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Suppression of γ-photon absorption via quantum interference

Anisimov P., Vagizov F., Rostovtsev Y., Shakhmuratov R., Kocharovskaya O. Kazan Federal University, 420008, Kremlevskaya 18, Kazan, Russia

Abstract

We show that the interference effects (similar to electromagnetically induced transparency, which was widely studied earlier in electronic transitions in optics) may appear in -radiation at nuclear transitions under the condition of nuclear level anticrossing. We demonstrate it also experimentally in optically thin samples of FeCO3.

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