

1) Create a Database called music.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/music";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  console.log("Database created!");
  db.close();
});
```

The terminal window shows the command being run and its output. It includes a deprecation warning about the Server Discovery and Monitoring engine.

```
ukistu05@uktpc05:~/Desktop/Node-01$ node Que01.js
(node:2844) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use t
he new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
Database created!
ukistu05@uktpc05:~/Desktop/Node-01$
```

2) Create a collection called songdetails.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  dbo.createCollection("songdetails", function(err, res) {
    if (err) throw err;
    console.log("Collection created!");
    db.close();
  });
})
```

The terminal window shows the command being run and its output. It includes a deprecation warning about the Server Discovery and Monitoring engine.

```
(node:2973) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use t
he new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
Collection created!
ukistu05@uktpc05:~/Desktop/Node-01$
```

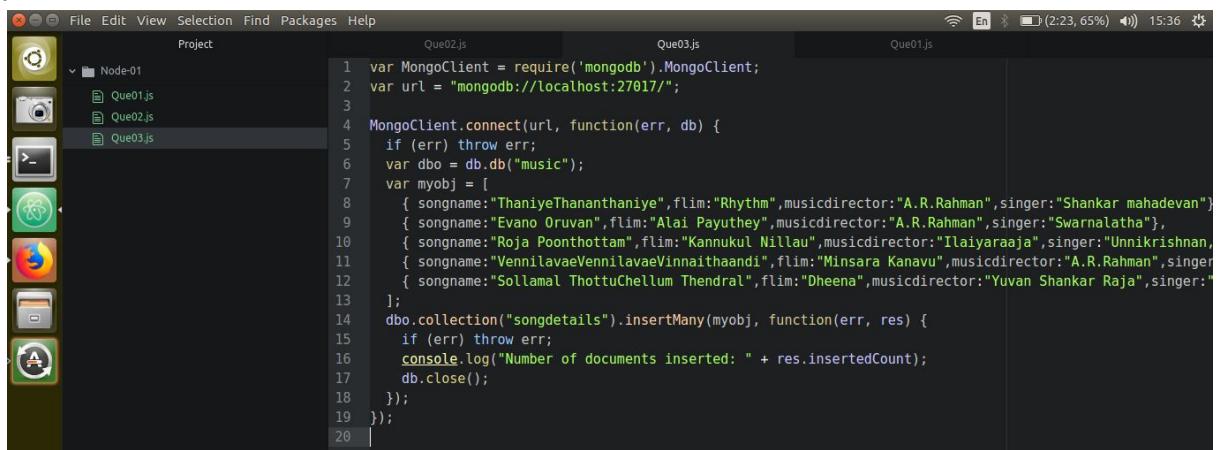
The code editor shows the full script for creating a database and a collection. It includes the MongoClient connection code and the collection creation logic.

```
File Edit View Selection Find Packages Help
Project Que02.js Que01.js
1 var MongoClient = require('mongodb').MongoClient;
2 var url = "mongodb://localhost:27017/";
3
4 MongoClient.connect(url, function(err, db) {
5   if (err) throw err;
6   var dbo = db.db("mydb");
7   dbo.createCollection("songdetails", function(err, res) {
8     if (err) throw err;
9     console.log("Collection created!");
10    db.close();
11  });
12 })
```

3) Create the above 5 song documents.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  var myobj = [
    {
      songname:"ThaniyeThananthaniye",flim:"Rhythm",musicdirector:"A.R.Rahman",singer:"Shankar mahadevan",
      { songname:"Evano Oruvan",flim:"Alai Payuthey",musicdirector:"A.R.Rahman",singer:"Swarnalatha"}, 
      { songname:"Roja Poonthottam",flim:"Kannukul Nillau",musicdirector:"Ilaiyaraaja",singer:"Unnikrishnan,Anuradha Sriram"}, 
      { songname:"VennilavaeVennilavaeVinnaithaandi",flim:"Minsara Kanavu",musicdirector:"A.R.Rahman",singer:"Hariharan,Sadhana Sargam"}, 
      { songname:"Sollamal ThottuChellum Thendral",flim:"Dheena",musicdirector:"Yuvan Shankar Raja",singer:"Hariharan"}];
  dbo.collection("songdetails").insertMany(myobj, function(err, res) {
    if (err) throw err;
    console.log("Number of documents inserted: " + res.insertedCount);
    db.close();
  });
});
```

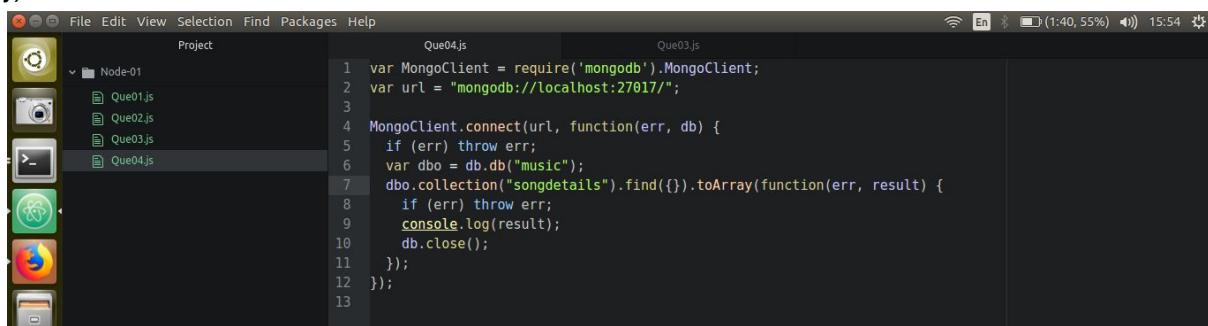


