

Guide of Our System

how to run “volleyball-match-record-system”

How to Register Information

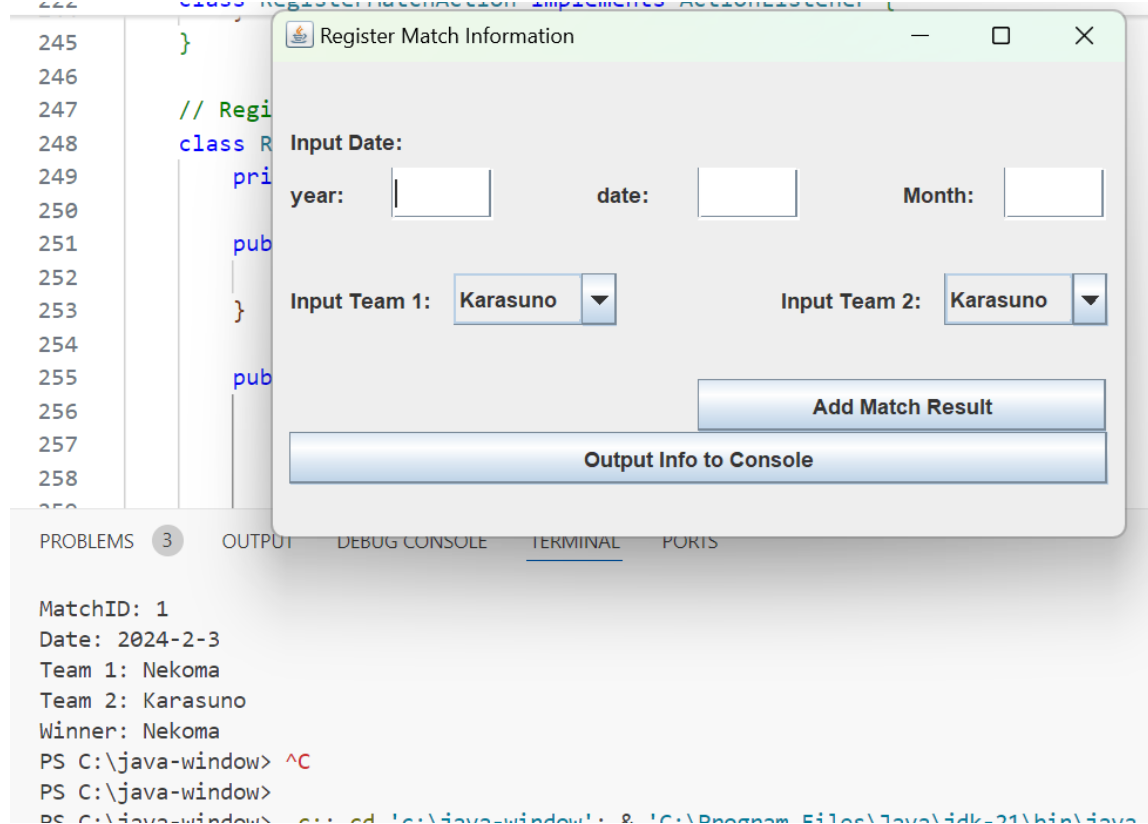
demo

demo

```
J RegisterMatchInfo.java X J TestRegisterMatchInfo.java • J TestList.java
J RegisterMatchInfo.java > RegisterMatchInfo > RegisterWinnerAction > actionPerformed(ActionEvent)
5 public class RegisterMatchInfo {
222     class RegisterMatchAction implements ActionListener {
245     }
246
247     // Register Winner by click button
248     class RegisterWinnerAction implements ActionListener {
249         private JComboBox<String> comboBox;
250
251         public RegisterWinnerAction(JComboBox<String> comboBox) {
252             this.comboBox = comboBox;
253         }
254
255         public void actionPerformed(ActionEvent e) {
256             winner = (String) comboBox.getSelectedItem();
257             createMatchListFrame();
258             winnerFrame.dispose();
259             // System.exit(0);
260         }
261     }
262
263     class DelButtonAction implements ActionListener {
264         public void actionPerformed(ActionEvent e) {
265             int index = matchList.getSelectedIndex();
266             if (index != -1) {
267                 listModel.remove(index);
268             } else {
269                 // System.exit(0);
270             }
271         }
272     }
273 }
```

