

Dictionary

What is a list? ['tapir', 'ferret', 'alligator']

- Sequence of items
- Different point of view:

0 \mapsto 'tapir'

1 \mapsto 'ferret'

2 \mapsto 'alligator'

"mapping" from indices
to values.

Dictionary lets us use arbitrary indices/'keys'
+ associate values to them

e.g.

'A23' \mapsto 'tapir'

'B9' \mapsto 'ferret'

'Z12' \mapsto 'alligator'

'Q' \mapsto 'tapir'

- Only one value per key.
- But multiple keys can be associated w/ same value.
- Can only look up a value by key, not vice versa.

Frequency count function:

'APPLE' \longrightarrow [1, 0, 0, 0, 1, 0, ...]

Quynh!

Better:

'APPLE!' \longrightarrow {'A': 1, 'P': 2, 'L': 1, 'E': 1,
 '!': 1}