# Yan Hong

*Minhang District, Shanghai*
📱 *13262908839*
✉ *yanhong.sjtu@gmail.com*
🖥 *https://www.yanhong.fun*
🌐 *https://github.com/hy-zpg*
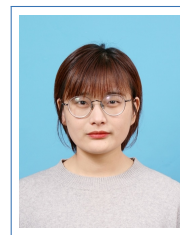
## Education

**2019–Now**    **Ph.D. Computer Science and Technology**, *Shanghai Jiao Tong University*, Shanghai, China.
Majoring in computer vision, advised by Li Niu (*http://bcmi.sjtu.edu.cn/home/niuli/*) in BCMI lab (*http://bcmi.sjtu.edu.cn*).

**2016–2019**    **M.S. Information Engineering**, *Shanghai Jiao Tong University*, Shanghai, China.
Majoring in indoor localization and computer vision, advised by Peilin Liu (*http://bat.sjtu.edu.cn/zh/people-zh/*) in BATC lab (*http://bat.sjtu.edu.cn*).

**2012–2016**    **B.S. Information Engineering**, *Shenzhen University*, Shenzhen, China.
Majoring in electronic information engineering, GPA:3.90/4.0, 4/385.

## Research Experiments

**2020–2021**    **Shadow Generation for Image Composition**, *Generative Models, Image Composition*.
This research project mainly leverages illumination information from background to generate shadow for foreground object in image composition.

**2019–2020**    **Few-shot Image Generation**, *Meta Learning, Generative Adversarial Network*.
This research project (*https://github.com/bcmi/F2GAN-Few-Shot-Image-Generation*) mainly leverages few-shot images to generate new concepts.

**2018–2019**    **Multi-task Learning with Disjoint Datasets**, *Multi-task Learning, Semi-supervised Learning*.
This research project (*https://github.com/bcmi/multi-task-learning*) aims to improve multi-task performance with disjoint datasets as input.

**2017–2018**    **Deep Sentiment Analysis by Combining Facial Expression and Action**, *Multi-task Learning*.
This research project (*https://github.com/hy-zpg/bimodal-sentiment-analysis*) targets at combining facial expression and action to analyze deep sentiment.

**2016–2017**    **Indoor Localization with WiFi Fingerprint**, *Signal Processing, Indoor Localization*.
This research project (*https://github.com/hy-zpg/WIFI-fingerprint-indoor-localization*) mainly focuses on improving WIFI-based indoor localization accuracy with deep belief networks.

## Project Experience

**2020-2021**    **Shadow Generation**, *Computer Vision, Generative models*.

**2019-2020**    **Few-shot Image Generation**, *Computer Vision, Meta Learning, Generative models*.

**2018-2019**    **Micro-emotion Recognition**, *Computer Vision, Multi-task Learning*.

**2017-2018**    **Smart Home**, *Computer Vision, Multi-task Learning*.

**2017-2018**    **Multi-view Object Recognition**, *Computer Vision, Object Detection*.

**2016-2017**    **Indoor Localization**, *Signal Process, Indoor Localization*.

## Publicarions Under Review

**2021**    **Hong, Y., Niu, L., Zhang, J., Liang, J., & Zhang, L. Shadow generation for composite image in real-world scenes.** *arXiv preprint arXiv:2009.08753*, *2021 ICCV*, CCF A Conference, Submited.

**2021**    **Hong, Y., Niu, L., Zhang, J., Liang, J., & Zhang, L. Deltagan: Towards diverse few-shot image generation with sample-specific delta.** *arXiv preprint arXiv:2009.08753*, *2021 TIP*, A Journal, Submited.

## Publications

**2020**    **Hong, Y., Niu, L., Zhang, J., Zhao, W., Fu, C., & Zhang, L. F2gan: Fusing-and-filling gan for few-shot image generation. In** *Proceedings of the 28th acm international conference on multimedia* **(pp. 2535–2543)**, *2020 ACM MM*, CCF A, Published.

**2020**    **Hong, Y., Niu, L., Zhang, J., & Zhang, L. Matchinggan: Matching-based few-shot image generation. In** *2020 ieee international conference on multimedia and expo (icme)* **(pp. 1–6)**, *2020 ICME*, CCF B, Published.

