APPARATUS FOR AND METHOD OF RECORDING INFORMATION ON OR REPRODUCING INFORMATION FROM RECORDING MEDIUM

ABSTRACT OF THE DISCLOSURE

A laser diode applies a laser beam through a grating, a beam splitter, and an objective to a compact disc. A laser beam reflected by the compact disc is applied through the objective and the beam splitter to a photodiode. The objective has a large numerical aperture of 0.6 in order to be able of play back a digital video disc that has a thin substrate and contains information recorded at a high density. To prevent the photodiode from suffering aberrations caused due to the large numerical aperture of the objective, the photodiode has a relatively small photodetector unit having a normalized detector size ranging from 3 μm to 16 μm, for detecting only returning light up to a numerical aperture of 0.3 and not detecting light of greater numerical aperture values.

Figure 5