

ABSTRACT

An optical receiving assembly (100a), a control method, and an optical module. The optical receiving assembly (100a) comprises an optical receiving port (110), a variable optical path deflection assembly (120), a semiconductor optical amplifier (130), an optical detector (140), and a controller (150); an optical signal received by the optical receiving port (110) is subjected to deflection angle regulation by means of the variable optical path deflection assembly (120) and is then incident into the semiconductor optical amplifier (130); the incident optical signal is amplified by means of the semiconductor optical amplifier (130) and is then coupled to the optical detector (140); the optical detector (140) converts the received optical signal into an electric signal to be output; the controller (150) controls the variable optical path deflection assembly (120) according to the change in the strength of the electric signal to regulate the deflection angle of the optical signal, so as to regulate coupling efficiency of coupling the optical signal to the semiconductor optical amplifier (130), such that the electric signal output by the optical detector (140) is kept in a preset interval. The optical receiving assembly (100a) directly uses a chip assembly structure, effectively reduces the size, and facilitates the miniaturization of the optical module, and the control method is more simple and direct, can realize fast and efficient control, and has higher sensitivity.

Fig. 2