

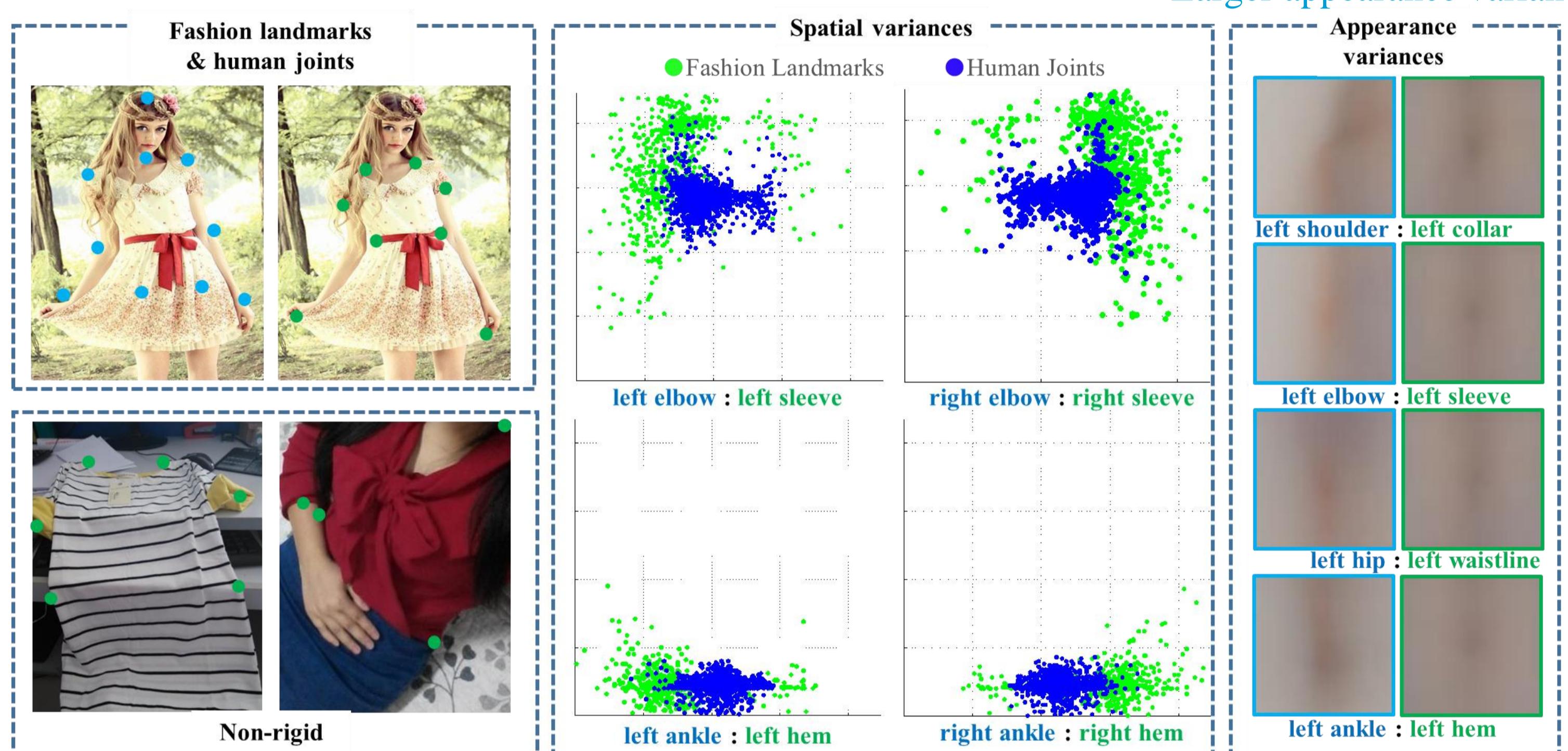
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(* indicates equal contribution)

