Poster Spotlights

Session 2B: Wednesday Morning, June 26th

Discriminative Sub-categorization

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**Discriminative Sub-categorization**

**What the algorithm does:**

- Input:
  - Images of people

- Output:
  - Sub-categorized images

**Properties of the algorithm:**

- Max-margin separation from negative data
- Quadratic objective with linear constraints

**Benefits of the algorithm:**

- Does not suffer from **cluster degeneration**
  - A few clusters claim most data points
- Visually interpretable
- Useful for object detection using DPM of Felzenszwalb et al.

**With sub-categorization vs. Without sub-categorization:**

- Precision and Recall curves
  - With sub-categorization
  - Without sub-categorization