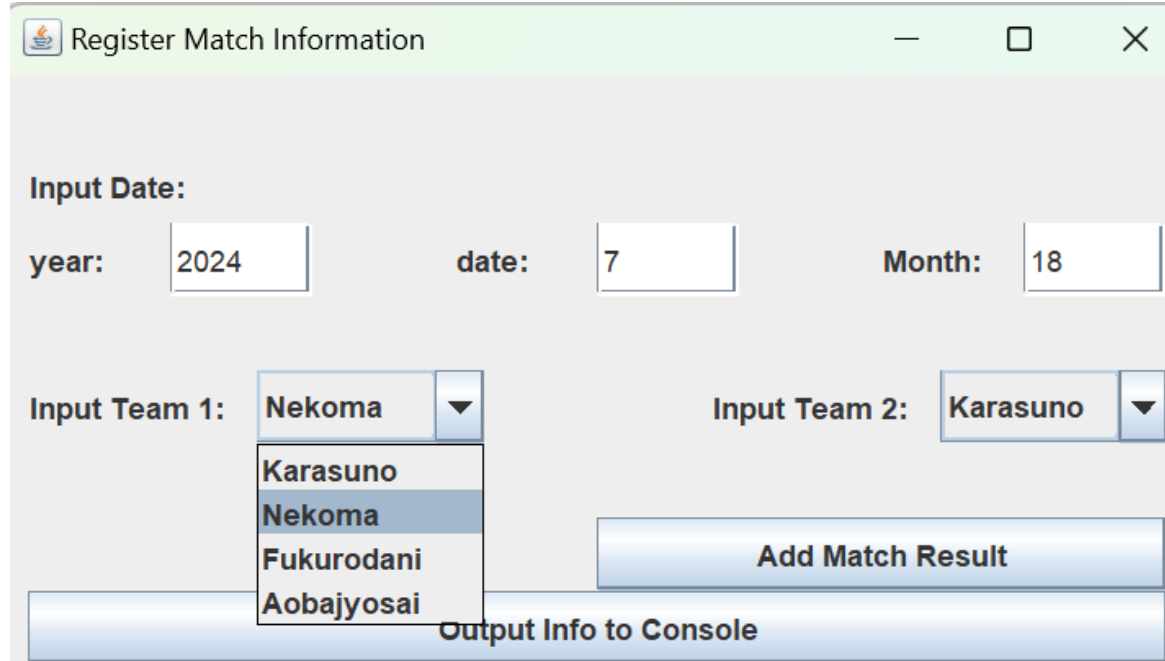
Register Match Information

When you run
"RegisterMatchInfo.java",
a window like the one
on the right will appear.



Step1 : Add Date and Team Information

Enter the date of the match and select the competing school.



The image shows a Java Swing window titled "Register Match Information". It contains input fields for the match date and team selection. The date is entered as 2024 for the year, 7 for the date, and 18 for the month. For the teams, "Nekoma" is selected for Input Team 1 and "Karasuno" is selected for Input Team 2. A dropdown menu for Input Team 1 is open, showing the list of teams: Karasuno, Nekoma (highlighted), Fukurodani, and Aobajyosai. There is an "Add Match Result" button and a console area at the bottom labeled "Output Info to Console".

Register Match Information

Input Date:

year: 2024 date: 7 Month: 18

Input Team 1: Nekoma

Input Team 2: Karasuno

Karasuno
Nekoma
Fukurodani
Aobajyosai

Add Match Result

Output Info to Console

Step2-1 : Add Match Result

If match already finished, you can register winner team.

Click button “Add Match Result” (green color) then a new window “Register Winner” will appear.

Point :

Registration not allowed until the match is finished.

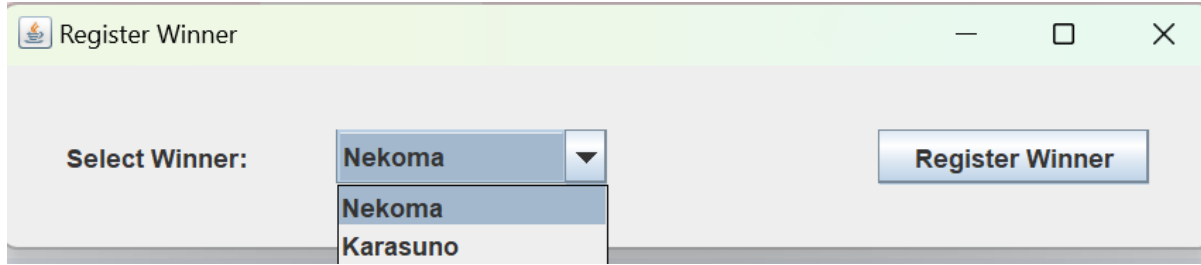
Register as soon as the competing school is decided.

(Should be able to register even before the match is finished.)

The image shows two overlapping windows from a software application. The top window, titled 'Register Winner', has a 'Select Winner:' dropdown menu with 'Nekoma' selected and a 'Register Winner' button. The bottom window, titled 'Register Match Information', contains fields for 'Input Date:' (year: 2024, date: 7, Month: 18), 'Input Team 1:' (Nekoma), and 'Input Team 2:' (Karasuno). A green arrow points to the 'Add Match Result' button, which is circled in green. Below this button is a button labeled 'Output Info to Console'. The background shows a sidebar with a 'Guide of Our System' and a list of 'Register Match Information' entries.

