

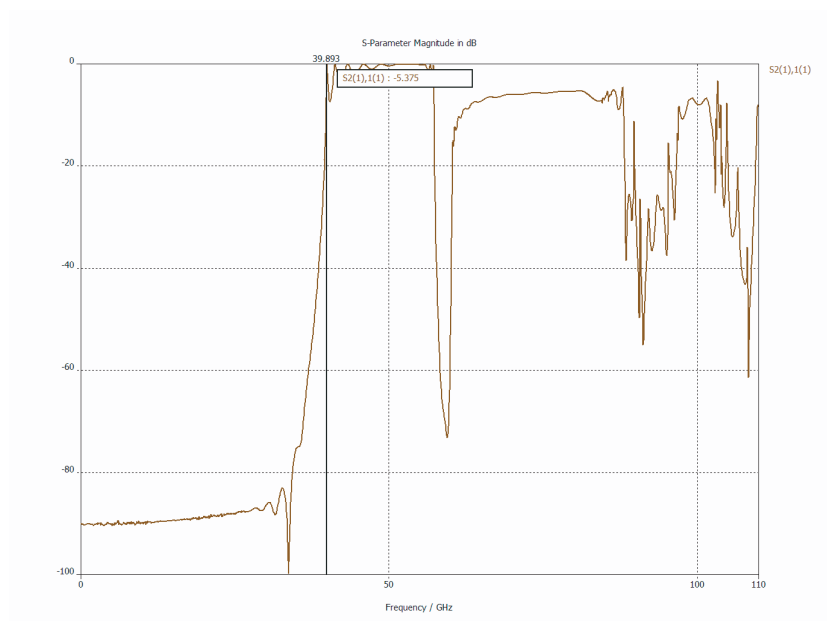
Photonic Crystal Made of Dichroic Filters

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By using a conventional dichroic filter operating in the Millimeter Waves, made of a metallic plate of 0.5 mm thickness drilled with a two dimensional hole array with 4 mm hole diameter and 5 mm geometrical period in both transversal dimensions, we have designed a Photonic Crystal consisting of stacking several plates separated by air with a longitudinal geometrical period of 2 mm. In spite of the fact that the longitudinal periodicity predicts a bandgap around 85 GHz, a lower bandgap is also present at 57 GHz due to transversal periodicity. Possible applications as frequency selective surfaces are discussed.



REFERENCES

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