

DeepLearning/CNN

Resnets:

An Overview of ResNet and its Variants <https://towardsdatascience.com/an-overview-of-resnet-and-its-variants-5281e2f56035>

Why ResNets Work <https://www.coursera.org/lecture/convolutional-neural-networks/why-resnets-work-XAKNO>

<https://medium.com/@14prakash/understanding-and-implementing-architectures-of-resnet-and-resnext-for-state-of-the-art-image-cf51669e1624>

<https://blog.waya.ai/deep-residual-learning-9610bb62c355>

<http://people.idsia.ch/~juergen/microsoft-wins-imagenet-through-feedforward-LSTM-without-gates.html>
<http://people.idsia.ch/~juergen/fundamentaldeeplearningproblem.html>

Training Very Deep Networks <https://arxiv.org/pdf/1507.06228v2.pdf>

The Power of Depth for Feedforward Neural Networks <https://arxiv.org/pdf/1512.03965.pdf?platform=hootsuite>

Deep Learning in Computer Vision <https://www.coursera.org/learn/deep-learning-in-computer-vision#syllabus>

Methods for Interpreting and Understanding Deep Neural Networks <https://arxiv.org/pdf/1706.07979.pdf>
Attention:

Show attend and tell : <https://arxiv.org/pdf/1502.03044v3.pdf>

Attention is all you need : <https://arxiv.org/pdf/1706.03762.pdf>

<http://mlexplained.com/2017/12/29/attention-is-all-you-need-explained/>

Image Transformer : <https://openreview.net/forum?id=r16Vyf-0->

NEURAL MACHINE TRANSLATION by jointly learning to align and translate
<https://arxiv.org/pdf/1409.0473.pdf>

Understanding Deep learning:

Toward theoretical understanding of deep learning - Sanjeev Arora

<http://unsupervised.cs.princeton.edu/deeplearningtutorial.html>

<https://www.dropbox.com/s/qonozmne0x4x2r3/deepsurveyICML18final.pptx?dl=0#>

CNNs: <http://cs231n.github.io/convolutional-networks/#conv>

An Intuitive Introduction to the Hessian for Deep Learning Practitioners

<http://mlexplained.com/2018/02/02/an-introduction-to-second-order-optimization-for-deep-learning-practitioners-basic-math-for-deep-learning-part-1/>

ML insight papers

https://docs.google.com/document/d/1SnJe07u0oESoAT2BPdj_0t6xaIRYmk0RN0DlrHygMEo/edit#heading=h.9ltppwttl8z7

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