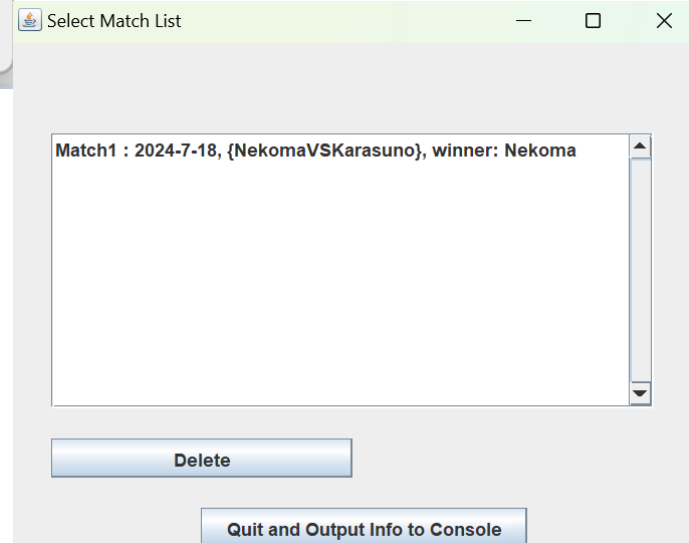
Step2-2 : Add Match Result

Select winner and click button “Register Winner”.



Then new window “Select Match List” will appear.

If you register a wrong information, you can delete it by select line in the field and click delete button.



Step3 : Output information

If you click the button “Quit and Output Info to Console”, you can see the output as below.

```
PS C:\java-window> c::; cd 'c:\java-window'; & 'C:\Program Files\Java\jdk-21\bin\java.exe' '-XX:+ShowCodeDetailsInExceptionMessages' '-cp' 'C:\Users\lydwo\AppData\Roaming\Code\User\workspaceStorage\f84cd399d19ee08df405d99fb9b2580c\redhat.java\jdt_ws\java-window_983fec43\bin' 'RegisterMatchInfo'
```

```
MatchID: 1
Date: 2024-7-18
Team 1: Nekoma
Team 2: Karasuno
Winner: Nekoma
```


How to Get Information

Try 1: Get information of Player 1

Command: `./gradlew run --args="GetPlayerInfo 1"`

Successful output: You can see a similar output as below

```
PS C:\volleyball-app\multi-storage-transaction-sample> ./gradlew run --args="GetPlayerInfo 1"
Starting a Gradle Daemon, 3 incompatible and 3 stopped Daemons could not be reused, use --status for details
```

```
> Task :compileJava
```

隴ヲ蜻・[options]縹ヲ縹ノ縹ヲ蛟、8縛ヲ蟒・「縛輔」縛ヲ縛・糸縵ヲ雁セ後・縹ヲ縹ヲ縹ノ縹ヲ縛ヲ蜚企勁縛輔」縹俱」亥」壹千縛・

ヲ縛・縋ヲ雁セ後・綱₁綱₂綱₃縋ケ縛₄蛋企勁縛輔₁縋俱₂亥₃壹₄干縛₅・

縛ッ縹・Xlint:縹I縹勵す縹A縹ウ縹刺ッ逕イ縹勵U縹吮・

隴ヲ蜻・蛟・

```
> Task :run
```

```
SLF4J: Failed to load class "org.slf4j.impl.StaticLoggerBinder".
```

SLF4J: Defaulting to no-operation (NOP) logger implementation

SLF4J: See <http://www.slf4j.org/codes.html#StaticLoggerBinder> for further details.

```
{ "playerID": 1, "name": "Kageyama Tobio", "team": "Karasuno", "grade": 1, "position": "S", "status": 27 }
```

Deprecated Gradle features were used in this build, making it incompatible with Gradle 8.0.

You can use `--warning-mode all` to show the individual deprecation warnings and determine if they come from your own scripts or plugins.

How to run sample app

Step 0 : Download JAVA

Recommend to download Java 8, 11, 17, 21

We use version 21

Prerequisites

- One of the following Java Development Kits (JDKs):
 - [Oracle JDK](#) LTS version (8, 11, 17 or 21)
 - OpenJDK LTS version (8, 11, 17, or 21) from [Eclipse Temurin](#), [Amazon Corretto](#), or [Microsoft](#)
- [Docker](#) 20.10 or later with [Docker Compose](#) V2 or later

NOTE

We recommend using the LTS versions mentioned above, but other non-LTS versions may work.

In addition, other JDKs should work with ScalarDB, but we haven't tested them.

