

Robotics Service Bus - Bug #1488

Socket transport between cpp and cl mostly fails on mac

05/07/2013 11:39 AM - J. Wienke

Status:	Resolved	Start date:	05/07/2013
Priority:	Normal	Due date:	
Assignee:	J. Moringen	% Done:	100%
Category:	Socket Transport	Estimated time:	0.00 hour
Target version:	rsb-0.10		

Description

I am not sure whether this is a bug of the cl rsb implementation of of the logger, but I observe the following difference in behavior:
I have the following setup using the socket transport:

1. One logger just to provide the bus server for the socket transport
2. A bag-play process for replay
3. The cpp timesync application to synchronize some of the replayed scopes

Most of the time the timesync component does not receive any events, even though it correctly identified the existing bus server.

```
languitar@miles:~/work/src/rsb-tools-cpp/build-master/src/timesync$ ./timesync --strategy timeframe --primscope
/monitoring/augit/volhumavipsreleasesy3demobinrsbvfoacomponent/ --supscope /my --outscope /sync/vfoa
1367919298693 rsb.factory [INFO]: Registering default implementations
1367919298693 rsb.converter.repository [INFO]: Registering converter *rsb::converter::BoolConverter[wireType = std::string,
wireSchema = bool, dataType = bool] at 0x7f9051d018d0
1367919298693 rsb.converter.repository [INFO]: Registering converter *rsb::converter::ByteArrayConverter[wireType =
std::string, wireSchema = *, dataType = bytearray] at 0x7f9051d01770
1367919298693 rsb.converter.repository [INFO]: Registering converter *EventIdConverter[wireType = std::string, wireSchema
= .rsb.protocol.EventId, dataType = rsb::EventId] at 0x7f9051d01d80
1367919298693 rsb.converter.repository [INFO]: Registering converter *rsb::converter::StringConverter[wireType = std::string,
wireSchema = utf-8-string, dataType = std::string] at 0x7f9051d01f40
1367919298693 rsb.converter.repository [INFO]: Registering converter *rsb::converter::UInt64Converter[wireType = std::string,
wireSchema = uint64, dataType = unsigned long long] at 0x7f9051d02360
1367919298694 rsb.converter.repository [INFO]: Registering converter *rsb::converter::VoidConverter[wireType = std::string,
wireSchema = void, dataType = void] at 0x7f9051d023b0
1367919298694 rsb.transport.connectorfactory<rsb::transport::inpushconnector> [INFO]: Registering connector inprocess for
schemas {inprocess}
1367919298694 rsb.transport.connectorfactory<rsb::transport::inpushconnector> [INFO]: Registering connector spread for
schemas {spread}
1367919298694 rsb.transport.connectorfactory<rsb::transport::inpushconnector> [INFO]: Registering connector socket for
schemas {socket}
1367919298694 rsb.transport.connectorfactory<rsb::transport::inpullconnector> [INFO]: Registering connector inprocess for
schemas {inprocess}
1367919298694 rsb.transport.connectorfactory<rsb::transport::inpullconnector> [INFO]: Registering connector spread for
schemas {spread}
1367919298694 rsb.transport.connectorfactory<rsb::transport::inpullconnector> [INFO]: Registering connector socket for
schemas {socket}
1367919298694 rsb.transport.connectorfactory<rsb::transport::outconnector> [INFO]: Registering connector inprocess for
schemas {inprocess}
1367919298694 rsb.transport.connectorfactory<rsb::transport::outconnector> [INFO]: Registering connector spread for
schemas {spread}
1367919298694 rsb.transport.connectorfactory<rsb::transport::outconnector> [INFO]: Registering connector socket for
schemas {socket}
1367919298694 rsb.factory [INFO]: Processing plugin configuration
```

