Given a linked list consisting of **L** nodes and given a number **N**. The task is to find the **N**th node from the end of the linked list.

**Example 1:**

**Input:**

N = 2

LinkedList: 1->2->3->4->5->6->7->8->9

**Output:** 8

**Explanation:** In the first example, there

are 9 nodes in linked list and we need

to find 2nd node from end. 2nd node

from end is 8.

**Example 2:**

**Input:**

N = 5

LinkedList: 10->5->100->5

**Output:** -1

**Explanation:** In the second example, there

are 4 nodes in the linked list and we

need to find 5th from the end. Since 'n'

is more than the number of nodes in the

linked list, the output is -1.

**Expected Time Complexity:**O(N).  
**Expected Auxiliary Space:**O(1).

**Constraints:**  
1 <= L <= 106  
1 <= N <= 106

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**Topic Tags**

[**Linked List**](https://practice.geeksforgeeks.org/explore/?category%5b%5d=Linked%20List)[**Data Structures**](https://practice.geeksforgeeks.org/explore/?category%5b%5d=Data%20Structures)

import java.util.\*;

class Node

{

int data;

Node next;

Node(int d)

{

data = d;

next = null;

}

}

public class LinkedList\_Element\_From\_Last

{

Node head;

Node tail;

/\* Function to print linked list \*/

void printList(Node head)

{

Node temp = head;

while (temp != null)

{

System.out.print(temp.data+" ");

temp = temp.next;

}

System.out.println();

}

/\* Inserts a new Node at front of the list. \*/

public void addToTheLast(Node node)

{

if (head == null)

{

head = node;

tail = node;

} else

{

tail.next = node;

tail = node;

}

}

/\* Drier program to test above functions \*/

public static void main(String args[])

{

Scanner sc = new Scanner(System.in);

int t=sc.nextInt();

while(t>0)

{

int n = sc.nextInt();

int k = sc.nextInt();

LinkedList\_Element\_From\_Last llist = new LinkedList\_Element\_From\_Last();

//int n=Integer.parseInt(br.readLine());

int a1=sc.nextInt();

Node head= new Node(a1);

llist.addToTheLast(head);

for (int i = 1; i < n; i++)

{

int a = sc.nextInt();

llist.addToTheLast(new Node(a));

}

//System.out.println(llist.head.data);

CodingMaxima g = new CodingMaxima ();

//System.out.println(k);

System.out.println(g.getNthFromLast(llist.head,k));

t--;

}

}

}

// } Driver Code Ends

// Structure of node

class CodingMaxima

{

//Function to find the data of nth node from the end of a linked list.

int getNthFromLast(Node head, int n)

{

// Your code here

Node temp=head;

int len=0;

while (temp != null) {

len++;

temp = temp.next;

}

temp=head;

if (len<n)

return -1;

for(int i=1;i<len-n+1;i++)

temp=temp.next;

return temp.data;

}

}