

### Practical 3

#### CRUD Operations in MongoDB

##### 1. Create Database and Collection.

```
test> use userdb;
switched to db userdb
userdb> db.createCollection("prac3")
{ ok: 1 }
```

##### 2. Insert one data into the collection.

```
userdb> db.prac3.insertOne({name: "Sushmita", Age : 21 })
{
  acknowledged: true,
  insertedId: ObjectId('6780f02d273fea177c228fb5')
}
```

##### 3. Insert Many data into the collection.

```
userdb> db.prac3.insertMany([{name: "Firdaus", Age : 22 }, {name : "Shriyanshi", Age : 20}, {name : "Malika", Age : 28}])
{
  acknowledged: true,
  insertedIds: {
    '0': ObjectId('6780f133273fea177c228fb6'),
    '1': ObjectId('6780f133273fea177c228fb7'),
    '2': ObjectId('6780f133273fea177c228fb8')
  }
}
```

##### 4. Retrieve data from collection.

```
userdb> db.prac3.find()
[
  {
    _id: ObjectId('6780f02d273fea177c228fb5'),
    name: 'Sushmita',
    Age: 21
  },
  {
    _id: ObjectId('6780f133273fea177c228fb6'),
    name: 'Firdaus',
    Age: 22
  },
  {
    _id: ObjectId('6780f133273fea177c228fb7'),
    name: 'Shriyanshi',
    Age: 20
  },
  {
    _id: ObjectId('6780f133273fea177c228fb8'),
    name: 'Malika',
    Age: 28
  }
]
```

##### 5. Print name of student having age greater than 25

```
userdb> db.prac3.find({Age: {$gt : 25}}, {name : 1, age : 1})
[ { _id: ObjectId('6780f133273fea177c228fb8'), name: 'Malika' } ]
```

##### 6. Print details of any one student.

```
userdb> db.prac3.findOne({name:"Firdaus"})
{ _id: ObjectId('6780f133273fea177c228fb6'), name: 'Firdaus', Age: 22 }
```

7. Update email to any one value.

```
userdb> db.prac3.updateOne({name: "Sushmita"}, {$set: {email: "shushmita@gmail.com"}})
{
  acknowledged: true,
  insertedId: null,
  matchedCount: 1,
  modifiedCount: 1,
  upsertedCount: 0
}
```

8. Update status to active for age less than 25

```
userdb> db.prac3.updateMany({age: {$lt:25}}, {$set: {status: "active"}})
{
  acknowledged: true,
  insertedId: null,
  matchedCount: 0,
  modifiedCount: 0,
  upsertedCount: 0
}
```

9. Delete one single value

```
userdb> db.prac3.deleteOne({name: "Shriyanshi"})
{ acknowledged: true, deletedCount: 1 }
```

10. Delete multiple values that have age less than 25

```
userdb> db.prac3.deleteMany({age: {$lt:25}})
{ acknowledged: true, deletedCount: 0 }
```

11. Delete the entire collection

```
userdb> db.prac3.drop()
true
```