Bibliography

[1] Albawi, Saad, Mohammed, Tareq Abed, and Al-Zawi, Saad. "Understanding of a convolutional neural network". In: *2017 International Conference on Engineering and Technology (ICET)*. 2017, pp. 1–6. DOI: 10.1109/ICEngTechnol.2017.8308186.

[2] Alom, Md Zahangir, Taha, Tarek M., Yakopcic, Christopher, Westberg, Stefan, Sidike, Paheding, Nasrin, Mst Shamima, Esesn, Brian C Van, Awwal, Abdul A S., and Asari, Vijayan K. *The History Began from AlexNet: A Comprehensive Survey on Deep Learning Approaches*. 2018. arXiv: 1803.01164 [cs.CV].

[3] Berezsky, O., Pitsun, O., Verbovyy, S., Datsko, T., and Bodnar, A. "Computer diagnostic tools based on biomedical image analysis". In: *2017 14th International Conference The Experience of Designing and Application of CAD Systems in Microelectronics (CADSM)*. 2017, pp. 388–391. DOI: 10.1109/CADSM.2017.7916157.

[4] DeSantis, Carol, Ma, Jiemin, Bryan, Leah, and Jemal, Ahmedin. "Breast cancer statistics, 2013". In: *CA: A Cancer Journal for Clinicians* 64.1 (Oct. 2013), pp. 52–62. DOI: 10.3322/caac.21203. URL: https://doi.org/10.3322/caac.21203.

[5] DeVries,
Terrance and Taylor, Graham W. "Improved Regularization of Convolutional Neural Networks with Cutout". In: *arXiv preprint arXiv:1708.04552* (2017).

[6] Doi, Kunio. "Computer-aided diagnosis in medical imaging: Historical review, current status and future potential". In: *Computerized Medical Imaging and Graphics* 31.4-5 (June 2007), pp. 198–211. DOI: 10.1016/j.compmedimag.2007.02.002. URL: https://doi.org/10.1016/j.compmedimag.2007.02.002.

[7] Goodfellow, Ian, Bengio, Yoshua, and Courville, Aaron. *Deep Learning*. http://www.deeplearningbook.org. MIT Press, 2016.

[8] Huang, Jin and Ling, C.X. "Using AUC and accuracy in evaluating learning algorithms". In: *IEEE Transactions on Knowledge and Data Engineering* 17.3 (2005), pp. 299–310. DOI: 10.1109/TKDE.2005.50.

[9] Hussain, Zeshan, Gimenez, Francisco, Yi, Darvin, and Rubin, Daniel. "Differential Data Augmentation Techniques for Medical Imaging Classification Tasks". In: *AMIA ... Annual Symposium proceedings. AMIA Symposium* 2017 (Apr. 2018), pp. 979–984.

[10] James, Gareth, Witten, Daniela, Hastie, Trevor, and Tibshirani, Robert. *An Introduction to Statistical Learning: With Applications in R*. Springer Publishing Company, Incorporated, 2014. ISBN: 1461471370.

[11] Khan, S., Rahmani, H., Shah, S. A. A., Bennamoun, M., Medioni, G., and Dickinson, S. 2018. DOI: 10.2200/S00822ED1V01Y201712COV015.

[12] Komura, Daisuke and Ishikawa, Shumpei. "Machine Learning Methods for Histopathological Image Analysis". In: *Computational and Structural Biotechnology Journal* 16 (2018), pp. 34–42. ISSN: 2001-0370. DOI: https://doi.org/10.1016/j.csbj.2018.01.001. URL: https://www.sciencedirect.com/science/article/pii/S2001037017300867.

[13] Krizhevsky, Alex, Sutskever, Ilya, and Hinton, Geoffrey E. "ImageNet Classification with Deep Convolutional Neural Networks". In: *Advances in Neural Information Processing Systems*. Ed. by F. Pereira, C. J. C. Burges, L. Bottou, and K. Q. Weinberger. Vol. 25. Curran Associates, Inc., 2012. URL: https://proceedings.neurips.cc/paper/2012/file/c399862d3b9d6b76c8436e924a68c45b-Paper.pdf.

[14] LeCun, Yann, Bengio, Yoshua, and Hinton, Geoffrey. "Deep learning". In: *Nature* 521.7553 (May 2015), pp. 436–444. DOI: 10.1038/nature14539. URL: https://doi.org/10.1038/nature14539.

