Common Lisp Reference Manual

Table of Contents

1	Introduction 1
2	Terminology and conventions 2 2.1 Introduction 2 2.2 General 2
3	Numbers 3 3.1 Introduction 3
4	Cons cells
5	Sequences 5 5.1 Introduction 5 5.2 Lists 5 5.2.1 Standard functions, macros, and special operators on lists 5 5.3 Vectors 5
6	Structures 6
7	Generalized references
8	Standard functions, macros, and special operators
9	Standard types and classes 9
Т	adox 10

1 Introduction

You are reading the Common Lisp Reference Manual.

The purpose of this document is to be a complete discription of all of ANSI Common Lisp. It differs from the Common Lisp standard or the Common Lisp HyperSpec, in that it is completely free (though I haven't figured out the details of the licensing yet, it will probably be something like the GNU free documentation license.

It also differs from those two documents in other ways. For one thing, it will have a very detailed index, and much better cross references than the CLHS. It will also have many more commented examples, giving it a more pedagogic purpose than the CLHS.

2 Terminology and conventions

- 2.1 Introduction
- 2.2 General

3 Numbers

3.1 Introduction

4 Cons cells

Return the car of a cons cell See [Standard function car], page 8

Return the cdr of a cons cell See [Standard function cdr], page 8

5 Sequences

5.1 Introduction

5.2 Lists

CL lists are made up of $cons\ cells$ See Chapter 4 [Cons cells], page 4 linked by their cdr See $\langle undefined \rangle$ [cdr], page $\langle undefined \rangle$ fields. If the cdr field of the last cons cell in the sequence has the value NIL, then we say that the list is a $proper\ list$. Otherwise, we say that it is a $dotted\ list$ because of the way the printer See $\langle undefined \rangle$ [printer], page $\langle undefined \rangle$ displays such a list.

5.2.1 Standard functions, macros, and special operators on lists

Return the first element of a list See [Standard function car], page 8

Return the list except its first element See [Standard function cdr], page 8

5.3 Vectors

6 Structures

7 Generalized references

8 Standard functions, macros, and special operators

car

car (object) [function]

If object is a cons cell See \langle undefined \rangle [cons cell], page \langle undefined \rangle , return its car. If object is NIL, return NIL. In all other cases, signal a condition.

 cdr

cdr (object) [function]

If object is a cons cell See (undefined) [cons cell], page (undefined), return its cdr. If object is NIL, return NIL. In all other cases, signal a condition.

9 Standard types and classes

Index

\mathbf{A}	N	
Array, one-dimensional (also known as a vector)	Numbers	3
D Dotted list	Proper list	5
Generalized reference	Reference, generalized	7
L List5	Structure	6
List, dotted 5 List, proper 5	V Vector	5