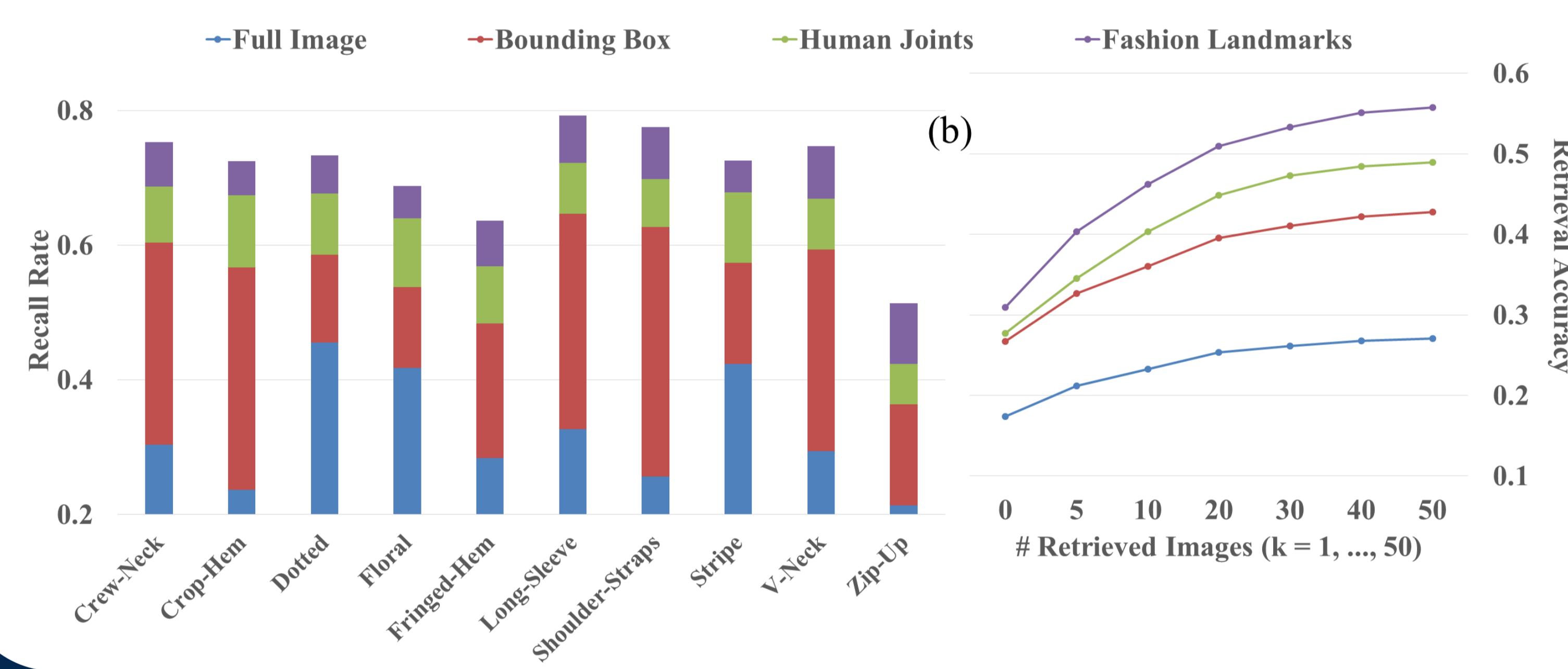
Motivation

Problem:

- How to achieve accurate fashion image understanding?



