# DataStorage run and test instructions

## Requirements:

* .Net core 6.0 SDK or newer version installed
* PostgreSQL database installed

## Run and test instructions:

1. Create and initialize database with init.sql script:

* Create new postgres user with create database priviliges or use some existing one:

createuser -P [user\_name]

insert and confirm password for newly created role as [user\_password]

* Create new database or use some existing one:

createdb [database\_name]

* Run the following commands to create books table and add test data:

psql -d [database\_name] -U [user\_name] -f [create\_file\_path]

where [create\_file\_path] is the path to create.sql file contained in scripts directory

psql -d [database\_name] -U [user\_name] -f [init\_file\_path]

where [init\_file\_path] is the path to init.sql file contained in scripts directory

1. Set proper connection strings in DataStorageWebAPI and DataStorageCLI projects:

* Edit src/DataStorage/DataStorageWebAPI/appsettings.json and src/DataStorage/DataStorageCLI/appsettings.json - set "con" variable to

*"User ID=[user\_name];Password=[user\_password];Host=[database\_host];Database=[database\_name];Port=[database\_port]"*

where [database\_host] and [database\_port] is host and port where database server is running

1. Compile projects:

* Copy source files on target machine
* Go to root directory of DataStorageWebAPI project and run below commands to install all required libraries and then compile project:

dotnet restore

dotnet build

* Go to the root directory of DataStorageCLI project and execute the same two commands for that project.

1. To run DataStorageWebAPI go to src/DataStorage/DataStorageWebAPI/bin/Debug/netcoreapp2.1 and execute:

dotnet DataStorageWebAPI.dll

Test service sending http requests to following url's:

*http://[server\_host]:5000/api/books* – lists id's of all stored books

*http://[server\_host]:5000/api/books/[id]* - prints metadata of book with provided id as [id]

*http://[server\_host]:5000/api/books/[id]/ContentIndex* - prints table of content of book with provided id

1. To run DataStorageCLI go to src/DataStorage/DataStorageCLI/bin/Debug/netcoreapp2.1 and execute:

dotnet DataStorageCLI.dll books [action] [action\_parameter]

where [action] is one of:

get\_ids – lists id's of all stored books

get\_item [id] – prints metadata of book with provided id

get\_content\_index [id] – prints table of content of book with provided id