

## **One-way waveguide and high-index meta-materials**

Shanhui Fan, Z. Yu, G. Veronis, Z. Wang, and J. T. Shen

### **Summary**

We show that the interface between a metal under static magnetic field, and a photonic crystal, can form a one-way waveguide. We also provide a general mechanism that allows one to design three-dimensional electromagnetic meta-materials with high index over broad band.