Fashion Landmark is Discriminative Representation



Dataset



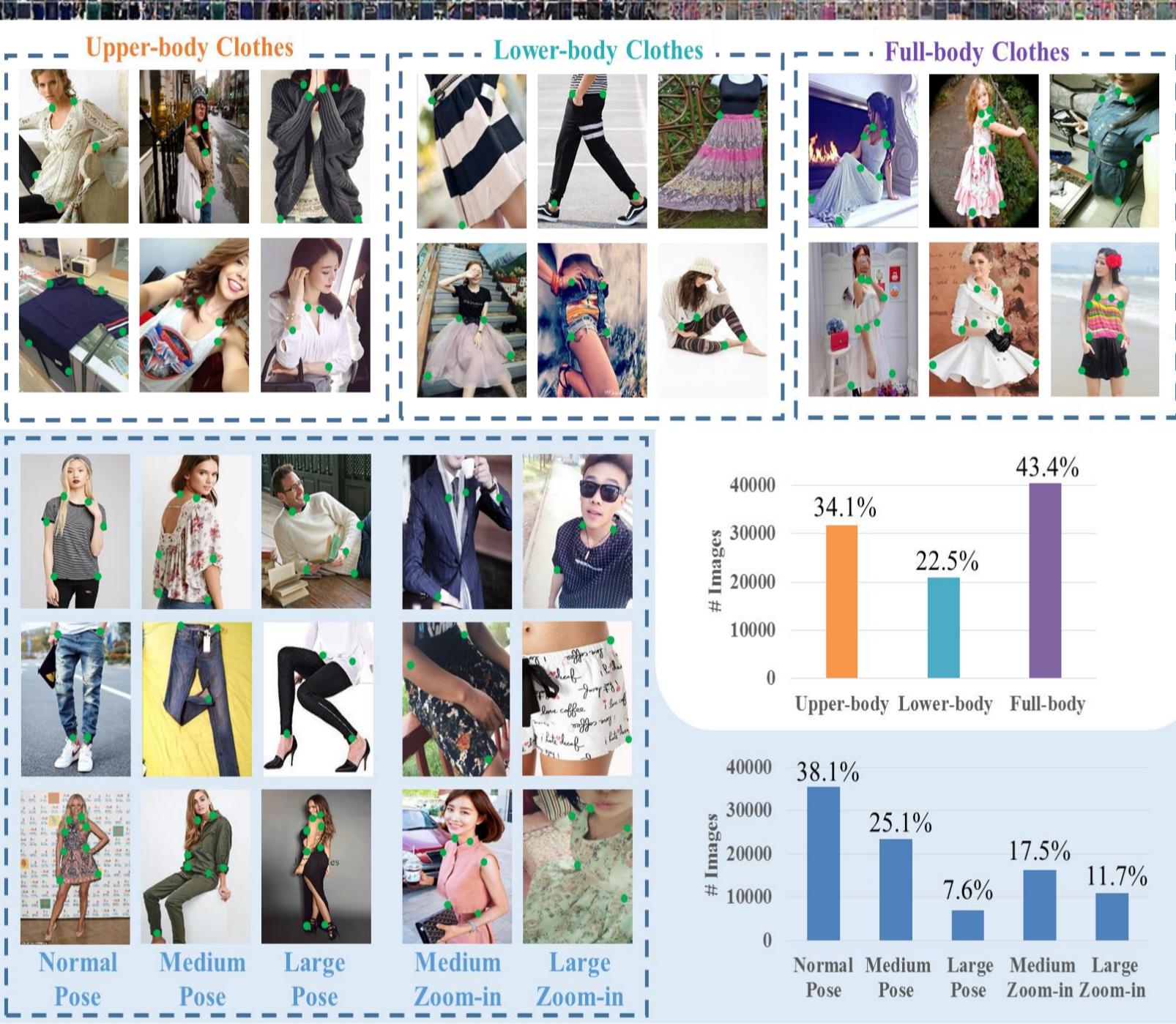
Dataset Available

Four benchmarks are developed using the DeepFashion database, including **Attribute Prediction**, **Consumer-to-shop Clothes Retrieval**, **In-shop Clothes Retrieval**, and **Landmark Detection**.

Fashion Landmark Detection

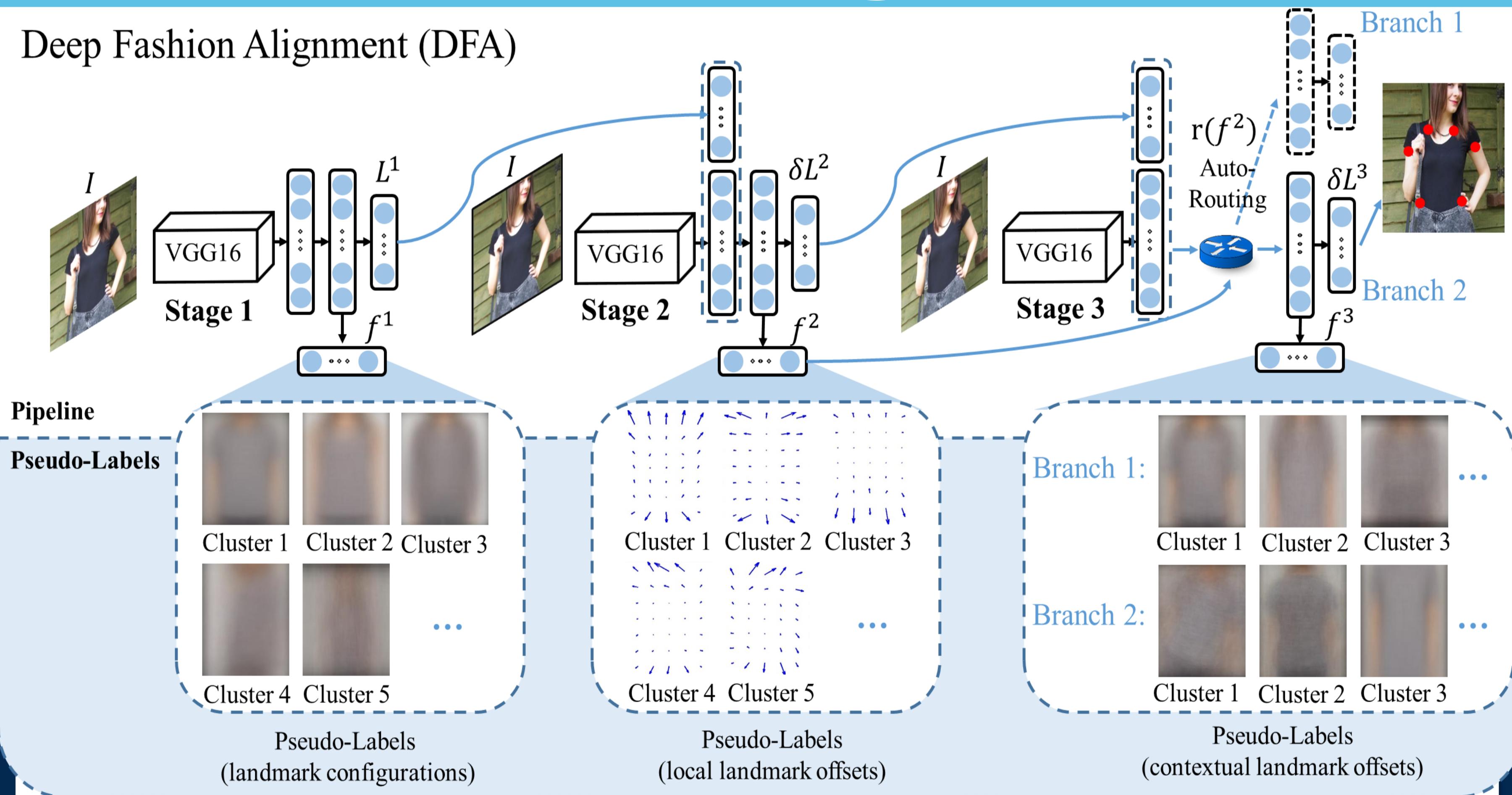
Benchmark evaluates the performance of fashion landmark detection. It contains:

