

Program to perform dictionary operation ~~or~~ using Hashing.

initialise table size to some constant

create a structure HashNode to declare key K and value V .

create class Hashmap. \rightarrow

create a hashtable in constructor & initialize it to NULL.

create Hashfunc (int K)
{

returns $K \% \text{table size}$

}

insert (int K , int V) // insert value V at
{ key K .

$h = \text{Hashfunc}(K);$

loop until $\text{table}[h]$ is NULL or
 $\text{table}[h] \rightarrow K$ is K .

$h = \text{Hashfunc}(h+1);$

}

if $\text{table}[h]$ is not equal to NULL
delete it

& create a new entry as

$\text{table}[h] = \text{new HashNode}(K, V)$.


```

int searchkey (int k) // searching key k.
{
    get hash value by calling
    hash function on k = h.

    loop until table[h] is NULL or table[h] == k
    = key & update h.
    h = Hashfun(h+1) .

    if table[h] == NULL
        returns -1 // not found
    else
        returns value i.e table[h] → v
}

```

```

void deletekey (int k)
{
    get the value & loop you encounter
    table[h] as NULL or table[h] == key.
    if table[h] == k
        break;
    else
        update h = Hashfun(h+1)

    if table[h] == NULL
        // no element found at key.
    else
        delete table[h]
}

```

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