

# Package ‘ctf’

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**Type** Package

**Title** Read and Write Column Text Format (CTF)

**Version** 0.1.0

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**Depends** R (>= 3.1.0)

**Imports** jsonlite, iotools

**Suggests** roxygen2, knitr, rmarkdown, testthat

## Description

Column Text Format (CTF) is a new tabular data format designed for simplicity and performance. CTF is the simplest column store you can imagine: plain text files for each column in a table, and a metadata file.

The underlying plain text means the data is human readable and familiar to programmers, unlike specialized binary formats.

CTF is faster than row oriented formats like CSV when loading a subset of the columns in a table.

This package provides functions to read and write CTF data from R.

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**URL** <https://github.com/julianofernandez/ctf>

**BugReports** <https://github.com/julianofernandez/ctf>

**VignetteBuilder** knitr

**RoxygenNote** 7.1.1

**NeedsCompilation** no

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**Repository** CRAN

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## Contents

read.ctf	2
write.ctf	3

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read.ctf	<i>Read CTF data</i>
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### Description

Read external CTF data into the corresponding R data frame.

### Usage

```
read.ctf(location, columns, nrows)
```

### Arguments

location	location of the CTF data, either a file path to a CTF metadata JSON file, or a directory containing a single CTF metadata JSON file.
columns	names of the columns to read. If missing, then read in all columns.
nrows	integer, the maximum number of rows to read in. If missing, then read in all rows.

### Value

data frame

### See Also

[write.ctf](#) to write CTF

### Examples

```
# An example CTF metadata file included in this package
d <- system.file("extdata", "vgsales", "vgsales-metadata.json", package = "ctf")

# Read all the rows and columns
vgsales <- read.ctf(d)

# Read 10 rows of two columns, Name and Rank
vgsales2 <- read.ctf(d, columns = c("Name", "Rank"), nrows = 10)
```

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write.ctf	<i>Write Data Frame To CTF</i>
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**Description**

Save a data frame using Column Text Format

**Usage**

```
write.ctf(x, datadir = name, name = deparse(substitute(x)), ...)
```

**Arguments**

x	data frame to write
datadir	directory to write the metadata and CTF columns
name	table name
...	further arguments to <a href="#">write.table.raw</a>

**Value**

NULL, used for its side effect

**See Also**

[read.ctf](#) to read CTF, [write.table.raw](#) for the underlying functionality, and [save](#) for writing any R objects.

**Examples**

```
d <- file.path(tempdir(), "iris_ctf_data")
write.ctf(iris, d)

# Same object as iris, but carries around some extra metadata
iris2 <- read.ctf(d)

# This directory contains plain text files for each column in iris
list.files(d)

# Clean up
unlink(d, recursive = TRUE)
```

# Index

`read.ctf`, [2](#), [3](#)

`save`, [3](#)

`write.ctf`, [2](#), [3](#)

`write.table.raw`, [3](#)