

Mapping of Hierarchical Record Structures

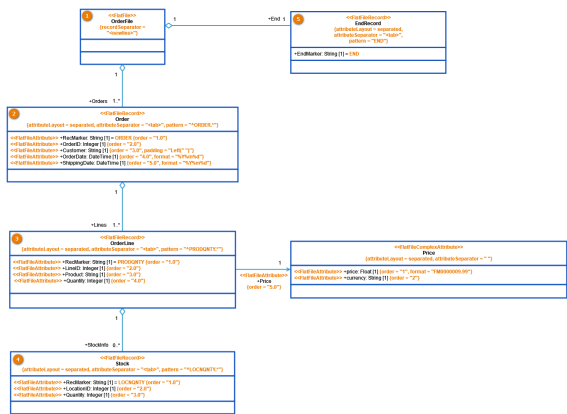
Flat files can have a hierarchical record structure, meaning that the file contains different record types. This structure can be expressed by associations between **FlatFileRecord** classes.

FlatFileAdapter_Hierarchic_Example



Click the icon to download a simple example model that shows how to compose a hierarchic flat file with the Flat File adapter in **Scheer PAS Designer**.

For example, this is an order file class structure for a file containing orders, order lines and stock data:



The flat file parser identifies each **FlatFileRecord** class by a regular expression found in the tagged value **pattern**. This pattern applies to the complete record (data line of the file). If the classes are placed in a hierarchical order, the flat file records must follow this order to be parsed correctly. If they do not, the parser stops at the first record not matching the expected pattern.

Flat File Record	Pattern	Description
2 Order	^ORDER . *	All record lines starting with ORDER are Order records.
3 OrderLine	^PRODQNTY . *	All record lines starting with PRODQNTY are OrderLine records.
4 Stock	^LOCNQNTY . *	All record lines starting with LOCNQNTY are Stock records.
5 EndRecord	END	All records containing END are EndRecords .

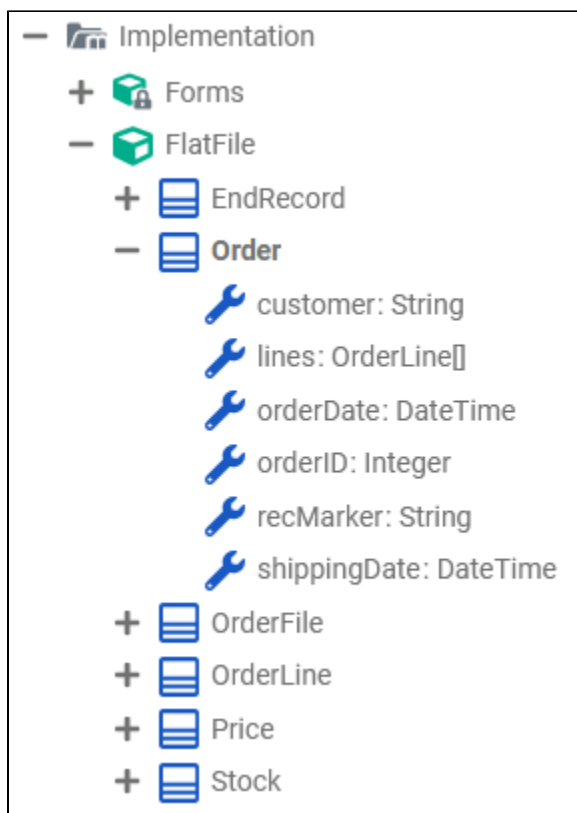
You can realize the hierarchical structure as classes in the **Implementation** folder:

Related Pages:

- [Flat File Adapter Reference](#)
- [Parsing Flat Files](#)

Other Common Flat File Issues:

- [Flat File With Header Lines](#)
- [Handling Empty Lines When Composing a Flat File](#)
- [Handling of White Spaces When Parsing Flat Files With Fixed Length](#)
- [Handling Quotes When Composing a Flat File](#)
- [Mapping of Hierarchical Record Structures](#)
- [Parsing Flat File Records Without Data](#)
- [Using Patterns to Separate Attributes](#)



An example file for this structure could be the following:

ORDER	1234	Winter & Partners	20230531	20230601
PRODQNTY	1	AF-1300 3	0000067.5 USD	
LOCNQNTY	204	10		
PRODQNTY	2	RC-0003 1	0000075. USD	
LOCNQNTY	202	3		
LOCNQNTY	204	4		
LOCNQNTY	211	3		
PRODQNTY	3	MX-60 1	0000730. USD	
LOCNQNTY	202	2		
LOCNQNTY	207	3		
ORDER	1235	Spring Corp.	20230502	20230524
PRODQNTY	1	MX-40 1	0000690. USD	
LOCNQNTY	207	3		
LOCNQNTY	211	4		
END				