[15] Luo, Wenjie, Li, Yujia, Urtasun, Raquel, and Zemel, Richard S. "Understanding the Effective Receptive Field in Deep Convolutional Neural Networks". In: *CoRR* abs/1701.04128 (2017). arXiv: 1701.04128. URL: http://arxiv.org/abs/1701.04128.

[16] Martins, Andre and Astudillo, Ramon. “From Softmax to Sparsemax: A Sparse Model of Attention and Multi-Label Classification”. In: *Proceedings of The 33rd International Conference on Machine Learning*. Ed. by Maria Florina Balcan and Kilian Q. Weinberger. Vol. 48. Proceedings of Machine Learning Research. New York, New York, USA: PMLR, 20–22 Jun 2016, pp. 1614–1623. URL: http://proceedings.mlr.press/v48/martins16.html.

[17] O’Shea, Keiron and Nash, Ryan. *An Introduction to Convolutional Neural Networks*. 2015. arXiv: 1511.08458 [cs.NE].

[18] Rangayyan, Rangaraj M. *Biomedical image analysis*. CRC press, 2004.

[19] Scully, Olivia Jane, Bay, Boon-Huat, Yip, George, and Yu, Yingnan. “Breast Cancer Metastasis”. In: *Cancer Genomics & Proteomics* 9.5 (2012), pp. 311–320. ISSN: 1109-6535. eprint: https://cgp.iiarjournals.org/content/9/5/311.full.pdf. URL: https://cgp.iiarjournals.org/content/9/5/311.

[20] Shorten, Connor and Khoshgoftaar, Taghi M. “A survey on Image Data Augmentation for Deep Learning”. In: *Journal of Big Data* 6.1 (2019), p. 60. DOI: 10.1186/s40537-019-0197-0. URL: https://doi.org/10.1186/s40537-019-0197-0.

[21] Simonyan, Karen and Zisserman, Andrew. *Very Deep Convolutional Networks for Large-Scale Image Recognition*. 2015. arXiv: 1409.1556 [cs.CV].

[22] Spanhol, Fabio Alexandre, Oliveira, Luiz S., Petitjean, Caroline, and Heutte, Laurent. “Breast cancer histopathological image classification using Convolutional Neural Networks”. In: *2016 International Joint Conference on Neural Networks (IJCNN)*. 2016, pp. 2560–2567. DOI: 10.1109/IJCNN.2016.7727519.

[23] Tao, ZiQi, Shi, Aimin, Lu, Cuntao, Song, Tao, Zhang, Zhengguo, and Zhao, Jing. “Breast Cancer: Epidemiology and Etiology”. In: *Cell Biochemistry and Biophysics* 72.2 (Dec. 2014), pp. 333–338. DOI: 10.1007/s12013-014-0459-6. URL: https://doi.org/10.1007/s12013-014-0459-6.

[24] Ting, Fung Fung, Tan, Yen Jun, and Sim, Kok Swee. “Convolutional neural network improvement for breast cancer classification”. In: *Expert Systems with Applications* 120 (Apr. 2019), pp. 103–115. DOI: 10.1016/j.eswa.2018.11.008. URL: https://doi.org/10.1016/j.eswa.2018.11.008.

[25] Veeling, Bastiaan S., Linmans, Jasper, Winkens, Jim, Cohen, Taco, and Welling, Max. *Rotation Equivariant CNNs for Digital Pathology*. 2018. arXiv: 1806.03962 [cs.CV].

[26] Weiler, Maurice, Hamprecht, Fred A., and Storath, Martin. *Learning Steerable Filters for Rotation Equivariant CNNs*. 2018. arXiv: 1711.07289 [cs.LG].

[27] Weng, Cheng G and Poon, Josiah. "A new evaluation measure for imbalanced datasets". In: *Proceedings of the 7th Australasian Data Mining Conference-Volume 87*. 2008, pp. 27–32.

[28] Zhou, Zongwei, Shin, Jae, Zhang, Lei, Gurudu, Suryakanth, Gotway, Michael, and Liang, Jianming. "Fine-Tuning Convolutional Neural Networks for Biomedical Image Analysis: Actively and Incrementally". In: *Proceedings of the IEEE Conference on Computer Vision and Pattern Recognition (CVPR)*. July 2017.