```
ukistu05@uktpc05:~/Desktop/Node-01$ node Que03.js
(node:3393) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
Number of documents inserted: 5
ukistu05@uktpc05:~/Desktop/Node-01$
```

4) List all documents created.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  dbo.collection("songdetails").find({}).toArray(function(err, result) {
    if (err) throw err;
    console.log(result);
    db.close();
  });
});
```



The screenshot shows a terminal window with the command `node Que04.js` being run. The output shows several song documents from a MongoDB collection named "songdetails".

```
ukistu05@ukipc05:~/Desktop/Node-01$ node Que04.js
(node:3772) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
[ { _id: 5e315d2da511ba0eaefc94c,
  songname: 'Thaniyethananthaniye',
  film: 'Rhythm',
  musicdirector: 'A.R.Rahman',
  singer: 'Shankar mahadevan' },
{ _id: 5e315d2da511ba0eaefc94d,
  songname: 'Evane Oruvan',
  film: 'Alai Payuthey',
  musicdirector: 'A.R.Rahman',
  singer: 'Swarnalatha' },
{ _id: 5e315d2da511ba0eaefc94e,
  songname: 'Roja Poothottam',
  film: 'Kannukul Nilau',
  musicdirector: 'Ilaiyaraaja',
  singer: [ 'Unnikrishnan', 'Anuradha Sriram' ] },
{ _id: 5e315d2da511ba0eaefc94f,
  songname: 'VennilavaeVennilavaeVinnalthaandi',
  film: 'Minsara Kanavu',
  musicdirector: 'A.R.Rahman',
  singer: [ 'Hariharan', 'Sadhana Sargam' ] },
{ _id: 5e315d2da511ba0eaefc950,
  songname: 'Sollamal Thottuchellum Thendral',
  film: 'Dheena',
  musicdirector: 'Yuvan Shankar Raja',
  singer: 'Hariharan' } ]
```



The screenshot shows a terminal window with the command `node Que04.js` being run. The output shows several song documents from a MongoDB collection named "songdetails".

```
ukistu05@ukipc05:~/Desktop/Node-01$ node Que04.js
(node:3772) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
[ { _id: 5e315d2da511ba0eaefc94c,
  songname: 'Thaniyethananthaniye',
  film: 'Rhythm',
  musicdirector: 'A.R.Rahman',
  singer: 'Shankar mahadevan' },
{ _id: 5e315d2da511ba0eaefc94d,
  songname: 'Evane Oruvan',
  film: 'Alai Payuthey',
  musicdirector: 'A.R.Rahman',
  singer: 'Swarnalatha' },
{ _id: 5e315d2da511ba0eaefc94e,
  songname: 'Roja Poothottam',
  film: 'Kannukul Nilau',
  musicdirector: 'Ilaiyaraaja',
  singer: [ 'Unnikrishnan', 'Anuradha Sriram' ] },
{ _id: 5e315d2da511ba0eaefc94f,
  songname: 'VennilavaeVennilavaeVinnalthaandi',
  film: 'Minsara Kanavu',
  musicdirector: 'A.R.Rahman',
  singer: [ 'Hariharan', 'Sadhana Sargam' ] },
{ _id: 5e315d2da511ba0eaefc950,
  songname: 'Sollamal Thottuchellum Thendral',
  film: 'Dheena',
  musicdirector: 'Yuvan Shankar Raja',
  singer: 'Hariharan' } ]
```

5) List A.R.Rahman's songs.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  var query = {musicdirector:"A.R.Rahman" };
  dbo.collection("songdetails").find(query).toArray(function(err, result) {
    if (err) throw err;
    console.log(result);
    db.close();
});
```

