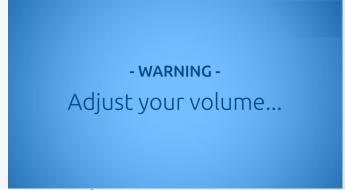
Recognizing Sounds (e.g. my alarm clock!): Storing and Comparing Frequency Spectra

Matthew Sheinman
BU Physical Electronics Lab
Boston University
4/29/21

Testing Alarms



YT: Sonic Electronix

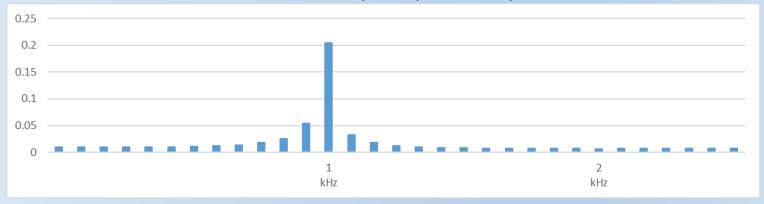


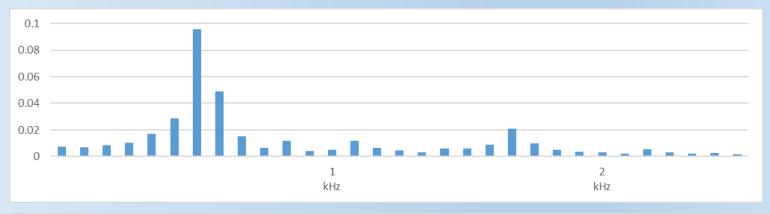
YT: Audio Sounds

