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Title: Terahertz wave generator comprises a dual mode semiconductor laser device to generate and beat the generated laser lights, and a photo mixer to generate a continuous terahertz wave when excited by the beat laser light

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Abstract: NOVELTY - A terahertz wave generator comprises a dual mode semiconductor laser device (110) configured to generate at least two laser lights having different wavelengths and to beat the generated laser lights; and a photo mixer (120) formed on the same chip as the dual mode semiconductor laser device and to generate a continuous terahertz wave when excited by the beat laser light.

USE - Used as a terahertz wave generator (claimed).

ADVANTAGE - The present invention provides a portable, small-sized, low-cost and reliable terahertz wave generator.

DESCRIPTION DRAWING(S) - The drawing shows a plan view a terahertz wave generator.

Semiconductor laser device (110)

Photo mixer (120)

Photoconductive material (122)

Antennas (124, 125)

Wave guide (130)

Derwent Class Code(s): V08 (Lasers and Masers)

Derwent Manual Code(s): V08-A04A; V08-A04X

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