**Task 1 :**

Run the below commands in mongo shell to:

* create a new database named  season3batch3adp
* check what is the name of the current database.
* list all of the collections of the current database.

&

* **create a new collection** named employees in that database.

use batch3adp

db.getName()

show collections

db.createCollection("employees");

**Task 2 :**

**Copy** the below code and run it in the mongo shell to insert the new documents representing our employees:

db.employees.insertMany(

[

{

name: "Sue",

age: 19,

phone: {

personal: "555-123-123",

work: "555-456-456",

ext: "2342"

},

privileges: "user",

favorites: { artist: "Picasso", food: "pizza"

},

finished: [

17,

3

],

badges: [

"blue",

"black"

],

points: [

{ points: 85, bonus: 20

},

{ points: 85, bonus: 10

}

]

},

{

name: "Steve",

age: 46,

phone: {

personal: "929-884-8752",

work: "555-456-456",

ext: "1109"

},

privileges: "admin",

favorites: { artist: "Rembrandt", food: "kroketten"

},

finished: [

25

],

badges: [

"red",

"blue"

],

points: [

{ points: 12, bonus: 5

},

{ points: 40, bonus: 0

}

]

},

{

name: "Bob",

age: 42,

phone: {

personal: "555-123-123",

work: "555-456-456",

ext: "7673"

},

privileges: "admin",

favorites: { artist: "Miro", food: "meringue"

},

finished: [

11,

25

],

badges: [

"green"

],

points: [

{ points: 85, bonus: 20

},

{ points: 64, bonus: 12

}

]

},

{

name: "Willy",

age: 22,

phone: {

personal: "555-123-123",

work: "555-456-456",

ext: "8263"

},

privileges: "user",

favorites: { artist: "Cassatt", food: "cake"

},

finished: [

6

],

badges: [

"blue",

"Picasso"

],

points: [

{ points: 81, bonus: 8

},

{ points: 55, bonus: 20

}

]

},

{

name: "John",

age: 34,

phone: {

personal: "555-123-123",

work: "555-456-456",

ext: "2143"

},

privileges: "admin",

favorites: { artist: "Chagall", food: "chocolate"

},

finished: [

5,

11

],

badges: [

"Picasso",

"black"

],

points: [

{ points: 53, bonus: 15

},

{ points: 51, bonus: 15

}

]

},

{

name: "Steve",

age: 23,

phone: {

personal: "555-123-123",

work: "555-456-456",

ext: "8253"

},

privileges: "user",

favorites: { artist: "Noguchi", food: "nougat"

},

finished: [

14,

6

],

badges: [

"orange"

],

points: [

{ points: 71, bonus: 20

}

]

},

{

name: "Martin",

age: 43,

phone: {

personal: "555-123-123",

work: "555-456-456",

ext: "5623"

},

privileges: "user",

favorites: { food: "pizza", artist: "Picasso"

},

finished: [

18,

12

],

badges: [

"black",

"blue"

],

points: [

{ points: 78, bonus: 8

},

{ points: 57, bonus: 7

}

]

}

]

)

Once you have inserted the above documents in the collection employees using your mongo shell, perform the following queries:

* **Task 3**: Find all employees that are over 30 years old.

* **Task 4:** Find all employees whose age is less than or equal to 30.

* **Task 5:** Find all the employees whose favorite food is pizza.

* **Task 6:** Change Willy’s personal phone number to "93-123-45-67".

* **Task 7:** Change Bob’s privilege to normal "user".

* **Task 8:** Find all employees whose favorite artist is "Picasso".

* **Task 9:** Delete the employee whose name is "John".

* **Task 10:** List all employees and [sort](https://docs.mongodb.com/v3.2/reference/method/cursor.sort/#cursor-sort) them by name appending to the end of the query the method [sort](https://docs.mongodb.com/v3.2/reference/method/cursor.sort/#cursor-sort) like this: .sort({name: 1}) or .sort({name: -1}) .

