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Title:THz frequency bands generation for Radio-over-Fiber systems

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Abstract:We propose a new design THz frequency for Radio-over-Fiber (RoF) systems that use the dense wavelength division multiplexing wavelength enhancement, whereas the increasing in channel capacity and signal security can be provided. The increasing in number of channel can be obtained by the increasing in wavelength density, while the security is introduced by the specific wavelength filter, which is operated by the central operator. The optical communication wavelength enhancement is reviewed. The advantage is that the proposed system can be implemented and used incorporating with the existed communication link in both wire and terabit wireless communication system. © 2011 Elsevier GmbH. All rights reserved.

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