The mathematical relationship between n & v is _____

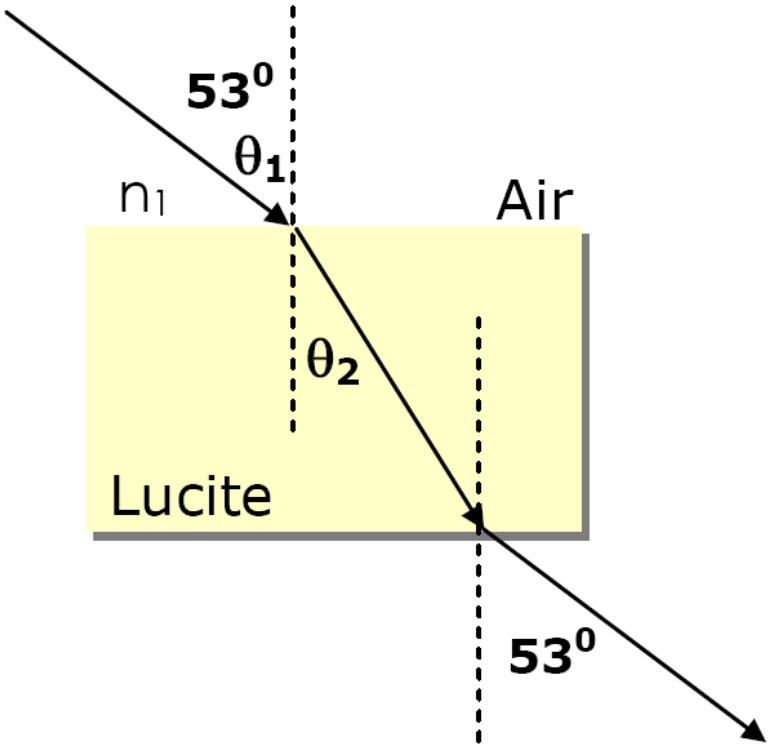
n = ___

Which substance on the Absolute Indices of Refraction slows down light

the most? _____ the least? _____

The more light is _____, the more it _____

1. Prediction Θref from Θ in



a. Snell's Law _____ On Reference Table

1 – incident medium 2 – refractive medium

Air Lucite

$n_1 \sin\underline{\Theta}_1 = n_2 \sin\underline{\Theta}_2$

b. _____

1 – incident medium

2 – refractive medium

When a light changes media, its _____ _____

<u>NOT</u> its _____

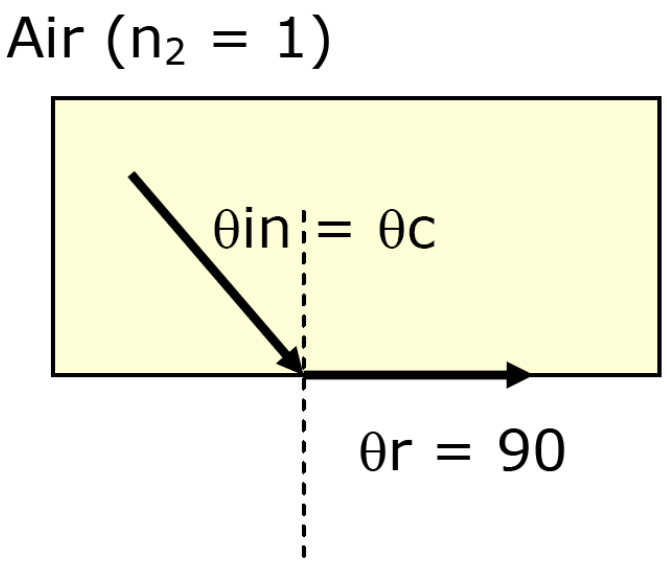
c. _____

2. Critical Angle – **angle of** _____ for which the

_____ **equals** _____ when

light travels inside one medium that _____

_____



Θc for Lucite

sin Θc =

3. Total Internal Reflection – (High n to Low n)

When Θ_1 =

When Θ >

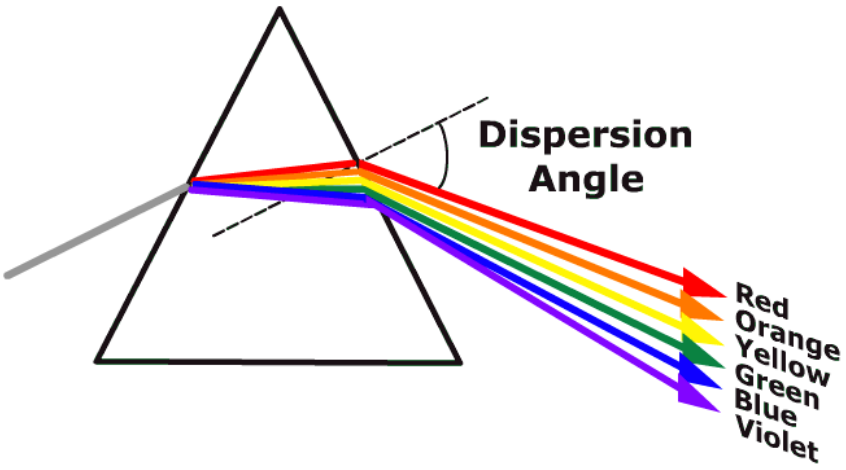
When Θ <

Lucite Θc = 41.8

Θ_1 > 41.8 _____

Θ_1 < 41.8 _____

1. Dispersion – _____ into its component wavelengths (colors)



Each color has a different _____ (different speeds)

Red - fastest (slowed least), bent least

Violet - slowest (slowed most), bent most

Dispersive Medium – a medium in which the velocity of a wave depends on its frequency

ex) _____

Nondispersive _____