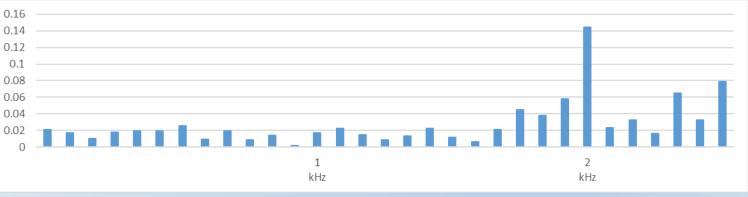


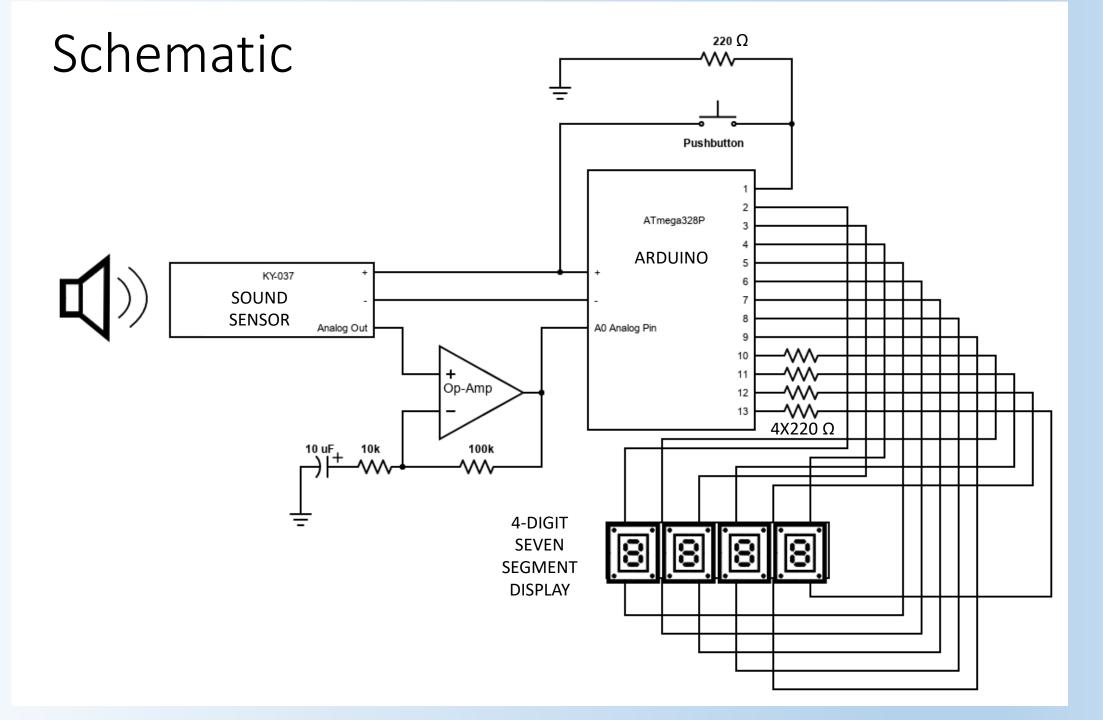
YT: TheMSsoundeffects

Normalize Frequency Power Spectra

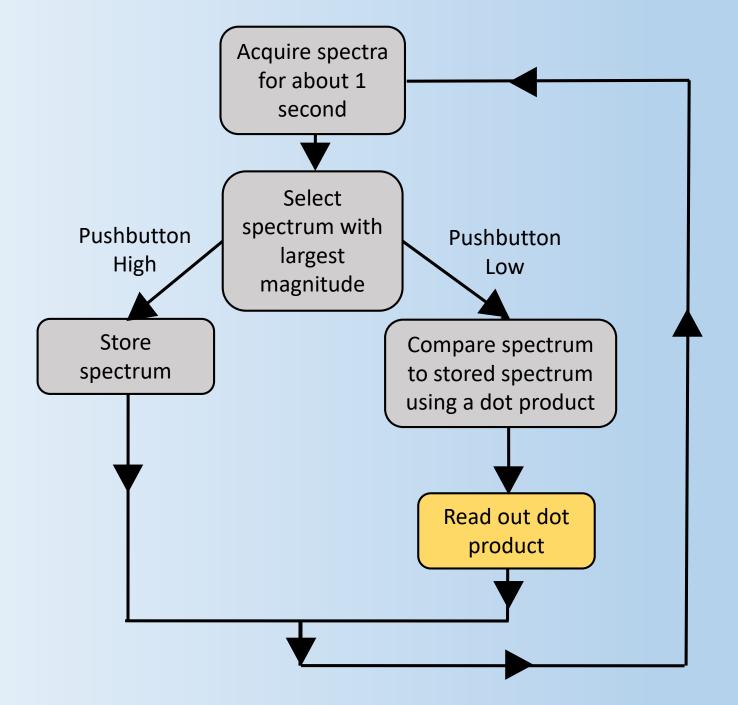




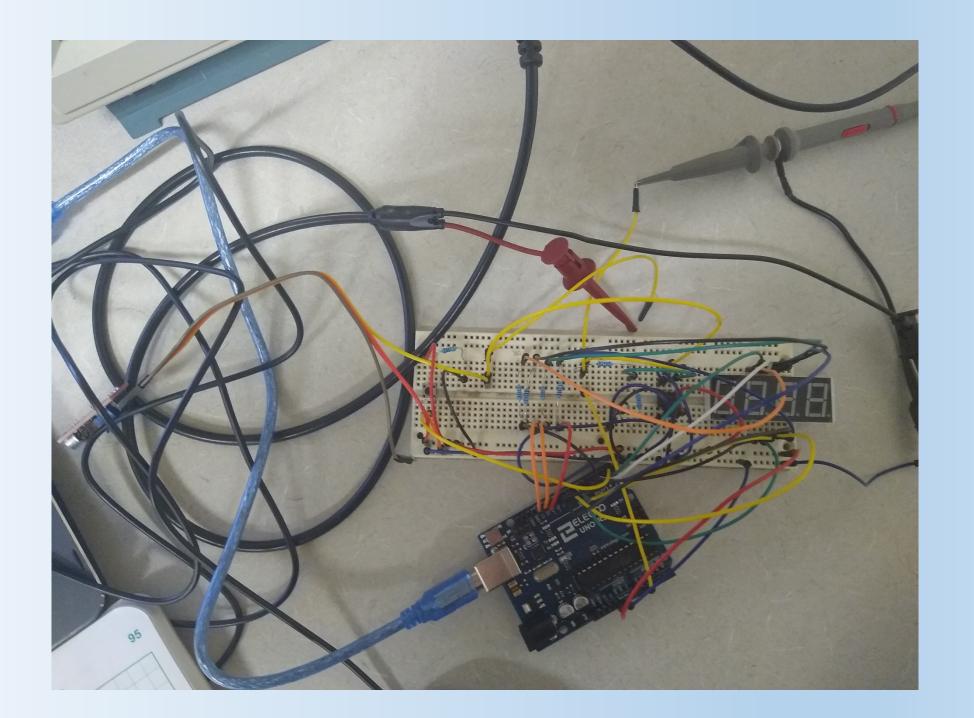




Software



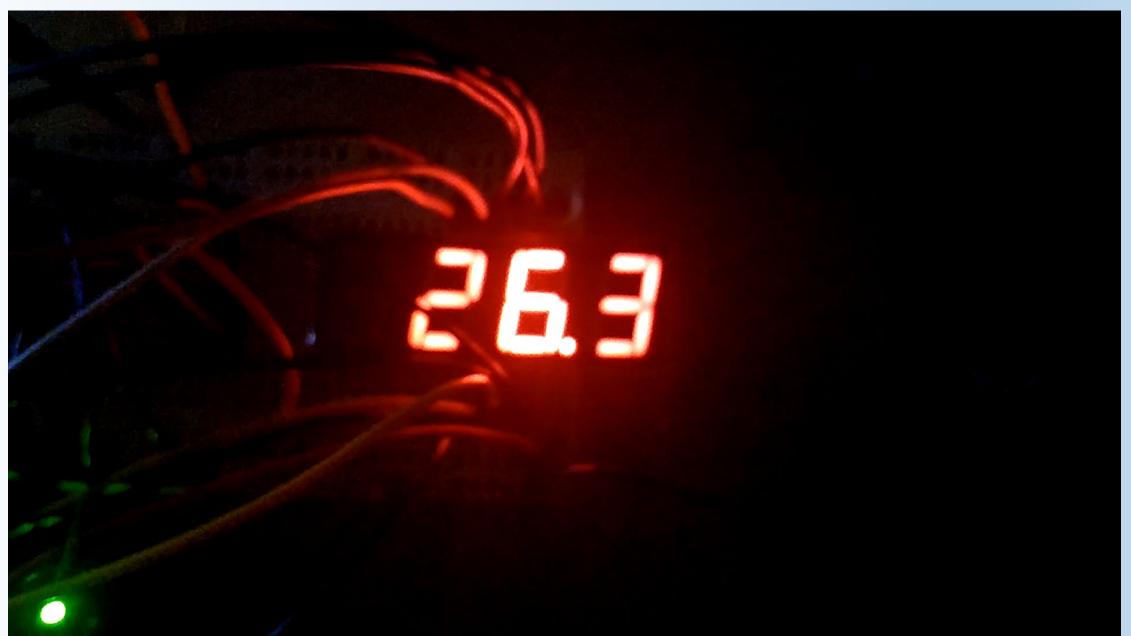
Setup



Results – Sine Wave



Results – Alarm Clock



Results – Industrial Alarm



Thank You!