

COMPOSING QUERIES



queries.js

```
import { gql } from "@apollo/client";
```

```
const getAuthorsQuery = gql`  
  {  
    authors {  
      name  
      id  
    }  
  }  
`;  
;
```

```
const getBooksQuery = gql`  
  {  
    books {  
      name  
      id  
    }  
  }  
`;  
;
```

```
const addBookMutation = gql`  
  mutation AddBook($name: String!, $genre: String!, $authorId: ID!){  
    addBook(name: $name, genre: $genre, authorId: $authorId){  
      name  
      id  
    }  
  }  
`;  
;
```

```
export { getAuthorsQuery, getBooksQuery, addBookMutation };
```

Insert
code

```
import React from "react";
import { useQuery, useMutation } from "@apollo/client";
import { getAuthorsQuery, addBookMutation } from '../queries/queries';

function DisplayAuthors(){
  const { loading, data } = useQuery(getAuthorsQuery);
  if(loading){
    return( <option disabled>Loading authors</option> );
  } else {
    return data.authors.map(author => {
      return( <option key={ author.id } value={author.id}>{ author.name }</option> );
    });
  }
}

function AddBook() {

  const [book, setBook] = React.useState({ name: "", genre: "", authorId: "" });

  const [addBookMut, { dataMutation }] = useMutation(addBookMutation);

  const handleSubmit = e => {
    e.preventDefault();
    addBookMut({
      variables: {
        name: book.name,
        genre: book.genre,
        authorId: book.authorId,
      },
    });
  }

  ...

  export default AddBook;
```

React App

localhost:3000

My Reading List

- Name of the Wind
- The Final Empire
- The Long Earth
- The Hero of Ages
- The Colour of Magic
- The Light Fantastic

Book name:

Genre:

Author:

+

Console

[HMR] Waiting for update signal from WDS... log.js:24

Download the Apollo DevTools for a better development experience: [invariant.ts:42](https://chrome.google.com/webstore/detail/apollo-client-dev-eloper-t/jdkknkkbebbapilgoecciglkfbmbnfm)
<https://chrome.google.com/webstore/detail/apollo-client-dev-eloper-t/jdkknkkbebbapilgoecciglkfbmbnfm>

4 DBS 11 COLLECTIONS

☆ FAVORITE

HOSTS

- cluster0-shard-00-02.9h6...
- cluster0-shard-00-00.9h6...
- cluster0-shard-00-01.9h62...

CLUSTER

Replica Set (atlas-14acvk-...)

3 Nodes

EDITION

MongoDB 4.4.9 Enterprise

Filter your data

- admin
- config
- gql
 - authors
 - books
- local

+

gql.books

DOCUMENTS 6 TOTAL SIZE 699B AVG. SIZE 117B INDEXES 1 TOTAL SIZE 36.0KB AVG. SIZE 36.0KB

Documents

Aggregations

Schema

Explain Plan

Indexes

Validation

FILTER { field: 'value' }

OPTIONS

FIND

RESET

↺

...

ADD DATA

↑

VIEW

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{ }

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Displaying documents 1 - 7 of 7

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>

REFRESH

__v: 0

```
_id: ObjectId("614e2afd64c43f78aa1e4304")
name: "The Hero of Ages"
genre: "Fantasy"
authorId: "614e2a3264c43f78aa1e42fa"
__v: 0
```

```
_id: ObjectId("614e2b0c64c43f78aa1e4306")
name: "The Colour of Magic"
genre: "Fantasy"
authorId: "614e2a4064c43f78aa1e42fc"
__v: 0
```

▼

```
_id: ObjectId("614e2b1364c43f78aa1e4308")
name: "The Light Fantastic"
genre: "Fantasy"
authorId: "614e2a4064c43f78aa1e42fc"
__v: 0
```

✎ 📄 📋 🗑

```
_id: ObjectId("614e568364c43f78aa1e4333")
name: "Hogfather"
genre: "Fantasy"
authorId: "614e2a4064c43f78aa1e42fc"
__v: 0
```