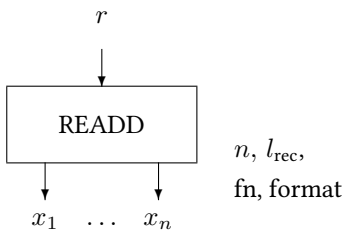
Block READDD

The READD reads data from a file with direct access.





Name	READD
Function	fb0016
Inputs	1
Outputs	1 . . . [1000]
Parameters	1 . . . [2]
Strings	2
Group	S

Inputs

1	Record number r

Outputs

1	Any value x_1 read from file fn
2	Any value x_2 read from file fn
n	Any value x_n read from file fn with $n \leq 200$

Parameters

1	Number n of values to be read per record
2	Record length l_{rec}

Strings

1	File name fn (can contain qualifiers)
2	Fortran format

Remarks

Integers must be read in format Fx.0, where x is the number of bytes.

All records of file fn must have the same physical record length.

ATTENTION: Different operating systems use different line endings. Windows file records end with two bytes, a carriage return and a line feed character, referred to as CRLF, Unix files have a LF ending, and macOS uses a carriage return character CR. Incompatible line endings result in a read file error message.

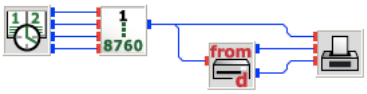
meteo82.dat

The next lines show the first ten records of a data file `meteo82.dat` which can be found in the `examples/data` directory.

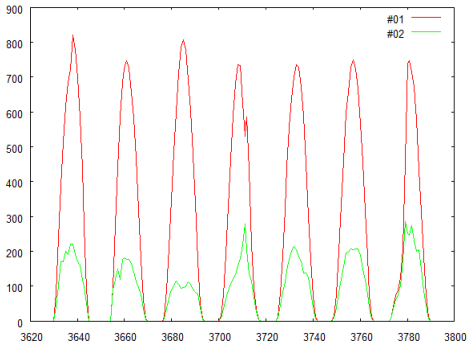
```
 1 182 1   0.   0.   0.   0.   0.  4.5-40.  -40.0-40.0 265.  4.4
 1 182 2   0.   0.   0.   0.   0.  3.8-40.  -40.0-40.0 255.  4.3
 1 182 3   0.   0.   0.   0.   0.  3.4-40.  -40.0-40.0 255.  2.8
 1 182 4   0.   0.   0.   0.   0.  3.1-40.  -40.0-40.0 225.  2.3
 1 182 5   0.   0.   0.   0.   0.  3.0-40.  -40.0-40.0 225.  2.6
 1 182 6   0.   0.   0.   0.   0.  2.9-40.  -40.0-40.0 225.  3.0
 1 182 7   0.   0.   0.   0.   0.  3.2-40.  -40.0-40.0 225.  1.9
 1 182 8   0.   0.   0.   0.   0.  2.8-40.  -40.0-40.0 205.  2.5
 1 182 9   0.   0.   1.   0.   0.  2.3-40.  -40.0-40.0 205.  2.4
 1 18210  15.   6.   6.   3.   0.  2.7-40.  -40.0-40.0 195.  3.0
```

The complete file contains 8760 records of meteorological data, which have been measured in Oldenburg, Germany in the year 1982.

readd.vseit



A CLOCK block runs through the first seven days of June, 1982 in steps of one hour as specified by the parameters. The Gregorian date is converted to the hour-of-the-year signal by a HOY block, used as input to plot the hourly data by the PLOT block. The READD block uses the Fortran format `(8X,2F5.0,46X)` in order to read columns 9–14 an 15–20, which contain global and diffuse irradiance data in W/m^2. A PLOT block is used to display the data.



See also Blocks READ, READN, and WRITE.