Step 0: Download Java

You might be required to create oracle account

Step for Windows →



The screenshot shows the Oracle website's Java download page for Windows. The page is in Japanese. At the top, there's a navigation bar with the Oracle logo and links for products, resources, customers, partners, developers, and about Oracle. Below this, there's a section for 'Java downloads' with tabs for 'Tools and resources' and 'Java archive'. The 'JDK 21' tab is selected. Underneath, there's a section for 'JDK Development Kit 21.0.4 downloads'. A paragraph explains that JDK 21 binaries are free to use in production and free to redistribute, at no cost, under the Oracle No-Fee Terms. Another paragraph states that JDK 21 will receive updates under the NPTC, until September 2026, a year after the release of the next LTS. S. production use beyond the limited free grants of the OTN license will require a fee. Below this, there's a table with columns for 'Product/file description', 'File size', and 'Download'. The table lists three download options for x64: 'Compressed Archive' (185.84 MB), 'Installer' (164.23 MB), and 'MSI Installer' (162.97 MB). A sign-in overlay is visible on the right side of the page, titled 'サイン・イン' (Sign In). It has a form for 'Username or email' and a '次' (Next) button. Below the form, it says 'Oracleアカウントをお持ちではないですか。' (Do you not have an Oracle account?) and a button for 'アカウントの作成' (Create account). The overlay also has a link for 'ヘルプ' (Help) and a link for 'サインアウト' (Sign out).

ORACLE 製品 業種 リソース お客様 パートナー 開発者 オラクルについて

Java downloads Tools and resources Java archive

JDK 22 JDK 21 JDK 17 GraalVM for JDK 22 GraalVM for JDK 21 GraalVM for JDK 17

JDK Development Kit 21.0.4 downloads

JDK 21 binaries are free to use in production and free to redistribute, at no cost, under the [Oracle No-Fee Terms](#).

JDK 21 will receive updates under the NPTC, until September 2026, a year after the release of the next LTS. S. production use beyond the [limited free grants](#) of the OTN license will [require a fee](#).

Linux macOS **Windows**

Product/file description	File size	Download
x64 Compressed Archive	185.84 MB	https://download.oracle.com/java/21/latest/jdk-21_windows-x64_bin.zip (sha256)
x64 Installer	164.23 MB	https://download.oracle.com/java/21/latest/jdk-21_windows-x64_bin.exe (sha256)
x64 MSI Installer	162.97 MB	https://download.oracle.com/java/21/latest/jdk-21_windows-x64_bin.msi (sha256)

サイン・イン

Username or email

次

[Forgot username?](#)

Oracleアカウントをお持ちではないですか。

アカウントの作成

© Oracle | 使用条件 | プライバシー | ポリシー

クラウドアカウント

クラウドにサインイン

無料クラウドティアにサインアップする

Oracleアカウント

[Kasei Ri](#)

[ヘルプ](#)

[サインアウト](#)







Step 0 : Download schema loader

Schema loader [Download](#)

