

ECE320: Fields and Waves

Lab 1 Report: Waves on Transmission Lines

Alp Tarım, Pranshu Malik

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1 Introduction

This assignment was about exploring the characteristics of transmission lines (abbrv. T.L.), studying voltage and current propagation along the T.L.s, as well as depedance on loads.

Introduction to the lab and its purpose. The following is the reflection coefficient for a transmission line

$$\Gamma = \frac{Z_L - Z_0}{Z_L + Z_0}$$

2 Determining the Characteristic Impedance, Z_0

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We know that the reflections become 0 when $Z_L = Z_0$.

3 Conclusion

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Figure 1: Simulation Results