

ABSTRACT

NORMAL INCIDENCE PHOTODETECTOR WITH SELF-TEST FUNCTIONALITY

Photonicallly integrated normal incidence photodetectors (NIPDs) and associated in-plane waveguide structures optically coupled to the NIPDs can be configured to allow for both in-plane and normal-incidence detection. In photonic circuits with light-generation capabilities, such as integrated optical transceivers, the ability of the NIPDs to detect in-plane light is used, in accordance with some embodiments, to provide self-test functionality.

(fig. 2)