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1367919298694 rsc.config.configfilesource [TRACE]: Option #(transport, spread, enabled) -> 0
1367919298694 rsc.config.configfilesource [TRACE]: Option #(transport, inprocess, enabled) -> 0
1367919298694 rsc.config.configfilesource [TRACE]: Option #(transport, socket, enabled) -> 1
1367919298694 rsc.config.configfilesource [TRACE]: Option #(rsc, logging, LEVEL) -> ALL
1367919298694 rsc.plugins.configurator [DEBUG]: Processing option #(rsc, logging, LEVEL) = `ALL`
1367919298694 rsc.plugins.configurator [DEBUG]: Processing option #(transport, inprocess, enabled) = `0`
1367919298694 rsc.plugins.configurator [DEBUG]: Processing option #(transport, socket, enabled) = `1`
1367919298694 rsc.plugins.configurator [DEBUG]: Processing option #(transport, spread, enabled) = `0`
1367919298694 rsc.plugins.configurator [INFO]: No searchpath configured; using default: #("/Users/languitar/.rsb0.9/plugins",
"/usr/local/lib/rsb0.9/plugins")
1367919298694 rsc.plugins.manager [INFO]: Adding path "/Users/languitar/.rsb0.9/plugins"
1367919298694 rsc.plugins.manager [INFO]: Ignoring non-existent path `"/Users/languitar/.rsb0.9/plugins"
1367919298694 rsc.plugins.manager [INFO]: Adding path "/usr/local/lib/rsb0.9/plugins"
1367919298694 rsc.plugins.manager [INFO]: Ignoring non-existent path `"/usr/local/lib/rsb0.9/plugins"
1367919298694 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {},
options = p{ enabled: "0" }]
1367919298694 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options
= p{ enabled: "0" }]
1367919298694 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {},
options = p{ enabled: "0" }]
1367919298694 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options
= p{ enabled: "0" }]
1367919298695 rsc.config.configfilesource [TRACE]: Option #(transport, spread, enabled) -> 0
1367919298695 rsc.config.configfilesource [TRACE]: Option #(transport, inprocess, enabled) -> 0
1367919298695 rsc.config.configfilesource [TRACE]: Option #(transport, socket, enabled) -> 1
1367919298695 rsc.config.configfilesource [TRACE]: Option #(rsc, logging, LEVEL) -> ALL
1367919298695 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {},
options = p{ enabled: "0" }]
1367919298695 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options
= p{ enabled: "0" }]
1367919298695 rsb.factory [DEBUG]: Default config rsb::ParticipantConfig[qosSpec = QualityOfServiceSpec[ordering = 10,
reliability = 20], errorStrategy = 0, transports = {Transport[name = socket, converters = {}, options = p{ enabled: "1" }],
Transport[name = spread, converters = {}, options = p{ enabled: "0" }], Transport[name = inprocess, converters = {}, options =
p{ enabled: "0" }]}, eventReceivingStrategy = rsb::ParticipantConfig::EventProcessingStrategy[name = parallel, options = p{ }],
eventSendingStrategy = rsb::ParticipantConfig::EventProcessingStrategy[name = direct, options = p{ }], options = p{ }]
1367919298695 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {},
options = p{ enabled: "0" }]
1367919298695 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options
= p{ enabled: "0" }]
1367919298695 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {},
options = p{ enabled: "0" }]
1367919298695 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options
= p{ enabled: "0" }]
1367919298695 rsb.factory [DEBUG]: Trying to add connector Transport[name = socket, converters = {}, options = p{
converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }]
1367919298695 rsb.factory [DEBUG]: Supplied connector options p{ converters:
<boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }
1367919298695 rsb.transport.socket.outconnector [DEBUG]: Creating OutConnector with properties p{ converters:
<boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }

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1367919298695 rsb.eventprocessing.outrouteconfigurator [DEBUG]: Adding connector *rsb::transport::socket::OutConnector[] at 0x7f9051d06790

1367919298695 rsb.eventprocessing.outrouteconfigurator [DEBUG]: Activating

1367919298695 rsb.transport.socket.connectorbase [DEBUG]: Activating

1367919298695 rsb.transport.socket.connectorbase [INFO]: Server mode: auto

1367919298695 rsb.transport.socket.factory [INFO]: Started service thread

1367919298695 rsb.transport.socket.factory [DEBUG]: Was asked for a bus server for localhost:55555

