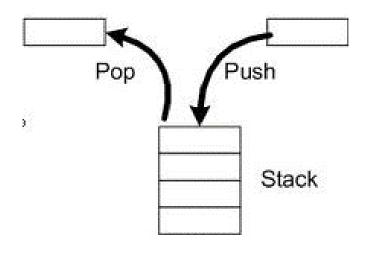
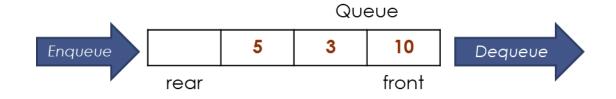
# Part1

Linear Structure vs Non-linear Structure

## Linear Structure



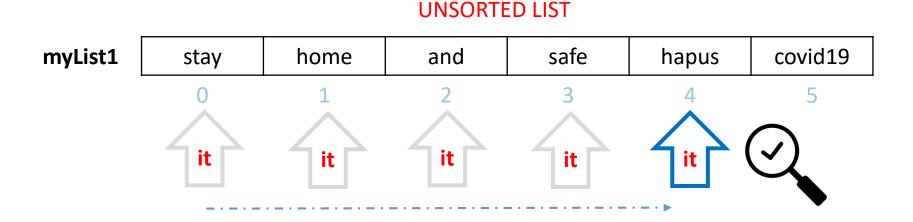


#### myList

11	99	0	55	5	14	89	23	7	1	10
0	1	2	3	4	5	6	7	8	9	10

searching for a certain text will take a <u>linear time</u>.

input sentences: "stay home and safe. hapus covid19"



Search: "hapus", "distancing" from myList1

searching for a certain text will take a <u>linear time</u>.

input sentences: "stay home and safe. hapus covid19"

# myList1 stay home and safe hapus covid19 O 1 2 3 4 5 III III III III III X

**UNSORTED LIST** 

Search: "Hapus", "distancing" from myList1

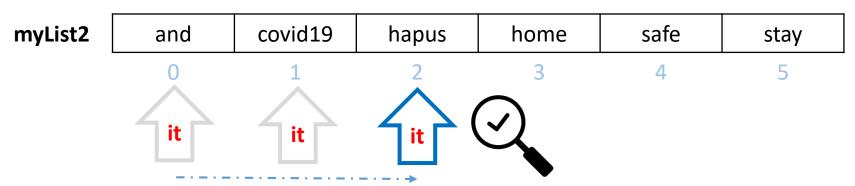
searching for a certain text will take a <u>linear time</u>.

input sentences: "stay home and safe. hapus covid19"

#### **UNSORTED LIST**

myList1	stay	home	and	safe	hapus	covid19
	0	1	2	3	4	5

#### SORTED LIST



• Search: "hapus", "distancing" from myList1, myList2

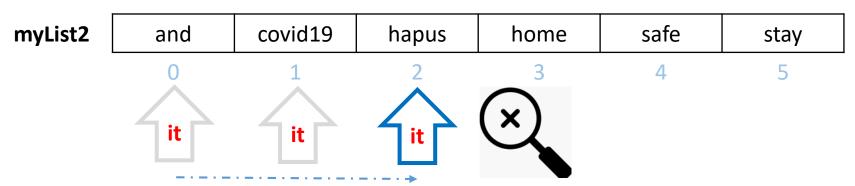
• searching for a certain text will take a <u>linear time</u>.

input sentences: "stay home and safe. hapus covid19"

#### **UNSORTED LIST**

myList1	stay	home	and	safe	hapus	covid19
	0	1	2	3	4	5

#### SORTED LIST



• Search: "hapus", "distancing" from myList1, myList2

# Binary Search Tree: Non-Linear Structure

- Binary Search Tree Improve searching time from Linear Structure
  - reduce half of the searching time.

What is Binary Search Tree????