**LINKED LIST**

* List of elements or nodes are linked with each other.

**ArrayList vs LinkedList**

|  |  |
| --- | --- |
| In ArrayList we have dynamic array. If we want to add new element and your dynamic array memory is full then new dynamic array will be created and copy all the elements of previous array in new dynamic array.  If we want to add any number in middle of the array, then that time time complexity is O(n) in insert operation.  Search time complexity is O (1). | LinkedList mai memory non-contiguous allocate hoti hai different parts ko jor kar hamara linkedList banta hai.  In LinkedList time complexity is 0(1) in insert operation. Q k agar humay koe value insert karni hai middle mai hum 1 node insert kar k us ko pervious or next sai attach kardengay yaha constant operation hoga jabhi time complexity 0(1) hogi.  Search time complexity is O (n). |

The structure of linkedList is non-contiguous.

For example, if we consider heap memory.

Null