

# Chủ đề



Research Code Competition

## Global Wheat Detection

Can you help identify wheat heads using image analysis?







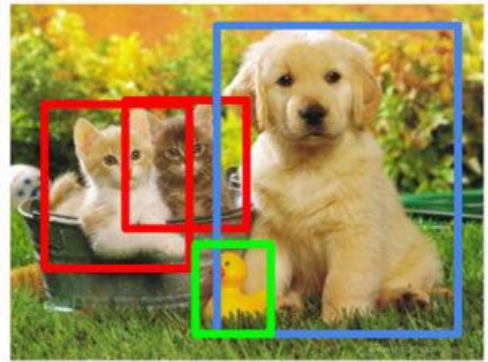
# CLASSIFICATION VS OBJECT DETECTION

## Classification



CAT

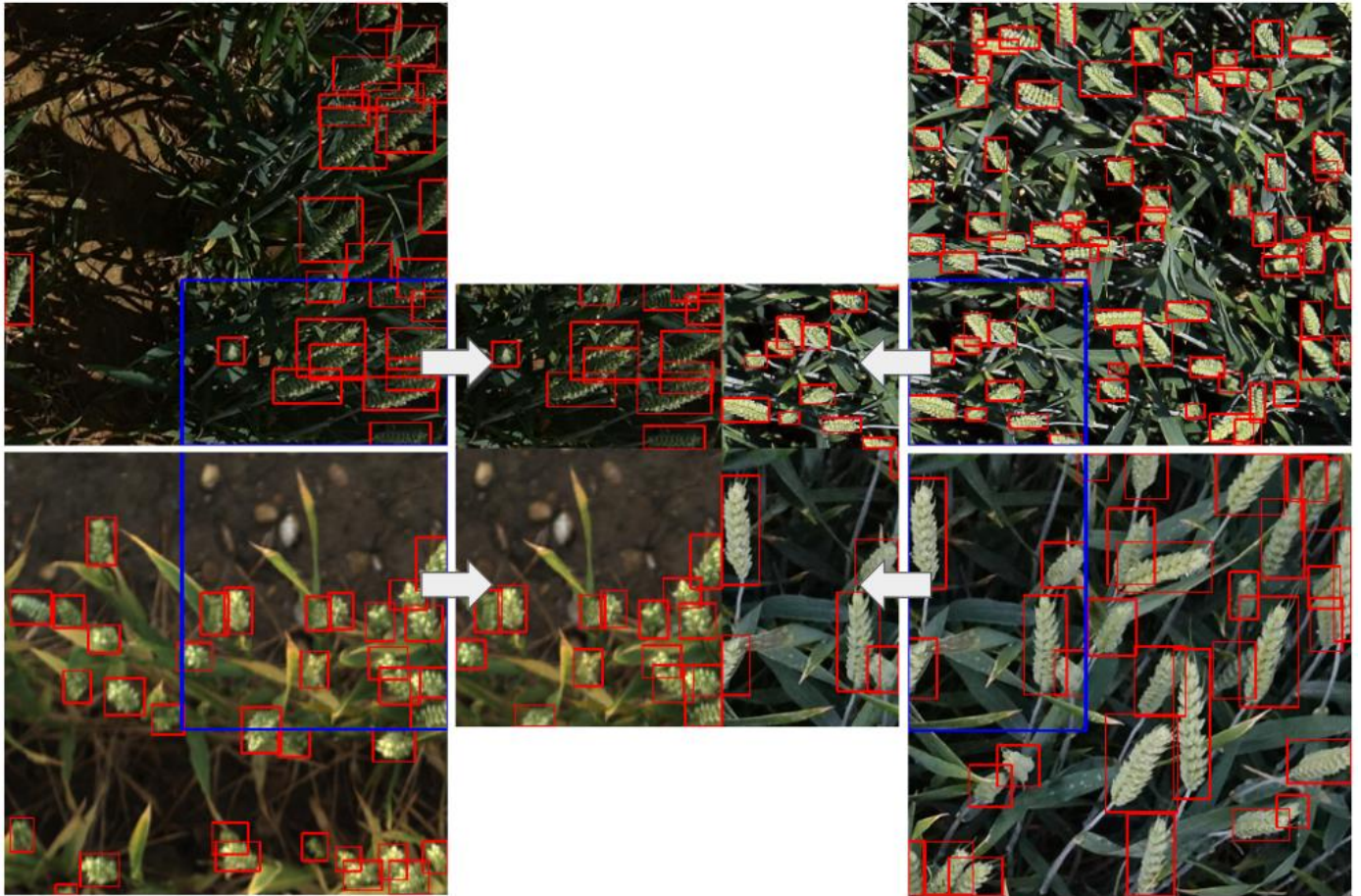
## Object Detection



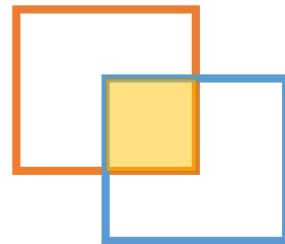
