

[Question - 2 section - 5]

Answer

Advantage of Optical fibre communication:—

- (1) Optical fibre communication has enormous band width and hence show far greater transmission potential than the metallic cable system.
- (2) Optical fibre cables are of small size weight as compared to metallic cables and hence occupy small space for its operation.
- (3) Optical fibre are insulators electrically. They do not show earth loop and interface problem like metallic cables.
- (4) Optical fibre from a dielectric wave guide and are therefore free from electromagnetic interference, or radio frequency interference.
- (5) Optical fibres provide high degree of signal security, as compared to metallic cable. In optical cables
- (7) Optical fibre communication is noise free.
- (8) Optical communication cannot be jammed as easily as radio wave.
- (9) Optical fibre are most suitable for digital transmission and switching system.
- (10) Optical fibre are most suitable for wave length multiplexing.