

Mongo DB

Write a query to insert student details in student collection

```
db.student_details.insertMany([
...   {
...     "student_name": "sam",
...     "student_id": "S01",
...     "class": "IT",
...     "batch": "B10",
...     "subject": "DBMS",
...     "attendance_details": [
...       {
...         "date": "22-Jan-2020",
...         "attended": false
...       },
...       {
...         "date": "23-Jan-2020",
...         "attended": false
...       },
...       {
...         "date": "24-Jan-2020",
...         "attended": false
...       }
...     ]
...   },
...   {
...     "student_name": "bran",
...     "student_id": "S02",
...     "class": "IT",
...     "batch": "B10",
...     "subject": "DBMS",
...     "attendance_details": [
...       {
...         "date": "22-Jan-2020",
...         "attended": false
...       },
...       {
...         "date": "23-Jan-2020",
...         "attended": false
...       },
...       {
...         "date": "24-Jan-2020",
...         "attended": false
...       }
...     ]
...   }
... ])
```

```
...   ]
... },
... {
...   "student_name": "bran",
...   "student_id": "S03",
...   "class": "IT",
...   "batch": "B10",
...   "subject": "DBMS",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... },
... {
...   "student_name": "sana",
...   "student_id": "S04",
...   "class": "IT",
...   "batch": "B11",
...   "subject": "Java",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... },
```

```
... {
...   "student_name": "arya",
...   "student_id": "S05",
...   "class": "IT",
...   "batch": "B11",
...   "subject": "Java",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... },
... {
...   "student_name": "saara",
...   "student_id": "S06",
...   "class": "IT",
...   "batch": "B11",
...   "subject": "Java",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... },
... {
...   "student_name": "kalpu",
```

```

...   "student_id": "S07",
...   "class": "IT",
...   "batch": "B11",
...   "subject": "Java",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... },
... {
...   "student_name": "mani",
...   "student_id": "S08",
...   "class": "IT",
...   "batch": "B12",
...   "subject": "Multimedia",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... },
... {
...   "student_name": "lachuuu",
...   "student_id": "S09",
...   "class": "IT",

```

```

...   "batch": "B12",
...   "subject" : "Multimedia",
...   "attendance_details" : [
...     {
...       "date": "22-Jan-2020",
...       "attended" : false
...     },
...     {
...       "date": "23-Jan-2020",
...       "attended": false
...     },
...     {
...       "date": "24-Jan-2020",
...       "attended": false
...     }
...   ]
... }
... ]);

```

Write a query to insert batch details in batch collection

```

> db.batch_details.insertMany([
...   {
...     "batch_name": "B10",
...     "attending_students": ["S01", "S02", "S03"]
...   },
...   {
...     "batch_name": "B11",
...     "attending_students": ["S04", "S05", "S06", "S07"]
...   },
...   {
...     "batch_name": "B12",
...     "attending_students": ["S08", "S09"]
...   }
... ]);

```

Every batch will contain fields representing students attending the batch on a particular date.

```

> db.batch_details.update({batch_name: "B10"},{$push:{
"attending_students":["S01","S02"]
}
});

```

A student will belong to only one batch.

```
[{
  $match: {
    $and : [{
      "batch_name" : "B10"
    },
    {
      "attending_students" : {
        $in : ["S04"]
      }
    }
  ]
}},
{
  $lookup:{
    from : "students",
    localField : 'string',
    foreignField : 'string',
    as : 'students'
  }
}]
```

Each batch inside the batch collection will contain multiple students attending the respective batch.

```
[{
  $match: {
    "batch" : "B11"
  }
},{
  $lookup:{
    from : 'batch',
    localField : 'string',
    foreignField : 'string',
    as: 'batch'
  }
}]
```

SQL

Write a sql query to display a table containing students attending batch1 along with their attendance history

Select student_id, student_name, batch, attendance_history from student inner join batch where batch = "B01";

Write a sql query to display a table containing batch details and attendance history of student 1

Select batch, subject, timing, attendance_history from student inner join batch;