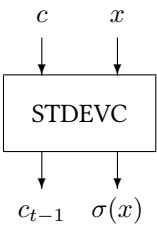


### Block STDEVC

The STDEVC block calculates the standard deviation of its second input signal as long as the condition input remains constant. When this input changes its value, the standard deviation is on output and the successors of the block are executed.



|                   |              |
|-------------------|--------------|
| <b>Name</b>       | STDEVC       |
| <b>Function</b>   | fb0037       |
| <b>Inputs</b>     | 2 . . . [51] |
| <b>Outputs</b>    | 2 . . . [51] |
| <b>Parameters</b> | 0            |
| <b>Strings</b>    | 0            |
| <b>Group</b>      | I            |

Inputs

- 1 Condition input  $c$
- 2 Any signal  $x_1$
- $n$  Any signal  $x_{n-1}$

Outputs

- 1 Condition input  $c$  delayed by one step
- 2 Standard deviation  $\sigma(x_1)$  over all  $c = \text{const}$  calls
- $n$  Standard deviation  $\sigma(x_{n-1})$  over all  $c = \text{const}$  calls

Parameters

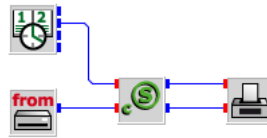
None

Strings

None

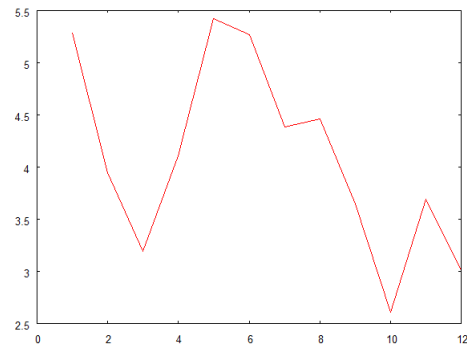
For a description of the calculation of the standard deviation, see block [STDEV](#).

`stdevc.vseit`



A [CLOCK](#) block runs a [READ](#) block to read ambient temperature data from file `temperature.dat` located in the `examples/data` directory.

The [STDEV](#) block calculates the monthly values for the standard deviation of the irradiance which varies around 4 degrees Celsius as displayed by the [PLOT](#) block.



See also Blocks [STDEV](#) and [STDEVP](#).