1367919298695 rsb.transport.socket.factory [DEBUG]: Did not find bus server; creating a new one

1367919298695 rsb.transport.socket.busserver [INFO]: Listening on 0.0.0.0:55555

1367919298696 rsb.transport.socket.bus [DEBUG]: Adding connector 0x7f9051d06700

1367919298696 rsb.transport.socket.factory [DEBUG]: Created new bus client *rsb::transport::socket::BusServer[connections = [], sinks = {}] at 0x7f9051d07920

1367919298696 rsb.transport.socket.connectorbase [DEBUG]: Using bus *rsb::transport::socket::BusServer[connections = [], sinks = {}] at 0x7f9051d07920

1367919298696 rsb.eventprocessing.outrouteconfigurator [DEBUG]: Adding connector *rsb::transport::socket::OutConnector[] at 0x7f9051d06790 to strategy *rsb::eventprocessing::DirectEventSendingStrategy[connectors = []] at 0x7f9051d08460

1367919298696 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {}, options = p{ enabled: "0" }]

1367919298696 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options = p{ enabled: "0" }]

1367919298696 rsb.factory [DEBUG]: Trying to add connector Transport[name = socket, converters = {}, options = p{ converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }]

1367919298696 rsb.factory [DEBUG]: Supplied connector options p{ converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }

1367919298696 rsb.transport.socket.inpushconnector [DEBUG]: Creating InPushConnector with properties p{ converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }

1367919298696 rsb.eventprocessing.inrouteconfigurator [DEBUG]: Adding connector *rsb::transport::socket::InPushConnector[scope = Scope[]] at 0x7f9051d08b18

1367919298696 rsb.eventprocessing.inrouteconfigurator [DEBUG]: Activating

1367919298696 rsb.transport.socket.connectorbase [DEBUG]: Activating

1367919298696 rsb.transport.socket.connectorbase [INFO]: Server mode: auto

1367919298696 rsb.transport.socket.factory [DEBUG]: Was asked for a bus server for localhost:55555

1367919298696 rsb.transport.socket.factory [DEBUG]: Found existing bus server *rsb::transport::socket::BusServer[connections = [], sinks = {}] at 0x7f9051d07920

1367919298696 rsb.transport.socket.bus [DEBUG]: Adding connector 0x7f9051d08b30

1367919298696 rsb.transport.socket.connectorbase [DEBUG]: Using bus *rsb::transport::socket::BusServer[connections = [], sinks = {}] at 0x7f9051d07920

1367919298696 rsb.transport.socket.inconnector [DEBUG]: Activating

1367919298696 rsb.transport.socket.bus [DEBUG]: Adding sink *rsb::transport::socket::InPushConnector[scope = Scope[/monitoring/audit/volhumavipsreleasesy3demobinrsbvfoacomponent/] at 0x7f9051d08b18 to scope Scope[/monitoring/audit/volhumavipsreleasesy3demobinrsbvfoacomponent/]

1367919298696 rsb.eventprocessing.pushinrouteconfigurator [DEBUG]: Instantiating event receiving strategy with config rsb::ParticipantConfig::EventProcessingStrategy[name = parallel, options = p{ }]

1367919298696 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = inprocess, converters = {}, options = p{ enabled: "0" }]

1367919298696 rsb.participantconfig [DEBUG]: Skipping disabled transport Transport[name = spread, converters = {}, options = p{ enabled: "0" }]

1367919298696 rsb.factory [DEBUG]: Trying to add connector Transport[name = socket, converters = {}, options = p{ converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }]

1367919298696 rsb.factory [DEBUG]: Supplied connector options p{ converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }

1367919298696 rsb.transport.socket.inpushconnector [DEBUG]: Creating InPushConnector with properties p{ converters: <boost::shared_ptr<rsb::converter::ConverterSelectionStrategy<std::string> >>, enabled: "1" }

