

## Re: Another polarization question

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*Source:* <http://sci.tech-archive.net/Archive/sci.optics/2007-12/msg00130.html>

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- *From:* Helmut Wabnig <hwabnig@. - - - - . DOT . - t>
  - *Date:* Sat, 29 Dec 2007 09:38:55 +0100
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On Fri, 28 Dec 2007 15:27:49 -0000, "Fleetie"  
<fleetie@xxxxxxxxxxxxxxxxxxxxxx> wrote:

"Helpful person" <rrllff@xxxxxxxxxx> wrote

If the separation of the blinds is small then light will not be able to vibrate in that direction. Hence the light passing through it is polarized. This efficiency is dependent on the blind separation as compared to the wavelength of light.

So are you saying then that the waves that are vibrating parallel the lengths of the open "slits" are the ones that get through?

If so, have you looked at the wikipedia article on this?

"Note that the polarization direction is perpendicular to the wires; the concept that waves "slip through" the gaps between the wires is incorrect."

<http://en.wikipedia.org/wiki/Polariser>

Martin

Wire mesh is made of electrically conducting material.  
A horizontally oriented slot antenna radiates vertically polarized.  
Think of the wire mesh as an array of slot antennas.  
[http://hjem.get2net.dk/ole\\_nykjaer/oz2oe/antenner/10wg.html](http://hjem.get2net.dk/ole_nykjaer/oz2oe/antenner/10wg.html)

Dielectrical antennas made of insulating material  
react the other way round.  
Think of the plastic molecules as dielectrical slots.

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