

Data Generation

tokenizer = Tokenizer (num_words = 100)

tokenizer.fit_on_texts (titles + bodies)

title_sequences = tokenizer.

texts_to_sequences
↑ (titles)

Assigned tokens to
sentences

title_data = pad_sequences
↑ makes the length of
two sentence equal
(title_sequences, ~~maxlen~~
maxlen = 5)

↑ max number of 0 to add
pad_sequences will add
0 to 5 ~~letter~~ word sentences
 $5(\text{words}) + 0 = 6$

One hot encoding

↓
encodes data in binary

Highlight 1 (Abhijeet)

Microsoft acquires Neon

{ Activation layers to be
done next time }

Sequential layer:-

When not to use:-

- 1) Multiple I/O (Eg concatenating embedding)
- 2) Layer with multi I/O
- 3) Layer Sharing
- 4) Special Case
(Residual connection)

Feature extraction :-

Makes IP

Extracting and storing features of 1st layer.

If residual network then the output of 1st layer added to last layer.

Hugging face - can get pre built models and datasets

Transfer learning - fine tune

pre-trained models
freeze base model weights and add your own.

Highlight - 2

Cognify reprogramming prisoners mind - ???
↑ broh

Subclassing:-

Variational Auto-Encoder:- (VAE)

Can include custom meth.

\bar{z} - mean - Central value in data

\bar{z} - log - var - data towards left or right
data distribution towards left or right
and by how much.

Sampling

- A Introduces noise to data

$\bar{z} - \text{mean} + \text{ops. exp}(0.5 * \bar{z} - \text{log} - \text{var}) * \text{epilson}$

Encoder

- Uses Gaussian distribution

latent vector for certain message

error solving - of source code
seed generator

Decoder

makes image back into similar
image similar to original
Keeps main feature intact.

Highlight - 3

google invests in AI-chip