Please select the highlighted section below

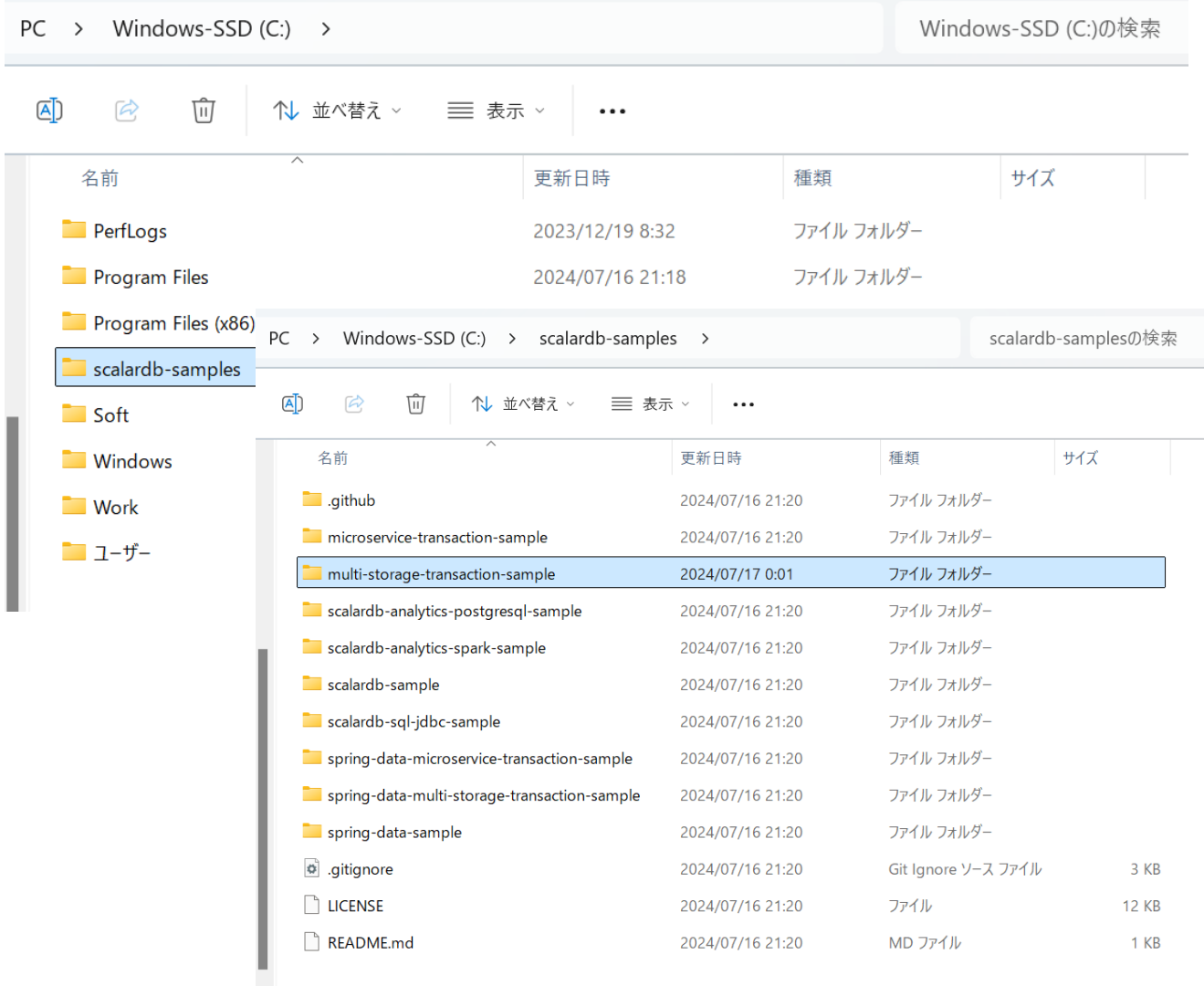
▼ Assets

6

 scalardb-cluster-schema-loader-3.12.3-all.jar	104 MB	2 weeks ago
 scalardb-cluster-sql-cli-3.12.3-all.jar	107 MB	2 weeks ago
 scalardb-schema-loader-3.12.3.jar	65.7 MB	2 weeks ago
 scalardb-server-3.12.3.zip	67.3 MB	2 weeks ago
 Source code (zip)		2 weeks ago
 Source code (tar.gz)		2 weeks ago

