

Working with JPQL



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Overview

Examine JPQL and its capabilities

Operations using JPQL



Java Persistence Query Language

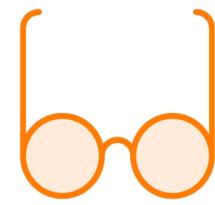
Objects

Attributes

Relationships



JPQL Operations



Reading



Bulk updates

DELETE

Deletes



SELECT Queries



Single object



List of objects



Array of objects

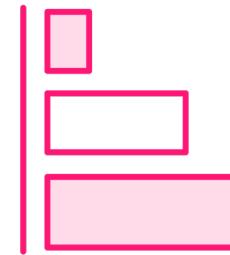


Syntax of SELECT

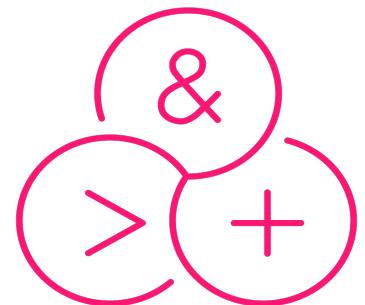
```
select_statement ::=  
    select_clause  
    from_clause  
    [where_clause]  
    [groupby_clause]  
    [having_clause]  
    [orderby_clause]
```



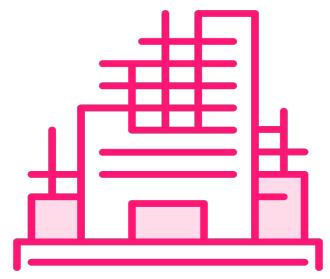
SELECT Clause



Object and attributes expressions



Functions and aggregation functions



Constructors



Reading Object Clauses

FROM

