

# VciRingInitiatorWrapper

## 1) Functional Description

This hardware component connects a VCI initiator to a RING interconnect. It can be used in conjunction with the [VciRingTargetWrapper](#) component to build a RING interconnect. This type of interconnect is well suited for FPGA implementations.

## 2) Component definition & usage

[source:trunk/soclib/soclib/module/network\\_component/vci\\_ring\\_initiator\\_wrapper/caba/metadata/vci\\_ring\\_initiator\\_wrapper](#)

## 3) CABA Implementation

### CABA sources

- interface :  
[source:trunk/soclib/soclib/module/network\\_component/vci\\_ring\\_initiator\\_wrapper/caba/source/include/vci\\_ring\\_initiator\\_wrapper.h](#)
- implementation :  
[source:trunk/soclib/soclib/module/network\\_component/vci\\_ring\\_initiator\\_wrapper/caba/source/src/vci\\_ring\\_initiator\\_wrapper.cpp](#)

### CABA Constructor parameters

```
VciRingInitiatorWrapper(sc_module_name  insname,           // instance name
                        bool             alloc_init,        // default token owner
                        const int        &wrapper_fifo_depth, // command and response fifo depth
                        const soclib::common::MappingTable &mt, // mapping table
                        const soclib::common::IntTab &ringid, // Global subsystem index
                        const int &srcid);                  // attached initiator index
```

### CABA Ports

- `sc_in<bool> p_clk;` *Global System Clock*
- `sc_in<bool> p_resetn;` *Global System reset*
- `soclib::caba::RingIn p_ring_in;` *Ring input port*
- `soclib::caba::RingOut p_ring_out;` *Ring output port*
- `soclib::caba::VciTarget<vci_param> p_vci;` *VCI target port*

## 4) TLM-T Implementation

The TLM-T implementation is not yet available.