- 123,016 number of clothes images;
- 8 fashion landmarks (both location and visibility) for each image;
- Each image is also annotated by bounding box, clothing type and variation type.

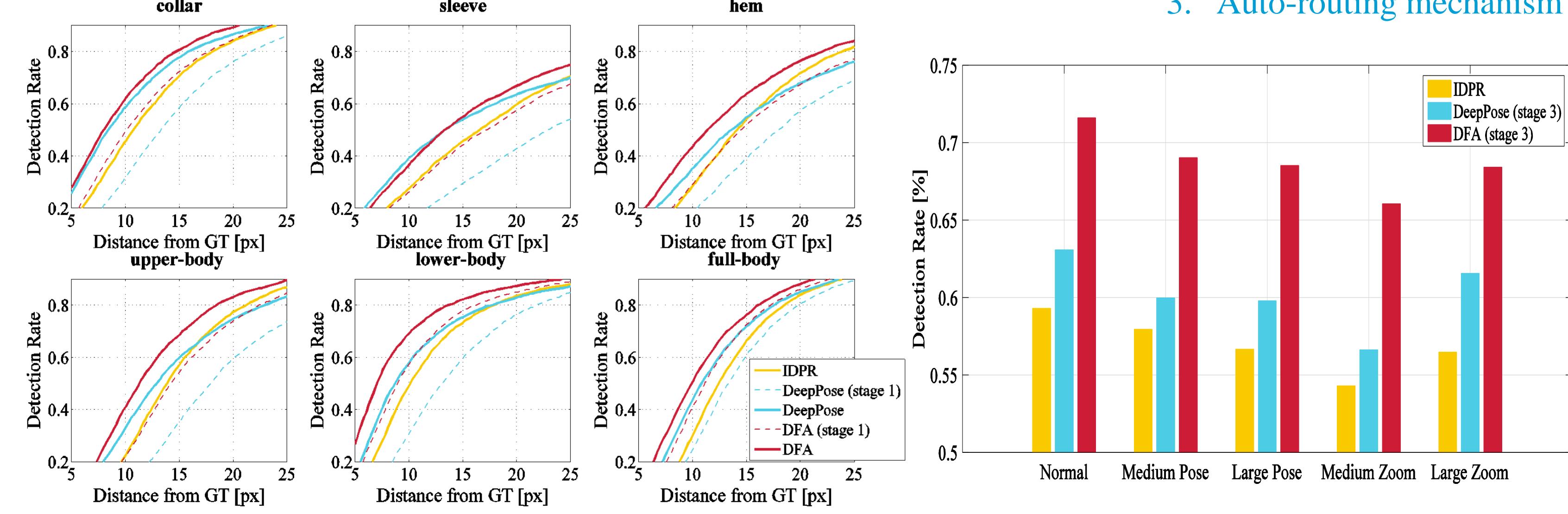


Fashion Alignment

Deep Fashion Alignment (DFA)