```
});  
});
```

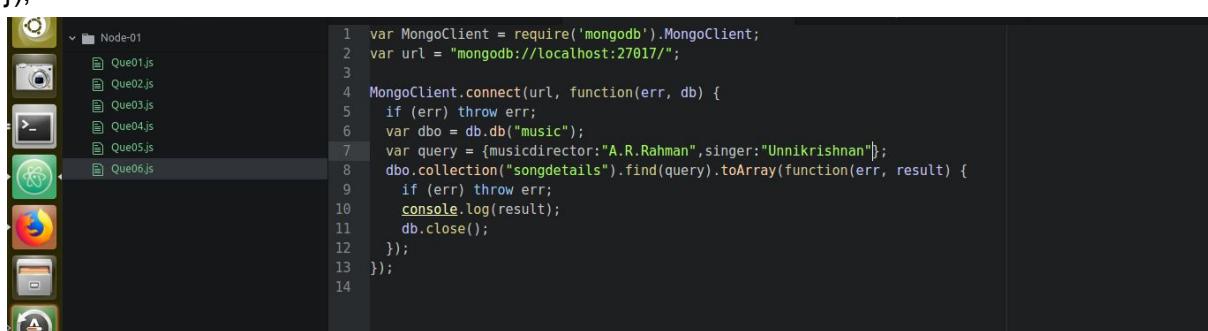


```
ukistu05@ukipco5:~/Desktop/Node-01$ node Que05.js  
(node:3943) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use t  
he new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.  
[ { _id: 5e315d2da511ba0eaefc94c,  
  songname: 'Thanteyhananthani',  
  film: 'Rhythm',  
  musicdirector: 'A.R.Rahman',  
  singer: 'Shankar mahadevan' },  
  { _id: 5e315d2da511ba0eaefc94d,  
  songname: 'Evano Oruvan',  
  film: 'Alai Payuthey',  
  musicdirector: 'A.R.Rahman',  
  singer: 'Swarnalatha' },  
  { _id: 5e315d2da511ba0eaefc94f,  
  songname: 'VennilavaevennilavaeVinnaithaandi',  
  film: 'Minsara Kanavu',  
  musicdirector: 'A.R.Rahman',  
  singer: [ 'Mariharan', 'Sadhana Sargam' ] } ]
```

6) List A.R.Rahman's songs sung by Unnikrishnan.

```
var MongoClient = require('mongodb').MongoClient;  
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {  
  if (err) throw err;  
  var dbo = db.db("music");  
  var query = {musicdirector:"A.R.Rahman",singer:"Unnikrishnan"};  
  dbo.collection("songdetails").find(query).toArray(function(err, result) {  
    if (err) throw err;  
    console.log(result);  
    db.close();  
  });  
});
```



```
ukistu05@ukipco5:~/Desktop/Node-01$ node Que06.js  
(node:4058) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use t  
he new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.  
[]
```

7) Delete the song which you don't like.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  var myquery = { flim:"Dheena" };
  dbo.collection("songdetails").deleteOne(myquery, function(err, obj) {
    if (err) throw err;
    console.log("1 document deleted");
    db.close();
  });
});
```

The screenshot shows a desktop environment with a file manager window open, displaying a project folder named 'Node-01' containing several JavaScript files: Que01.js, Que02.js, Que03.js, Que04.js, Que05.js, Que06.js, and Que07.js. Below the file manager is a terminal window with the following content:

```
File Edit View Selection Find Packages Help
Project Que05.js Que04.js Que03.js Que06.js Que07.js
1 var MongoClient = require('mongodb').MongoClient;
2 var url = "mongodb://localhost:27017/";
3
4 MongoClient.connect(url, function(err, db) {
5   if (err) throw err;
6   var dbo = db.db("music");
7   var myquery = { flim:"Dheena" };
8   dbo.collection("songdetails").deleteOne(myquery, function(err, obj) {
9     if (err) throw err;
10    console.log("1 document deleted");
11    db.close();
12  });
13 });
14

Terminal File Edit View Search Terminal Help
bash: /home/ukistu05/Downloads/mongodb-linux-x86_64-ubuntu1604-3.4.4/bin: No such file or directory
ukistu05@ukitpc05:~/Desktop/Node-01$ node Que07.js
(node:2996) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
1 document deleted
ukistu05@ukitpc05:~/Desktop/Node-01$
```

8) Add new song which is your favourite.

```
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";
```

```
MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  var myobj = {songname:"Verithanam
Verithanam",flim:"Bigil",musicdirector:"A.R.Rahman",singer:"Vijay" };
  dbo.collection("songdetails").insertOne(myobj, function(err, res) {
    if (err) throw err;
    console.log("1 document inserted");
    db.close();
  });
});
```

