# Use the Join Clause to Combine Two Collections



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Perform an equijoin (inner join) between collections

Create one-to-many using group join

Simulate a left outer join

## **Inner Join**



## **Equijoin / Inner Join**

An equijoin
(an inner join in SQL)

Two or more collections needed

At least one property in each must share equal values

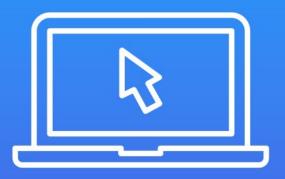






**Inner join** 





Inner join using two fields

## Join Into



#### Join Into

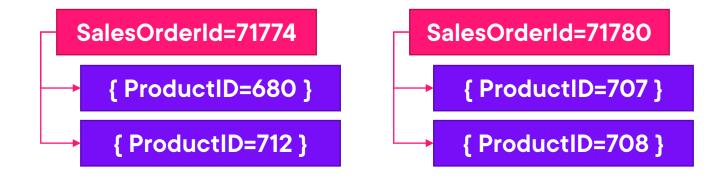
Create new object with Sales collection for each Product

Query syntax uses 'join' and 'into' keywords

Method syntax uses GroupJoin()

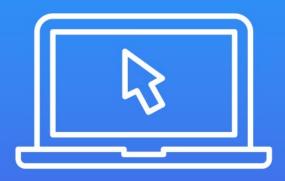


#### **Join Into**



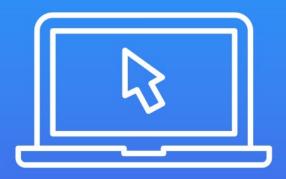






**Query syntax uses 'into'** 

### Demo



**Method syntax uses GroupJoin()** 

## **Left Outer Join**



## Left Outer Join (Query Syntax)

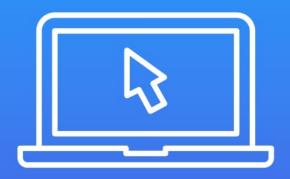
Inner join using 'into' and a second 'from' statement

A null object may be returned for "right" collection

Use DefaultIfEmpty()
method for "right"
collection







Left outer join using query syntax

## Left Outer Join (Method Syntax)

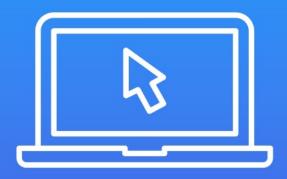
SelectMany()
method to select the
'right' collection

Where() method to filter what is selected in 'right' collection

Use DefaultIfEmpty()
method for "right"
collection



### Demo



**Left outer join for method syntax** 

## **Module Summary**



The join clause combines two or more collections

Syntax can be different from query to method syntax

**GroupJoin() method creates a one-to-many object** 

Use SelectMany() and DefaultIfEmpty() to simulate outer join



**Up Next:** 

# Use the Group Clause to Produce Grouped Collections

