Lecture 6: ML Project Strategy
Menti Code: 12 07 68
"Alexa" - trigger word.

"Lena turn on"
"Lena turn off"

"Robert turn on""RTO"
Read online literature.
- Blog posts, research papers, code (github).

Some papers don't make sense, or are wrong.

Talk to experts.
- Email authors.

5-20 papers
Collect training + dev + test sets.

What would you put in the dev set?

How many examples?
10 sec audio clips. 0.5 sec

100 examples

Process 3 sec of audio.

Train 100 clips \( \rightarrow \) 7000 samples

25 dev
no test
der acc.: 99.5%
def. detection

98.1% away on ten. 50.1% on dec.

1) Collect background audio.

2) Collect 10 sec clips of RTD, and of random words.
   "cardinal"

3) Synthesize 10 sec clips.

) 1 sec 1 losec
Do the quick thing first.

1) Run small Stanford. $- \frac{100}{50} \approx 2$  
2) Download clips online $\leq 1000$  
3) Turtles

Overfitting still
Model takes ~8h to train.

Early stopping
→ 12 months.
→ 1 month.
↓ 1 hour

compare
you

1 6 12 months

Ton