The screenshot shows a terminal window with the following content:

```
ukistu05@ukitpc05:~/Desktop/Node-01$ node Que08.js
(node:3420) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
1 document inserted
ukistu05@ukitpc05:~/Desktop/Node-01$
```

```

File Edit View Selection Find Packages Help
Project Que05.js Que04.js Que03.js Que06.js Que07.js Que08.js
1 var MongoClient = require('mongodb').MongoClient;
2 var url = "mongodb://localhost:27017/";
3
4 MongoClient.connect(url, function(err, db) {
5   if (err) throw err;
6   var dbo = db.db("music");
7   var myobj = {songname:"Verithanam Verithanam",flim:"Bigil",musicdirector:"A.R.Rahman",singer:"Vijay"};
8   dbo.collection("songdetails").insertOne(myobj, function(err, res) {
9     if (err) throw err;
10    console.log("1 document inserted");
11  });
12 });
13 });
14

```

9) List Songs sung by Hariharan from Minsara kanavu film.

```

MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  var query = {flim:"Minsara Kanavu",singer:"Hariharan"};
  dbo.collection("songdetails").find(query).toArray(function(err, result) {
    if (err) throw err;
    console.log(result);
    db.close();
  });
});

```

```

File Edit View Selection Find Packages Help
Project Que05.js Que04.js Que03.js Que06.js Que07.js Que08.js Que09.js Que10.js
1 var MongoClient = require('mongodb').MongoClient;
2 var url = "mongodb://localhost:27017/";
3
4 MongoClient.connect(url, function(err, db) {
5   if (err) throw err;
6   var dbo = db.db("music");
7   var query = {flim:"Minsara Kanavu",singer:"Hariharan"};
8   dbo.collection("songdetails").find(query).toArray(function(err, result) {
9     if (err) throw err;
10    console.log(result);
11  });
12 });
13 });

ukistu05@uktpc05:~/Desktop/Node-01$ node Que09.js
(node:4452) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use t
he new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
[ { _id: se315d2da511ba0eafefc94f,
  songname: 'VennilavaeVennilavaeVinnalathaandi',
  flim: 'Minsara Kanavu',
  musicdirector: 'A.R.Rahman',
  singer: [ 'Hariharan', 'Sadhana Sargam' ] } ]

```

10) List out the singers' names in your document.

```

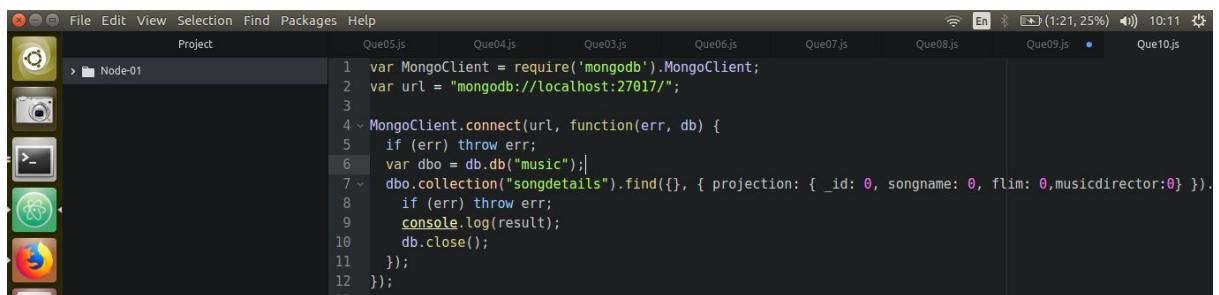
var MongoClient = require('mongodb').MongoClient;
var url = "mongodb://localhost:27017/";

```

```

MongoClient.connect(url, function(err, db) {
  if (err) throw err;
  var dbo = db.db("music");
  dbo.collection("songdetails").find({},{ projection: { _id: 0, songname: 0, flim: 0,musicdirector:0 }}).toArray(function(err, result) {
    if (err) throw err;
    console.log(result);
    db.close();
  });
});

```



```
ukistu05@uktpc05:~/Desktop/Node-01$ node Que10.js
(node:4251) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
[ { singer: 'Shankar Mahadevan' },
  { singer: 'Swarnalatha' },
  { singer: [ 'Unnikrishnan', 'Anuradha Sriram' ] },
  { singer: [ 'Hariharan', 'Sadhana Sargam' ] },
  { singer: 'Vijay' } ]
```



```
ukistu05@uktpc05:~/Desktop/Node-01$ node Que10.js
(node:4251) DeprecationWarning: current Server Discovery and Monitoring engine is deprecated, and will be removed in a future version. To use the new Server Discover and Monitoring engine, pass option { useUnifiedTopology: true } to the MongoClient constructor.
[ { singer: 'Shankar Mahadevan' },
  { singer: 'Swarnalatha' },
  { singer: [ 'Unnikrishnan', 'Anuradha Sriram' ] },
  { singer: [ 'Hariharan', 'Sadhana Sargam' ] },
  { singer: 'Vijay' } ]
```



