



Chest X-Ray Analysis

Michael Tsypin



Overview

- Create model that reads chest x-ray to determine pneumonia or not

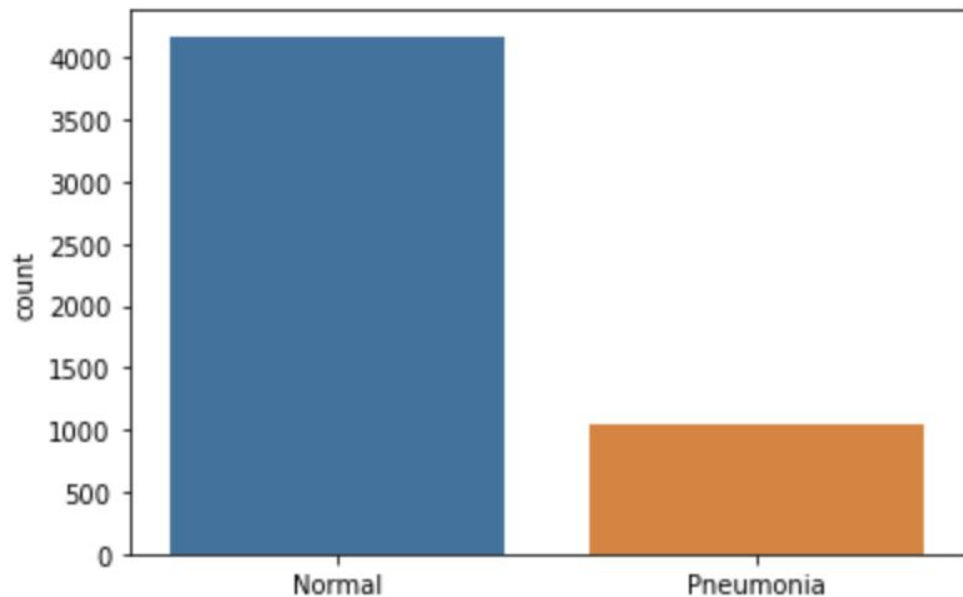
Outline

- Business Problem
- Modeling
- Evaluation
- Conclusion

Business Problem

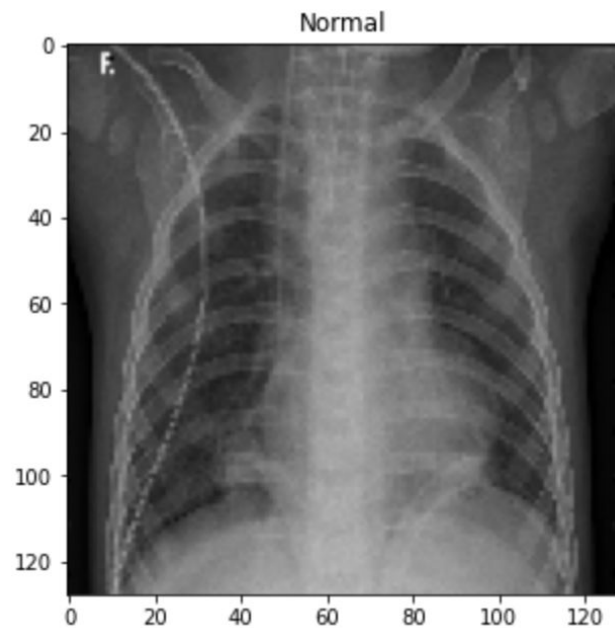
- Hospital wants to reduce time reviewing chest x-rays