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1367919298697 rsb.eventprocessing.inrouteconfigurator [DEBUG]: Adding connector
*rsb::transport::socket::InPushConnector[scope = Scope[]] at 0x7f9051d0bc08
1367919298697 rsb.eventprocessing.inrouteconfigurator [DEBUG]: Activating
1367919298697 rsb.transport.socket.connectorbase [DEBUG]: Activating
1367919298697 rsb.transport.socket.connectorbase [INFO]: Server mode: auto
1367919298697 rsb.transport.socket.factory [DEBUG]: Was asked for a bus server for localhost:55555
1367919298697 rsb.transport.socket.factory [DEBUG]: Found existing bus server
*rsb::transport::socket::BusServer[connections = [], sinks =
{Scope[/monitoring/audit/volhumavipsreleasesy3demobinrsbvfoacomponent/]: [*rsb::transport::socket::InPushConnector[scope
= Scope[/monitoring/audit/volhumavipsreleasesy3demobinrsbvfoacomponent/] at 0x7f9051d08b18]] at 0x7f9051d07920
1367919298697 rsb.transport.socket.bus [DEBUG]: Adding connector 0x7f9051d0bc20
1367919298697 rsb.transport.socket.connectorbase [DEBUG]: Using bus *rsb::transport::socket::BusServer[connections = [],
sinks = {Scope[/monitoring/audit/volhumavipsreleasesy3demobinrsbvfoacomponent/]:
[*rsb::transport::socket::InPushConnector[scope =
Scope[/monitoring/audit/volhumavipsreleasesy3demobinrsbvfoacomponent/] at 0x7f9051d08b18]] at 0x7f9051d07920
1367919298697 rsb.transport.socket.inconnector [DEBUG]: Activating
1367919298697 rsb.transport.socket.bus [DEBUG]: Adding sink *rsb::transport::socket::InPushConnector[scope =
Scope[/my/] at 0x7f9051d0bc08 to scope Scope[/my/]
1367919298697 rsb.eventprocessing.pushinrouteconfigurator [DEBUG]: Instantiating event receiving strategy with config
rsb::ParticipantConfig::EventProcessingStrategy[name = parallel, options = p{ }]

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I have no idea why, but sometime without any pattern I could find, relaunching all processes over and over again resulted in a working connection. But this happens rarely.

My python client program works without any problems with the socket transport.

Related issues:

Related to Robotics Service Bus - Enhancement # 1054: "auto" server mode is i...	New	07/02/2012
Related to Robotics Service Bus - Enhancement # 1550: "Auto" mode of the sock...	New	06/25/2013

Associated revisions

Revision 39ef934b - 08/23/2013 07:13 PM - J. Moringen

Listen on all interfaces in src/transport/socket/bus-server.lisp

fixes #1488

The other implementations already do this and it sometimes avoids problems with local bus clients.

- src/transport/socket/bus-server.lisp (header): updated copyright
- (ensure-bus-server): listen on the "all interfaces" address independently of the specified host

Revision abeb2c8a - 08/23/2013 07:39 PM - J. Moringen

Backport: Listen on all interfaces in src/transport/socket/bus-server.lisp

refs #1488

The other implementations already do this and it sometimes avoids problems with local bus clients.

- src/transport/socket/bus-server.lisp (header): updated copyright
(ensure-bus-server): listen on the "all interfaces" address independently of the specified host

History

#1 - 05/07/2013 11:43 AM - J. Wienke

I have started the logger process with log-level on trace. There is no output when the timesync should connect. If I connect any other cl or python client I see output. So I suspect that this is an issue with the C++ implementation of the transport.

#2 - 05/07/2013 01:36 PM - J. Wienke

The problem is that the cl logger listens on 127.0.0.1:55555 but cpp first tries to create a server on 0.0.0.0:55555, which succeeds, so no client is created anymore.

#3 - 07/10/2013 03:39 PM - J. Moringen

- Target version changed from *rsb-0.9* to *rsb-0.10*

#4 - 08/23/2013 08:10 PM - J. Moringen

- Status changed from *New* to *Resolved*

- % Done changed from *0* to *100*

Applied in changeset [rsb-cl|commit:39ef934b6e4678cf39c0f1be9ccb18e8b042d45a](https://source.sagemath.org/rsb-cl/commit/39ef934b6e4678cf39c0f1be9ccb18e8b042d45a).