

Deep Learning

No. _____

Date: _____



RAG: Retrieval Augmented Generation



ML = Nguli utu bersih data



DL = utu bbrp case, ga perlu bersih, karena bbrp udah ada



~~fitur~~ filter preprocess.



Semakin banyak data, pake DL lebih bagus.



XOR problem



Deep Learning (ian gdfellow)



$$2x + 1$$

$$ax^2 + ax + 1 -$$



$$ax^2 + ax + 2 - 3(2x + 1)$$



$$ax^2 + ax + 2 - 6x - 3 + 1$$



$$ax^2 - 2x$$



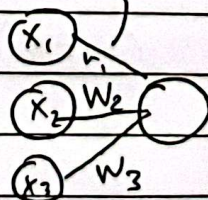
$$x^2 - 3x + 5$$



$$2x$$



$$f = wx + b$$



Activation function = ReLU, Sigmoid, GELU



Menilai kinerja ~~model~~ prediksi model = Loss Function.



Backpropagation = Betulin weight & bias tiap neuron (mundur)



<input type="checkbox"/>	Epoch = Satu epoch adalah ketika seluruh dataset telah
<input type="checkbox"/>	melewat Neural Network satu kali penuh
<input type="checkbox"/>	(satu iterasi)
<input type="checkbox"/>	
<input type="checkbox"/>	Learning rate : Parameter utk mengatur sbg cepat model dlm memahami
<input type="checkbox"/>	data selama proses training .
<input type="checkbox"/>	
<input type="checkbox"/>	data train, validation test .
<input type="checkbox"/>	
<input type="checkbox"/>	Overfitting = terlalu kompleks
<input type="checkbox"/>	Underfitting = terlalu sederhana .
<input type="checkbox"/>	
<input type="checkbox"/>	DL → time series
<input type="checkbox"/>	→ NLP (Natural language processing)
<input type="checkbox"/>	→ CV (Computer Vision)
<input type="checkbox"/>	
<input type="checkbox"/>	Sentence segmentation = teks panjang → kalimat individu
<input type="checkbox"/>	Word Tokenization = Membagi kalimat jadi kata-kata
<input type="checkbox"/>	stemming = mangkas kata (berlari → lari)
<input type="checkbox"/>	lemmatization = $V3 \rightarrow V1$
<input type="checkbox"/>	Stop Words = kata ² yg ga berarti, dihapus (a, the)
<input type="checkbox"/>	Dependency Parsing
<input type="checkbox"/>	Pos Tagging
<input type="checkbox"/>	Named Entity Recognition (NER)
<input type="checkbox"/>	Chunking .
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