Data

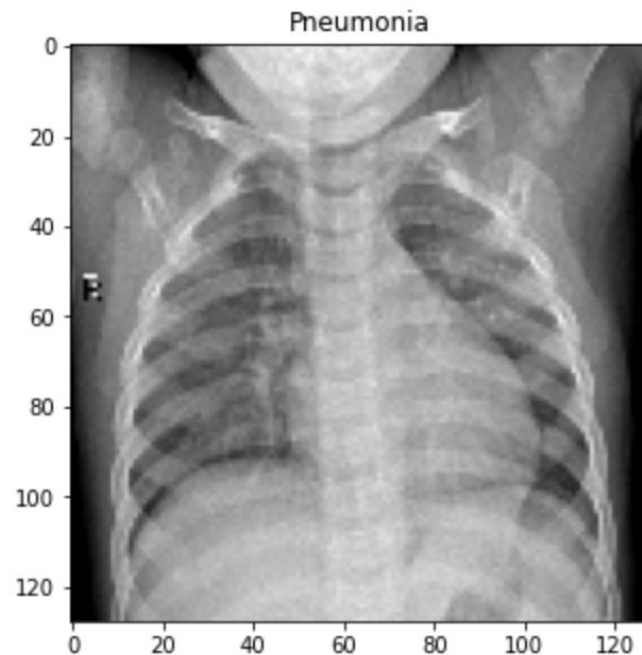


- Chest x-rays from pediatric patients of Guangzhou Women and Children's Medical Center

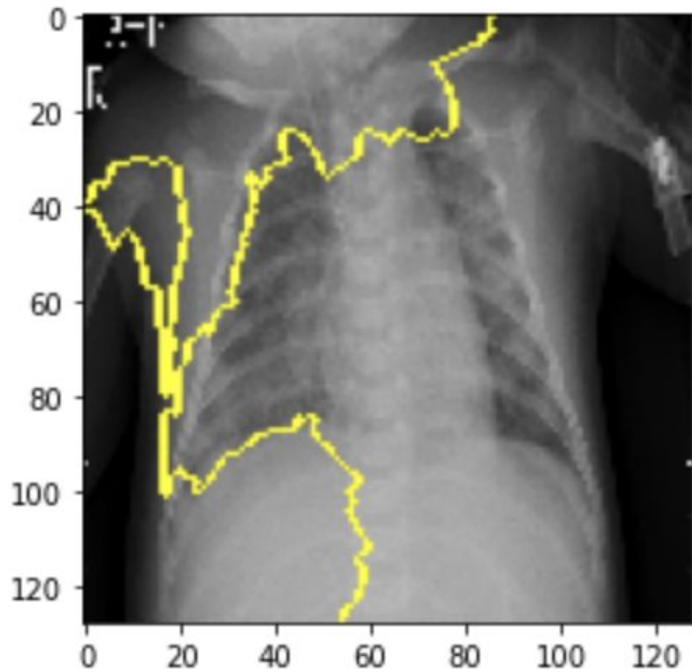
Modeling



- Iterating through deep learning networks

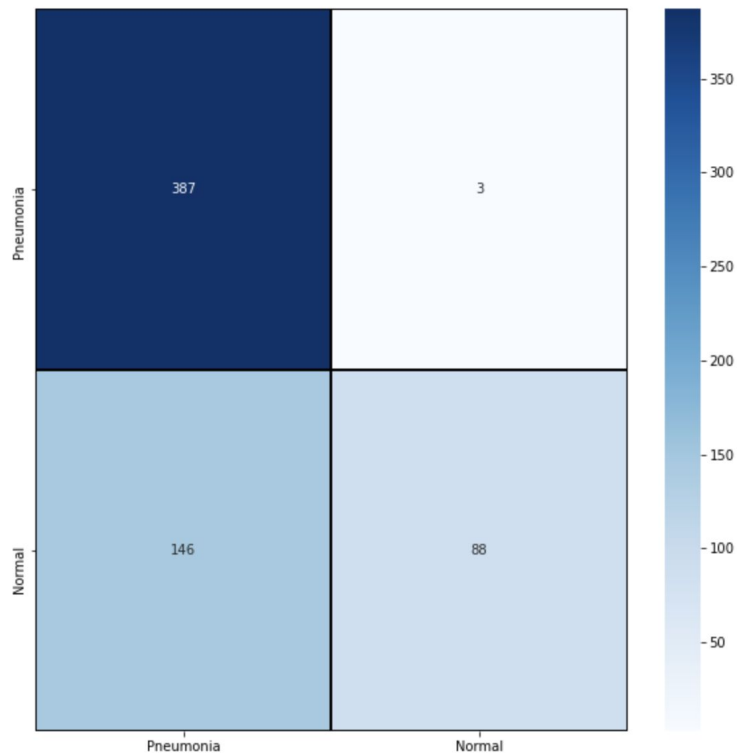


Evaluation



- Accuracy score of 76%

Evaluation



- False positives most detrimental

Conclusion

- Use CNN model
- Help radiologist make diagnosis

Thank you!

Questions?

Email: mtsypin9@yahoo.com