

Title (en)
OPTICAL COMMUNICATIONS NETWORK AND NODE FOR FORMING SUCH A NETWORK

Title (de)
OPTISCHES ÜBERTRAGUNGSNETZWERK UND KNOTEN ZUR HERSTELLUNG EINES DERARTIGEN NETZWERKS

Title (fr)
RESEAU DE COMMUNICATION OPTIQUE ET NOEUD POUR FORMER UN TEL RESEAU

Publication
EP 1354439 A2 20031022 (EN)

Application
EP 01976459 A 20011012

Priority
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• US 69606700 A 20001025

Abstract (en)
[origin: WO0235749A2] An optical network has adjacent pairs of nodes in a ring connected by a working optical fiber or fibers and by a protection optical fiber or fibers of lower bandwidth. Each node comprises an optical switching arrangement for switching signals from at least one external input to the node onto a protection fiber, each node further comprising a detector for detecting signal failure or degradation on the or each incoming working fiber. The optical switching is controlled in dependence on the detected signal failure or degradation. An optically switched protected ring configuration is thereby provided with shared protection allocation, for example 1:n protection. The sharing of protection bandwidth between greater bandwidth working fibers improves the fiber efficiency. This requires the signals on the working fibers to be allocated a level of service, so that premium channels are protected against cable failure because they have the lower protection bandwidth allocated to them.

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