Step 1 : Git clone

Clone succesfully



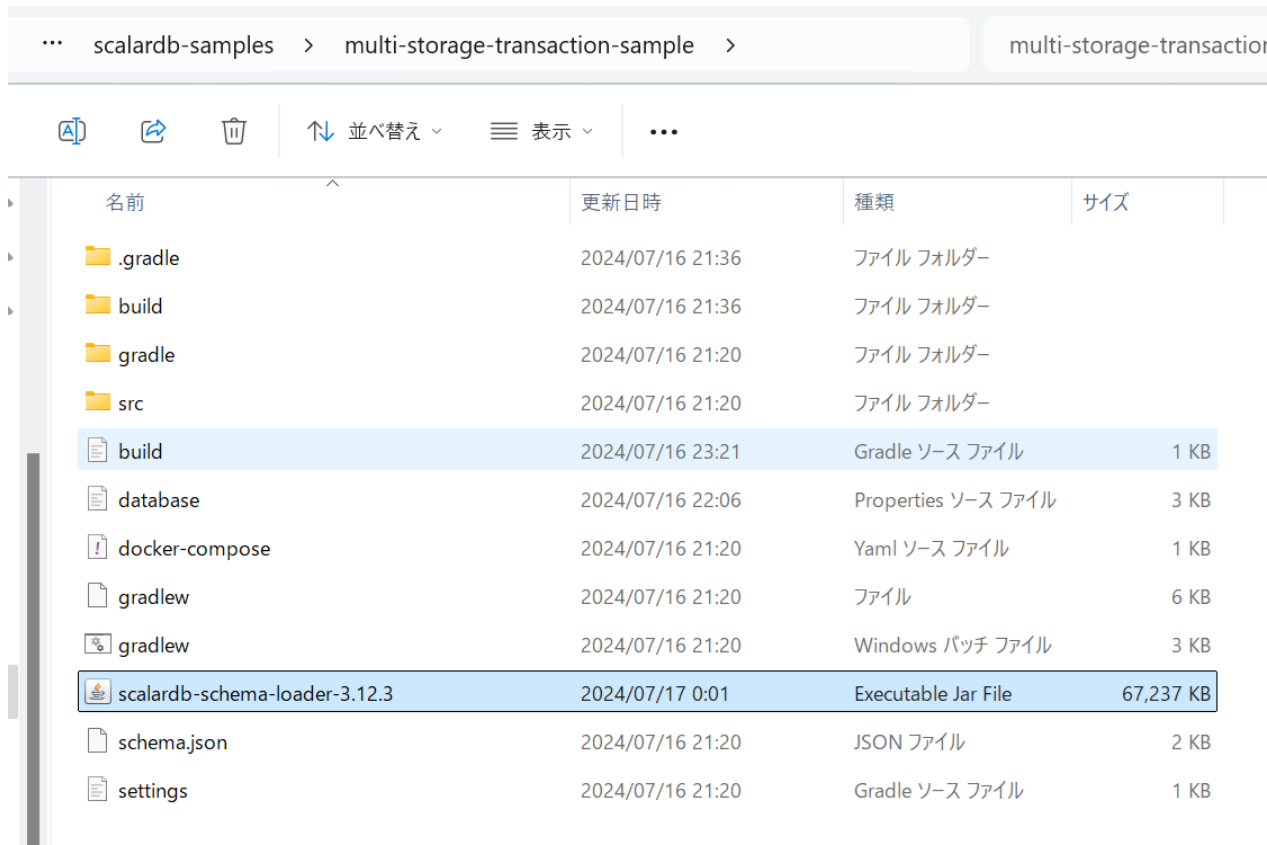
Step 3 : Check and Move schema loader

As shown in the figure
on the right

<Check the version>

We use 3.12.3

it will be used at next step



The screenshot shows a file explorer window with the path 'scalardb-samples > multi-storage-transaction-sample >'. The file list is as follows:

名前	更新日時	種類	サイズ
.gradle	2024/07/16 21:36	ファイル フォルダー	
build	2024/07/16 21:36	ファイル フォルダー	
gradle	2024/07/16 21:20	ファイル フォルダー	
src	2024/07/16 21:20	ファイル フォルダー	
build	2024/07/16 23:21	Gradle ソース ファイル	1 KB
database	2024/07/16 22:06	Properties ソース ファイル	3 KB
docker-compose	2024/07/16 21:20	Yaml ソース ファイル	1 KB
gradlew	2024/07/16 21:20	ファイル	6 KB
gradlew	2024/07/16 21:20	Windows パッチ ファイル	3 KB
scalardb-schema-loader-3.12.3	2024/07/17 0:01	Executable Jar File	67,237 KB
schema.json	2024/07/16 21:20	JSON ファイル	2 KB
settings	2024/07/16 21:20	Gradle ソース ファイル	1 KB

and input Command: `docker-compose up -d`

The screenshot displays the Docker Desktop application. The top navigation bar includes a search function for images, containers, and volumes. The left sidebar contains navigation options: Containers, Images, Volumes, Builds, Docker Scout, and Extensions. The main area is divided into two panes. The left pane, titled 'Containers', shows a table with columns for Name, Image, Status, and Port(s). It lists a container named 'multi-stor' with image 'multi-stor' and status 'Running (2/2)'. The right pane, titled 'multi-storage-transaction-sample', shows details for two containers: 'mysql-1' (mysql:8.0) and 'cassandra-1' (cassandra:3.11). A Windows PowerShell terminal window is open in the foreground, showing the command 'docker-compose up -d' and its output, which indicates that the network and containers 'cassandra-1' and 'mysql-1' were successfully created and started. The terminal output also shows a warning message about the 'version' key in the 'se.yml' file being obsolete.

Step 5 : Load schema

Command: java -jar scalardb-schema-loader-**<VERSION>**.jar --config database.properties --schema-file schema.json --coordinator

Replace **<VERSION>**

java -jar scalardb-schema-loader-**3.12.3**.jar --config database.properties --schema-file schema.json --coordinator

```
PS C:\scalardb-samples\multi-storage-transaction-sample> ls
```

```
ディレクトリ : C:\scalardb-samples\multi-storage-transaction-sample
```

Mode	LastWriteTime	Length	Name
d----	2024/07/16 21:36		.gradle
d----	2024/07/16 21:36		build
d----	2024/07/16 21:20		gradle
d----	2024/07/16 21:20		src
-a----	2024/07/16 23:21	420	build.gradle
-a----	2024/07/16 22:06	2298	database.properties
-a----	2024/07/16 21:20	284	docker-compose.yml
-a----	2024/07/16 21:20	5959	gradlew
-a----	2024/07/16 21:20	2763	gradlew.bat
-a----	2024/07/17 0:01	68849812	scalardb-schema-loader-3.12.3.jar
-a----	2024/07/16 21:20	1025	schema.json
-a----	2024/07/16 21:20	55	settings.gradle

