the signal receiving surface through the lens.

2. The assembly alignment structure for optical component according to claim 1, wherein the first coupling groove and the second coupling groove are at least one of a V-shaped groove or a U-shaped groove, and the positioning post is a cylinder.

3. The assembly alignment structure for optical component according to claim 1, wherein the first installation surface forms a plurality of side-by-side recessed

guide grooves at middle part, and the first coupling groove is formed at both sides of the plurality of the first guide grooves.

4. The assembly alignment structure for optical component according to claim 1, wherein the installation groove is a stepped groove, located at one axial end of the plurality of guide groove, and adjacent to a vertical surface of one side of the first installation surface, the installation groove has an alignment plane, and the first installation surface also is disposed with a plurality of alignment grooves, the alignment grooves are adjacent to both sides of the plurality of guide grooves and communicate with the installation groove, and the alignment grooves is a V-shaped groove or a U-shaped groove.

5. The assembly alignment structure for optical component according to claim 4, wherein the lens has a stripe shape and corresponds to a plurality of the bare fiber segments, and an optical fiber passive alignment surface and an optical light-emitting surface are respectively formed on two vertical side surfaces of the lens, the optical fiber passive alignment surface faces the bare fiber segments, the lens has an inlay and located on the side of the optical light-emitting surface, the inlay is in contact with the alignment plane, and the lens also has a plurality of guide posts located on the side of the optical fiber passive alignment surface, and the guide posts are located in the alignment grooves.

6. The assembly alignment structure for optical component according to claim 5, wherein each of the alignment grooves is a U-shaped or V-shaped groove; each of the guide posts includes a partially arc surface located in a respective one of the alignment grooves.

7. The assembly alignment structure for optical component according to claim 5, wherein the second installation surface has an accommodating groove, the chip is

located in the accommodating groove, the signal receiving surface of the chip faces upward, and the optical signal of the optical fiber is reflected by the optical light-emitting surface and then projected downward on the signal receiving surface.

8. The assembly alignment structure for optical component according to claim 1, wherein the second installation surface has a plurality of position marks, the chip is fixed in the enclosed area formed by the position marks, and a vertical surface of the chip has the signal receiving surface, and the optical signal of the optical fiber is directly projected on the signal receiving surface after being focused by the lens.