WHERE

ORDER BY

GROUP BY

HAVING



Updating Objects

Bulk update of entities

Single entity type

**Equivalent to SQL UPDATE, with
JPQL conditional expressions**

**No joins, supports sub-selects in
WHERE**



Removing Objects

Bulk removal of entities

Equivalent to SQL DELETE, with JPQL conditional expressions

No joins, supports sub-selects in WHERE

Polymorphic

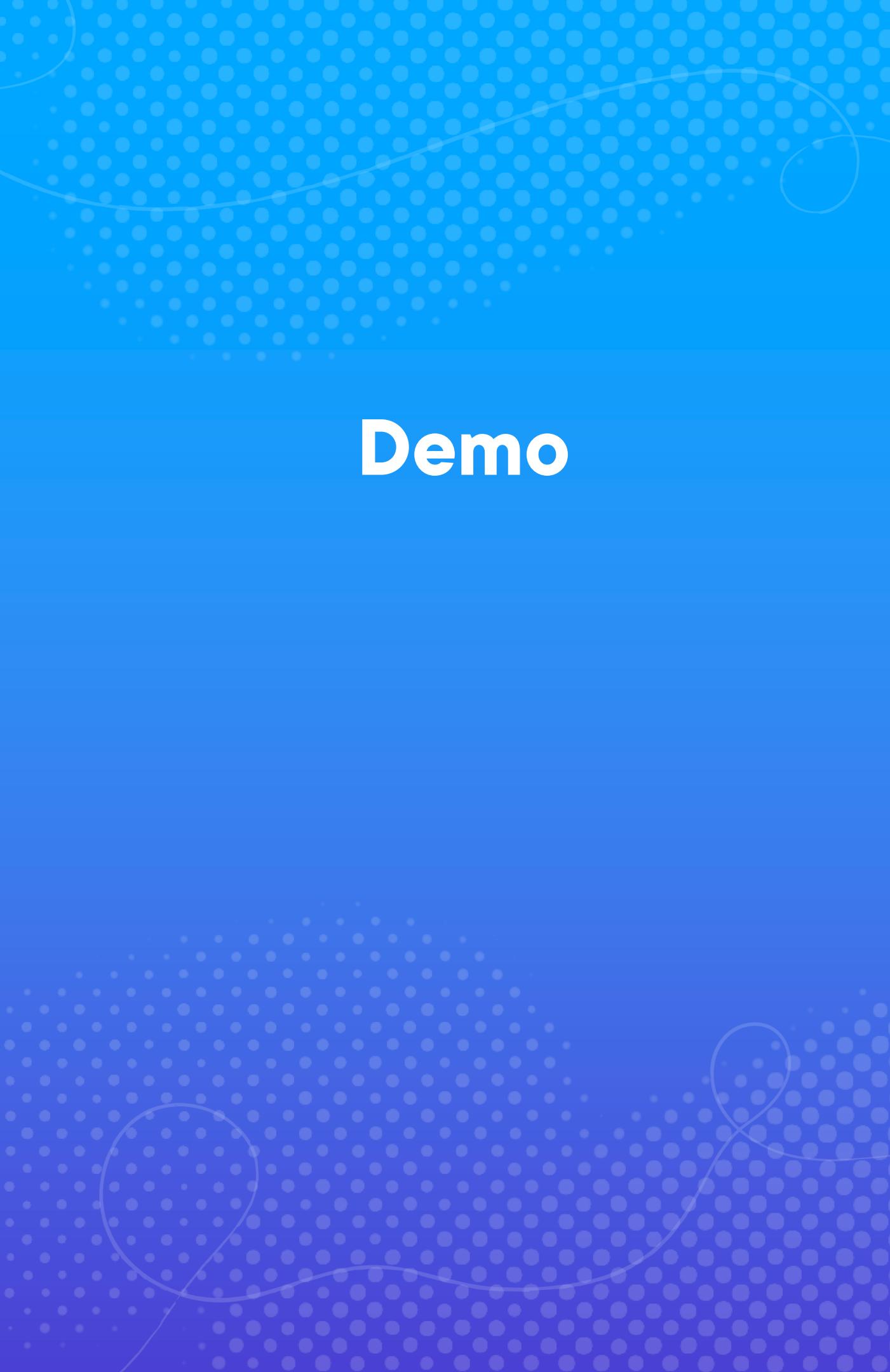


Query API

`jakarta.persistence.Query`

`jakarta.persistence.TypedQuery`





Demo

Working with Simple JPQL Queries

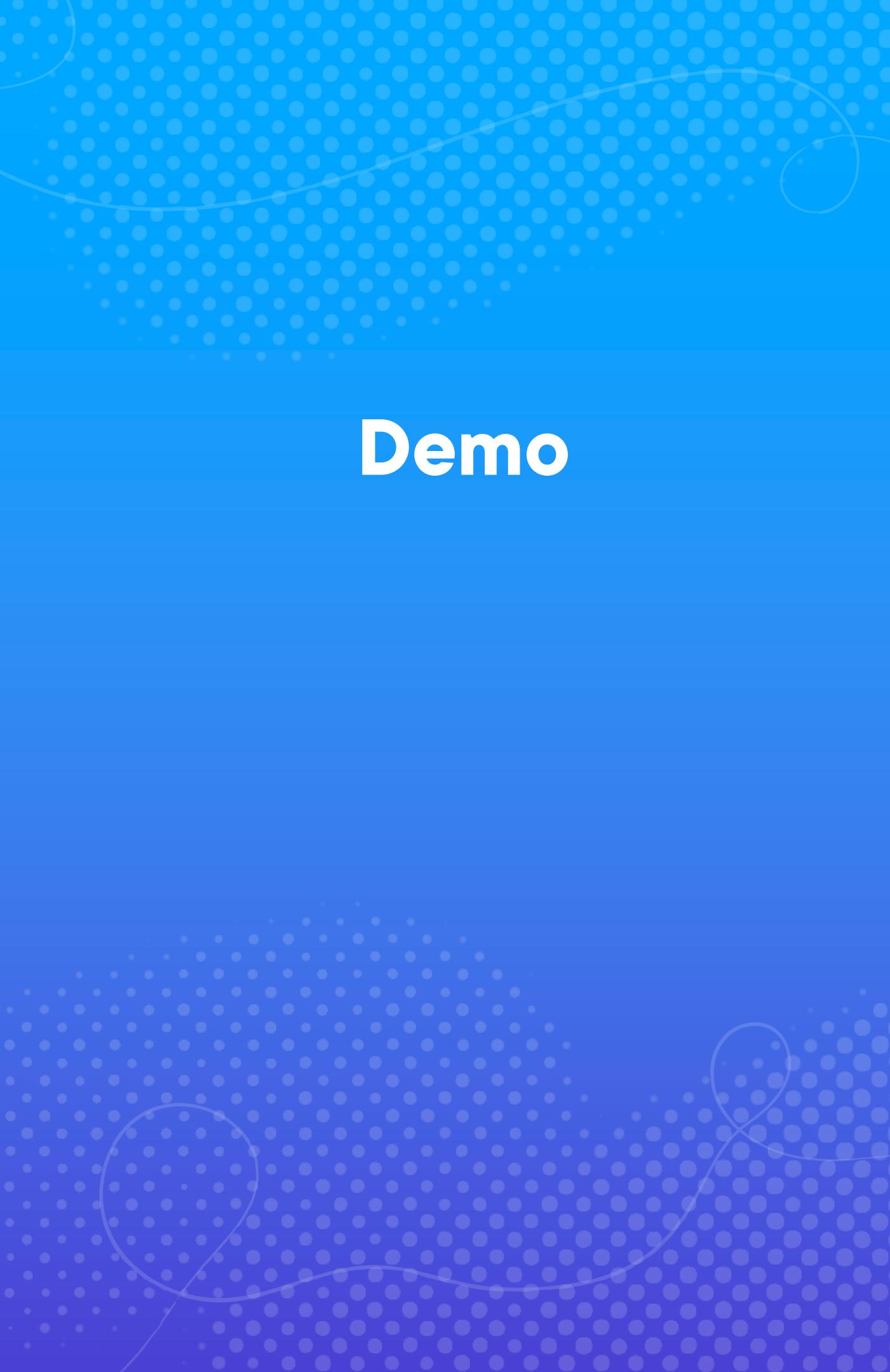


Demo

Named queries

Queries that return single results





Demo

Parameterized queries



Demo

Updating and deleting with JPQL



Summary

JPQL and its capabilities

Operations using JPQL

- Reading
- Updating
- Deleting

Demonstrated various JPQL queries