Step 5

The successful result is shown below

```
PS C:\scalardb-samples\multi-storage-transaction-sample> java -jar scalardb-schema-loader-3.12.3.jar --config database.p
roperties --schema-file schema.json --coordinator
[main] INFO com.scalar.db.schemaloader.command.SchemaLoaderCommand - Config path: database.properties
[main] INFO com.scalar.db.schemaloader.command.SchemaLoaderCommand - Schema path: schema.json
[main] INFO com.datastax.driver.core - DataStax Java driver 3.11.5 for Apache Cassandra
[main] INFO com.datastax.driver.core.GuavaCompatibility - Detected Guava >= 19 in the classpath, using modern compatibil
ity layer
[main] INFO com.datastax.driver.core.Native - Could not load JNR C Library, native system calls through this library wil
l not be available (set this logger level to DEBUG to see the full stack trace).
[main] INFO com.datastax.driver.core.ClockFactory - Using java.lang.System clock to generate timestamps.
[main] WARN com.datastax.driver.core.NettyUtil - Found Netty's native epoll transport, but not running on linux-based op
erating system. Using NIO instead.
[main] INFO com.datastax.driver.core.Cluster - Cannot connect with protocol version V5, trying with V4
[main] INFO com.datastax.driver.core.policies.DCAwareRoundRobinPolicy - Using data-center name 'datacenter1' for DCAware
RoundRobinPolicy (if this is incorrect, please provide the correct datacenter name with DCAwareRoundRobinPolicy construc
tor)
[main] INFO com.datastax.driver.core.Cluster - New Cassandra host localhost/[0:0:0:0:0:0:0:1]:9042 added
[main] INFO com.scalar.db.storage.cassandra.ClusterManager - Session to the cluster is created
[main] INFO com.scalar.db.schemaloader.SchemaOperator - Creating the table customers in the namespace customer succeeded
[main] INFO com.scalar.db.schemaloader.SchemaOperator - Creating the table orders in the namespace order succeeded
[main] INFO com.scalar.db.schemaloader.SchemaOperator - Creating the table statements in the namespace order succeeded
[main] INFO com.scalar.db.schemaloader.SchemaOperator - Creating the table items in the namespace order succeeded
[main] INFO com.scalar.db.schemaloader.SchemaOperator - Creating the coordinator tables succeeded
```

Step 6 : Load initial data

Command:

```
./gradlew run --args="LoadInitialData"
```

<Attention> If you use Command prompt then use

```
gradlew run --args="LoadInitialData"
```

or

```
gradlew.bat run --args="LoadInitialData"
```

Step 6: Expected reaction

<Notice> Use java 21: Garbled text will appear → (you can use java 8)

```
PS C:\scalardb-samples\multi-storage-transaction-sample> ./gradlew run --args="LoadInitialData"
Starting a Gradle Daemon, 2 incompatible Daemons could not be reused, use --status for details

> Task :compileJava
隴ヲ蜻・ [options] 縹ス綱シ縹ケ蛟、8縹ツ蜻・ ヌ「縹輔 | 縹ヲ縹・ ※縹ヲ雁セ後・ 綱ニ綱ニ綱シ縹ケ縹ヲ蜚企勁縹輔 | 縹俱コ亥ヨ壹ニ縹・
隴ヲ蜻・ [opt
ions] 縹ヲ綱シ縹ニ綱・ ヨ 蛟、8縹ツ蜻・ ヌ「縹輔 | 縹ヲ縹・ ※縹ヲ雁セ後・ 綱ニ綱ニ綱シ縹ケ縹ヲ蜚企勁縹輔 | 縹俱コ亥ヨ壹ニ縹・
隴ヲ蜻・ [options]
蜻・ ヌ「縹輔 | 縹縹が綱励す 綱ヲ綱ヲ縹ヲ縹、縹・ ※縹ヨ隴ヲ蜻翫 r 隴ヲ縹コ縹励↑縹・ h 縹・ ↓縹ハ k 縹ヲ縹ヲ縹・ Xlint:縹ニ綱励す 綱ヲ綱ヲ縹ヲ縹ヲ逕
ヲ縹励 ヲ縹ハ・
隴ヲ蜻・ 蛟・

> Task :run
SLF4J: Failed to load class "org.slf4j.impl.StaticLoggerBinder".
SLF4J: Defaulting to no-operation (NOP) logger implementation
SLF4J: See http://www.slf4j.org/codes.html#StaticLoggerBinder for further details.

Deprecated Gradle features were used in this build, making it incompatible with Gradle 8.0.

You can use '--warning-mode all' to show the individual deprecation warnings and determine if they come from your own sc
ripts or plugins.

See https://docs.gradle.org/7.6/userguide/command_line_interface.html#sec:command_line_warnings

BUILD SUCCESSFUL in 14s
2 actionable tasks: 2 executed
```