CAT, DOG, DUCK





## Tăng Dữ Liệu

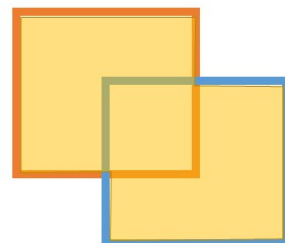


# Đánh giá



$$\textit{Intersection over Union (IoU)} = \frac{\textit{Area of Overlap}}{\textit{Area of Union}}$$

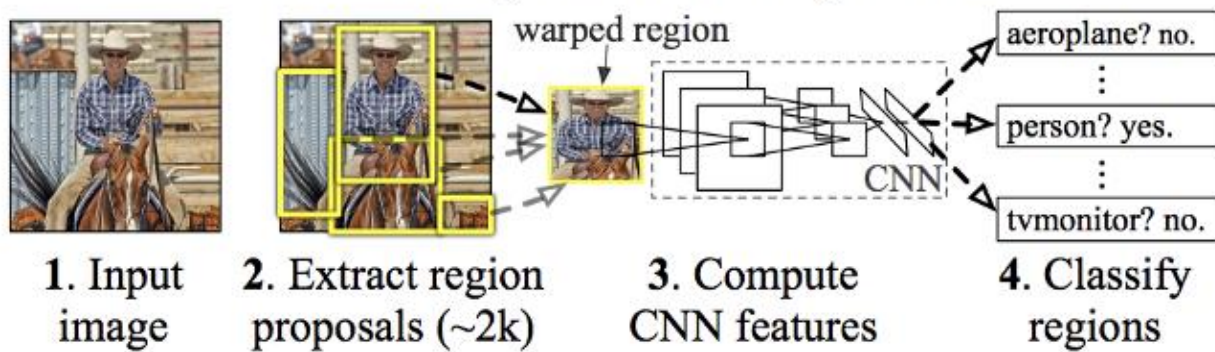
 Prediction  
 Ground-truth



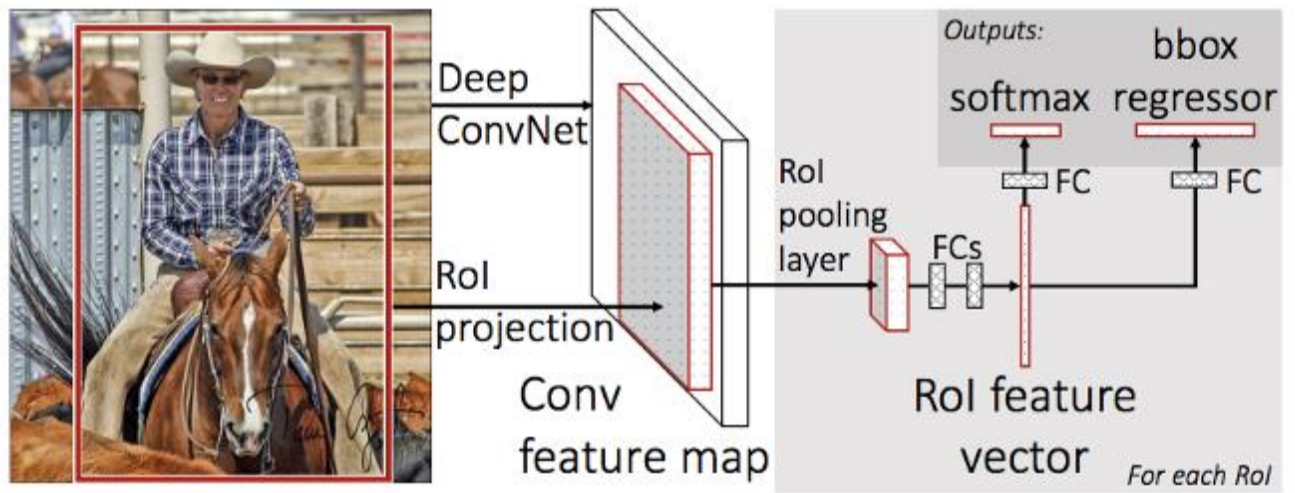
# Các thuật toán cơ bản của Object Detection