* **(EXTRA)** : Add a bonus of 15 to all those employees who have a bonus that is less than 10.

|  |
| --- |
| [ |
|  | { |
|  | "name": "Sue", |
|  | "age": 19, |
|  | "phone": { |
|  | "personal": "555-123-123", |
|  | "work": "555-456-456", |
|  | "ext": "2342" |
|  | }, |
|  | "privileges": "user", |
|  | "favorites": { "artist": "Picasso", "food": "pizza" }, |
|  | "finished": [17, 3], |
|  | "badges": ["blue", "black"], |
|  | "points": [ |
|  | { "points": 85, "bonus": 20 }, |
|  | { "points": 85, "bonus": 10 } |
|  | ] |
|  | }, |
|  | { |
|  | "name": "Steve", |
|  | "age": 46, |
|  | "phone": { |
|  | "personal": "929-884-8752", |
|  | "work": "555-456-456", |
|  | "ext": "1109" |
|  | }, |
|  | "privileges": "admin", |
|  | "favorites": { "artist": "Rembrandt", "food": "kroketten" }, |
|  | "finished": [25], |
|  | "badges": ["red", "blue"], |
|  | "points": [ |
|  | { "points": 12, "bonus": 5 }, |
|  | { "points": 40, "bonus": 0 } |
|  | ] |
|  | }, |
|  | { |
|  | "name": "Bob", |
|  | "age": 42, |
|  | "phone": { |
|  | "personal": "555-123-123", |
|  | "work": "555-456-456", |
|  | "ext": "7673" |
|  | }, |
|  | "privileges": "admin", |
|  | "favorites": { "artist": "Miro", "food": "meringue" }, |
|  | "finished": [11, 25], |
|  | "badges": ["green"], |
|  | "points": [ |
|  | { "points": 85, "bonus": 20 }, |
|  | { "points": 64, "bonus": 12 } |
|  | ] |
|  | }, |
|  | { |
|  | "name": "Willy", |
|  | "age": 22, |
|  | "phone": { |
|  | "personal": "555-123-123", |
|  | "work": "555-456-456", |
|  | "ext": "8263" |
|  | }, |
|  | "privileges": "user", |
|  | "favorites": { "artist": "Cassatt", "food": "cake" }, |
|  | "finished": [6], |
|  | "badges": ["blue", "Picasso"], |
|  | "points": [ |
|  | { "points": 81, "bonus": 8 }, |
|  | { "points": 55, "bonus": 20 } |
|  | ] |
|  | }, |
|  | { |
|  | "name": "John", |
|  | "age": 34, |
|  | "phone": { |
|  | "personal": "555-123-123", |
|  | "work": "555-456-456", |
|  | "ext": "2143" |
|  | }, |
|  | "privileges": "admin", |
|  | "favorites": { "artist": "Chagall", "food": "chocolate" }, |
|  | "finished": [5, 11], |
|  | "badges": ["Picasso", "black"], |
|  | "points": [ |
|  | { "points": 53, "bonus": 15 }, |
|  | { "points": 51, "bonus": 15 } |
|  | ] |
|  | }, |
|  | { |
|  | "name": "Steve", |
|  | "age": 23, |
|  | "phone": { |
|  | "personal": "555-123-123", |
|  | "work": "555-456-456", |
|  | "ext": "8253" |
|  | }, |
|  | "privileges": "user", |
|  | "favorites": { "artist": "Noguchi", "food": "nougat" }, |
|  | "finished": [14, 6], |
|  | "badges": ["orange"], |
|  | "points": [{ "points": 71, "bonus": 20 }] |
|  | }, |
|  | { |
|  | "name": "Martin", |
|  | "age": 43, |
|  | "phone": { |
|  | "personal": "555-123-123", |
|  | "work": "555-456-456", |
|  | "ext": "5623" |
|  | }, |
|  | "privileges": "user", |
|  | "favorites": { "food": "pizza", "artist": "Picasso" }, |
|  | "finished": [18, 12], |
|  | "badges": ["black", "blue"], |
|  | "points": [ |
|  | { "points": 78, "bonus": 8 }, |
|  | { "points": 57, "bonus": 7 } |
|  | ] |
|  | } |

]