Let's use sample app

how to get information from database

Try 1 : Get player information from database

Successful output: You can see a similar output as below

```
{"id": 1, "name": "Yamada Taro", "credit_limit": 10000, "credit_total": 0}
```

```
PS C:\scalardb-samples\multi-storage-transaction-sample> ./gradlew run --args="GetCustomerInfo 1"
```

```
> Task :run
```

```
SLF4J: Failed to load class "org.slf4j.impl.StaticLoggerBinder".
```

```
SLF4J: Defaulting to no-operation (NOP) logger implementation
```

```
SLF4J: See http://www.slf4j.org/codes.html#StaticLoggerBinder for further details.
```

```
{"id": 1, "name": "Yamada Taro", "credit_limit": 10000, "credit_total": 0}
```

```
Deprecated Gradle features were used in this build, making it incompatible with Gradle 8.0.
```

```
You can use '--warning-mode all' to show the individual deprecation warnings and determine if they come from your own scripts or plugins.
```

```
See https://docs.gradle.org/7.6/userguide/command\_line\_interface.html#sec:command\_line\_warnings
```

```
BUILD SUCCESSFUL in 8s
```

```
2 actionable tasks: 1 executed, 1 up-to-date
```

Try 2 : customer order

Then, customer (ID 1) place an order for three apples and two oranges by running the following command:

```
PS C:\scalardb-samples\multi-storage-transaction-sample> ./gradlew run --args="PlaceOrder 1 1:3,2:2"
```

```
> Task :run
SLF4J: Failed to load class "org.slf4j.impl.StaticLoggerBinder".
SLF4J: Defaulting to no-operation (NOP) logger implementation
SLF4J: See http://www.slf4j.org/codes.html#StaticLoggerBinder for further details.
{"order_id": "4913664c-06db-4ca4-a010-b168ec641ae5"}
```

```
Deprecated Gradle features were used in this build, making it incompatible with Gradle 8.0.
```

```
You can use '--warning-mode all' to show the individual deprecation warnings and determine if they come from your own scripts or plugins.
```

```
See https://docs.gradle.org/7.6/userguide/command_line_interface.html#sec:command_line_warnings
```

```
BUILD SUCCESSFUL in 8s
2 actionable tasks: 1 executed, 1 up-to-date
```


Try 3 :

This is error output

```
PS C:\scalardb-samples\multi-storage-transaction-sample> ./gradlew run --args="GetOrder <1>"

> Task :run
SLF4J: Failed to load class "org.slf4j.impl.StaticLoggerBinder".
SLF4J: Defaulting to no-operation (NOP) logger implementation
SLF4J: See http://www.slf4j.org/codes.html#StaticLoggerBinder for further details.
java.lang.RuntimeException: Order not found
    at sample.Sample.getOrderJson(Sample.java:243)
    at sample.Sample.getOrderById(Sample.java:315)
    at sample.command.GetOrderCommand.call(GetOrderCommand.java:17)
    at sample.command.GetOrderCommand.call(GetOrderCommand.java:8)
    at picocli.CommandLine.executeUserObject(CommandLine.java:2041)
    at picocli.CommandLine.access$1500(CommandLine.java:148)
    at picocli.CommandLine$RunLast.executeUserObjectOfLastSubcommandWithSameParent(CommandLine.java:2461)
    at picocli.CommandLine$RunLast.handle(CommandLine.java:2453)
    at picocli.CommandLine$RunLast.handle(CommandLine.java:2415)
    at picocli.CommandLine$AbstractParseResultHandler.execute(CommandLine.java:2273)
    at picocli.CommandLine$RunLast.execute(CommandLine.java:2417)
    at picocli.CommandLine.execute(CommandLine.java:2170)
    at sample.command.SampleCommand.main(SampleCommand.java:35)

Deprecated Gradle features were used in this build, making it incompatible with Gradle 8.0.

You can use '--warning-mode all' to show the individual deprecation warnings and determine if they come from your own scripts or plugins.

See https://docs.gradle.org/7.6/userguide/command_line_interface.html#sec:command_line_warnings

BUILD SUCCESSFUL in 6s
2 actionable tasks: 1 executed, 1 up-to-date
```

The last

docker-compose down

exit

```
PS C:\scalardb-samples\multi-storage-transaction-sample> docker-compose down
time="2024-07-17T10:21:07+09:00" level=warning msg="C:\\scalardb-samples\\multi-storage-transaction-sample\\docker-compo
se.yml: 'version' is obsolete"
[+] Running 3/3
 ✓ Container cassandra-1      Removed                2.9s
 ✓ Container mysql-1          Removed                1.6s
 ✓ Network multi-storage-transaction-sample_default Removed            0.2s
PS C:\scalardb-samples\multi-storage-transaction-sample> exit
```

Appendix

Cannot load schema

`./gradlew run --args="LoadInitialData" → error`

Check java version and reload schema (step 5)

```
PS C:\scalardb-samples\multi-storage-transaction-sample> java -version
java version "21.0.4" 2024-07-16 LTS
Java(TM) SE Runtime Environment (build 21.0.4+8-LTS-274)
Java HotSpot(TM) 64-Bit Server VM (build 21.0.4+8-LTS-274, mixed mode, sharing)
```

Check your environment path "JAVA_HOME"