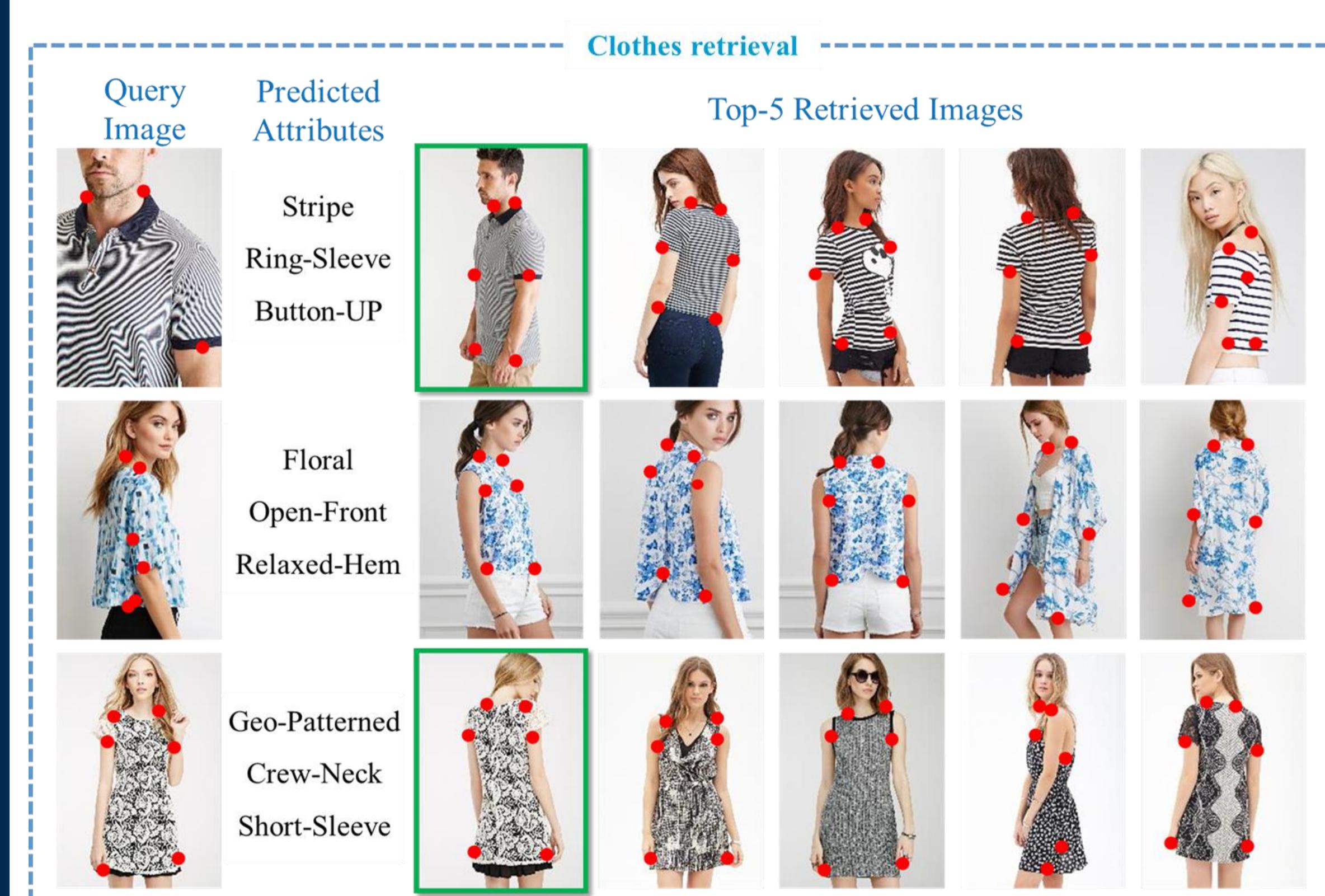
Stage	1	2	3
Component	direct regression + p.-labels	direct regression + p.-labels (offset)	direct regression + two-branch + auto-routing + p.-labels (offset) + p.-labels (c.offset)
Avg. normalized error	.102	.084	.078 .074 .073 .072 .070 .069 .068



Three properties:

- Deep cascade
- Pseudo-labels
- Auto-routing mechanism

Visual Results



DeepFashion dataset is available at

<http://mmlab.ie.cuhk.edu.hk/projects/DeepFashion/LandmarkDetection.html>