**2020**    **Hong, Y., Niu, L., Zhang, J., & Zhang, L. Beyond without forgetting: Multi-task learning for classification with disjoint datasets. In** *2020 ieee international conference on multimedia and expo (icme)* **(pp. 1–6)**, *2020 ICME*, CCF B, Published.

**2019**    **Multi-task Learning for Emotion and Facial Attributes Recognition**, *Master Thesis*.

**2019**    **Hong, Y., Jiuchao, Q., & Peilin, L. Indoor fingerprint indoor location technology based on deep belief network.** *Information Technology***, 43(4), 139–142**, *2019 Information Technology*, Published.

**2018**    **WiDeep: Learning Featured Fingerprints with DBN framework for Indoor Localization**, *ION GNSS*, SJTU A Conference, Accepted, not Published.

**2017**    **A Novel WIFI Indoor Localization Based on Deep Learning**, *Patent*, Published.

## Teaching Experience

**Spring 2017**    **Digital Circuits**, *Shanghai Jiao Tong University*.

## Academic Services

### Conference Reviewer

- IEEE International Conference on Computer Visionand Pattern Recognition (CVPR)
- The Association for The Advancement of Artificial Intelligence (AAAI)
- International Joint Conference on Artificial Intelligence (IJCAI)
- IEEE International Conference on Computer Vision (ICCV)

## Honors and Awards

- **Graduate National Scholarship**, Shanghai Jiao Tong University, 2019-2020
- **League secretary, Second-class scholarship**, Shanghai Jiao Tong University, 2016-2018
- **Outstanding Graduate Award**, Shenzhen University, 2016
- **Outstanding Bachelor Dissertations/theses** , Shenzhen University, 2016
- **Undergraduate National Scholarship**, Shenzhen University, 2012-2016
- **Primary Scholarship**, Shenzhen University, 2012-2016

## Computer Skills

- **Programming Languages**: C/C++, Python, Matlab, Java
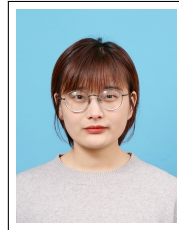- **Libraries::** OpenCV, Tensorflow, Pytorch

上海市，闵行区
📞 手机：13262908839
✉ 邮箱：*yanhong@gmail.com*
🖥 *https://www.yanhong.fun*

# 洪燕

---

## 教育背景

| | |
|---|---|
| 2019/04 – 至今 | **博士学位**，上海交通大学，上海，计算机科学与技术 (研究方向：计算机视觉)。 |
| 2016/09 – 2019/03 | **硕士学位**，上海交通大学，上海，信息与通信工程 (研究方向：室内定位，计算机视觉)。 |
| 2012/09 – 2016/06 | **学士学位**，深圳大学，深圳，电子信息工程 (3.96/4.0, 4/385)。 |

---

## 专业技能

| | |
|---|---|
| 主要技能 | ●学术能力：撰写论文 7 篇；专利 1 项。 |
| | ●编程语言：熟练 Python；熟悉 C/C++, Matlab 等。 |
| | ●深度学习库：熟练 Tensorflow，Pytorch；熟悉 Keras, Caffe 等。 |
| | ●算法：熟练神经网络数学原理与基础应用，数据结构算法，图像处理基本算法，以及深度生成模型等。 |
| 英语水平 | ●英语六级:500, 雅思:6.5 |