# R-CNN

## R-CNN: *Regions with CNN features*

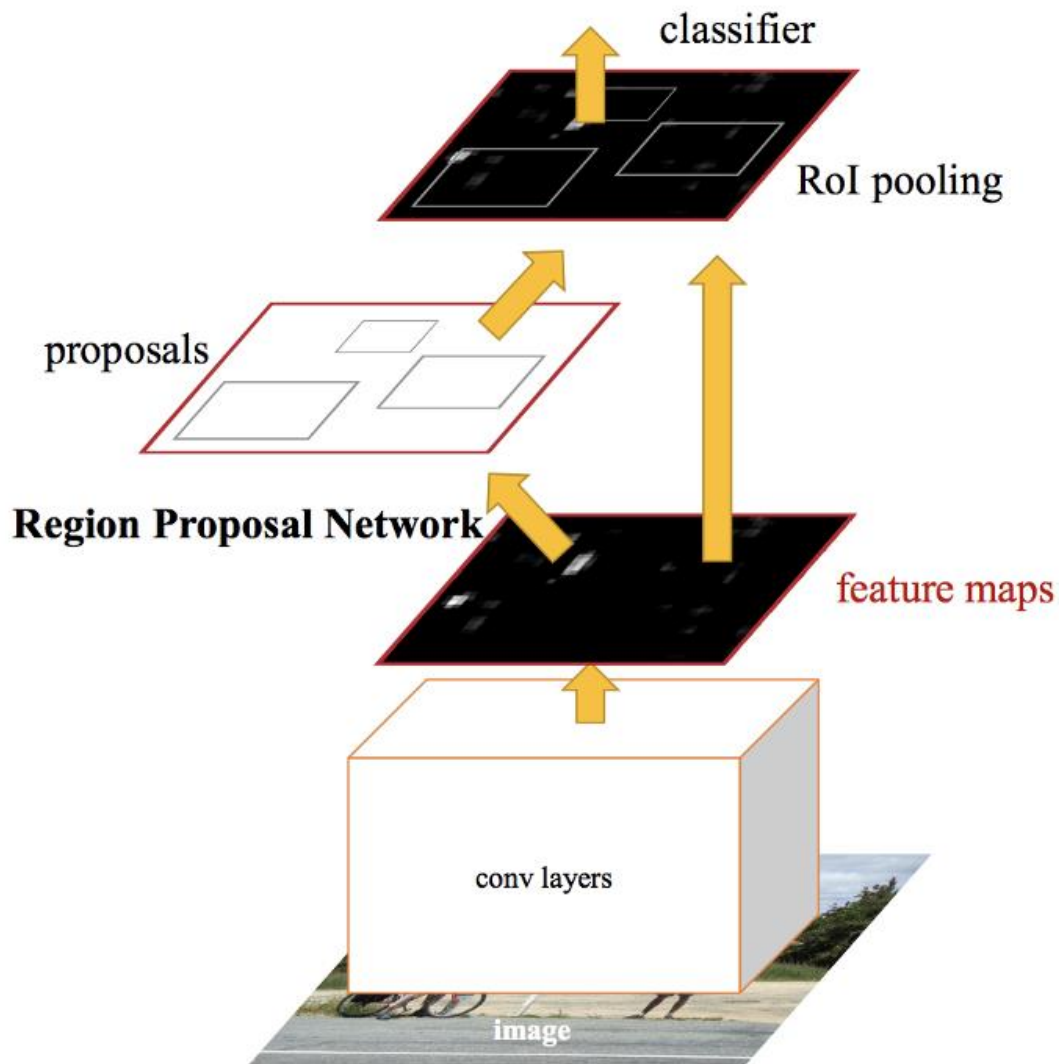


# FAST R-CNN





# Faster R-CNN



Faster R-CNN không dùng thuật toán selective search để lấy ra các region proposal, mà nó thêm một mạng CNN mới gọi là Region Proposal Network (RPN) để tìm các region proposal.

Tại sao không lựa chọn thuật toán YOLO