---

## 研究经历

| | |
|---|---|
| 2020/11 – 至今 | **阴影生成** |
| | ●简要描述：针对合成图像不真实问题，利用合成图中背景中丰富的光照信息，再利用对抗生成网络模拟创作过程，生成示例相似图片。 |
| | ●职责：项目负责人。总体方案设计；根据背景光照信息为前景物体生成阴影的算法设计；生成对抗网络设计; 撰写 **1 篇论文**。 |
| 2019/03 – 2020/11 | **少示例图片生成** |
| | ● 简要描述：针对少示例样本，利用 meta-learning 从少示例样本中学习关键特征信息，再利用对抗生成网络模拟创作过程，生成示例相似图片。项目代码详见 https://github.com/bcmi/F2GAN-Few-Shot-Image-Generation |
| | ●职责：项目负责人。总体方案设计；meta-learning 算法设计；生成对抗网络设计; 撰写 **3 篇论文**。 |
| 2018/03 – 2019/02 | **异构数据的多任务学习** |
| | ●简要描述：针对异构标签数据集，利用伪标签辅助多任务网络挖掘任务间的相关性。并且从伪标签置信度、分布密度以及异构数据集之间的分布差异对伪标签进行筛选。项目代码详见 https://github.com/bcmi/multi-task-learning |
| | ●职责：项目负责人。总体方案设计；伪标签筛选算法；多任务网络设计；撰写 **1 篇论文**。 |
| 2017/09 – 2018/02 | **2D 视频信息的深层次情感动作识别** |
| | ●简要描述：现有动作识别多考虑全局的动作信息，没有将表情信息融入到动作中来传达深层次情感。我们用 CNN 捕获全局动作与局部表情空间特征 (双流 CNN); 利用 bi-directional LSTM 处理提取的帧图空间特征。项目代码详见 https://github.com/hy-zpg/bimodal-sentiment-analysis |
| | ●职责：项目负责人。系统整体设计，多模态特征融合算法。 |
| 2016/09 – 2017/08 | **深度置信网络的室内 WIFI 定位** |

- 简要描述：室内 WIFI 信号传播易受干扰，传统算法不易建模。研究深度置信网络的数学原理 (DBN)；研究生成性网络 DBN 概率特性；采集 WIFI 数据进行训练 DBN 网络，用径向基函数 (RBF) 计算 WIFI 数据重构的概率来进行定位。项目代码详见 https://github.com/hy-zpg/WIFI-fingerprint-indoor-localization
- 职责：项目负责人。模型设计；定位算法设计；建立对应测试数据集。撰写 **2 篇论文**,**1 篇专利**。

---
## 项目经历

多视角目标检测   ● 利用 Yolov3 目标检测框架提取候选物体特征，通过 metric distance 来测量候选物体与目标物体的特征距离，通过编码的特征距离匹配目标物体。

微表情识别   ●上海地铁吉祥物畅畅机器人，对来访的领导进行识别并完成微笑、调皮等系列表情动作。我们需要利用摄像头捕获的视频信息进行准确的目标 VIP 识别，并指导机器人完成表情变化。

---
## 科研成果

2021   **Shadow Generation for Composite Image in Real-world Scenes**，*ICCV*，A 会，在投。

2021   **DeltaGAN: Towards Diverse Few-shot Image Generation with Sample-Specific Delta**，*TIP*，A 刊，在投。

2020   **F2GAN: Fusing-and-Filling GAN for Few-shot Image Generation**，*ACM MM*，A 会，发表。

2020   **Matchinggan: Matching-Based Few-Shot Image Generation**，*ICME Oral*，B 会，发表。

2020   **Beyond without Forgetting: Multi-Task Learning for Classification with Disjoint Datasets**，*ICME*，B 会，发表。

2019   **基于多任务学习的表情及人脸属性识别技术研究**，硕士论文。

2019   **基于深度置信网络的室内指纹定位技术**，信息技术，已发表。

2018   **WiDeep: Learning Featured Fingerprints with DBN framework for Indoor Localization**，*ION GNSS*，A 会，录用未发表。

2017   **一种基于深度学习的 WiFi 室内定位系统**，专利，已公开。

---
## 学术服务

2021   **International Joint Conference on Artificial Intelligence (IJCAI)**，*Reviewer*。

2021   **IEEE International Conference on Computer Vision (ICCV)**，*Reviewer*。

2020   **IEEE International Conference on Computer Visionand Pattern Recognition (CVPR)**，*Reviewer*。

2020   **The Association for The Advancement of Artificial Intelligence (AAAI)**，*Reviewer*。

---
## 所获奖励

2020   **博士国家奖学金**，上海交通大学。

2016 – 2019   **优秀学生干部、一等奖学金**，上海交通大学。

2016   **校优秀毕业生**，深圳大学。

2013 – 2016   **国家奖学金、国家励志奖学金、学业特等奖、优秀班级干部**，深圳大学。

2012   **新生奖学金**，深圳大学。