

Smuxi - Bug # 589: remoting error since updating smuxi-server to Mono 2.10.1

Status:	Closed	Priority:	Urgent
Author:	Carlo Kok	Category:	Server
Created:	04/20/2011	Assigned to:	Mirco Bauer
Updated:	11/19/2016	Due date:	
Complexity:	High		
Found in Version:			
Subject:	remoting error since updating smuxi-server to Mono 2.10.1		
Description:	<p><pre></p> <p>Exception Type: System.InvalidCastException</p> <p>Exception Message: Object must implement IConvertible.</p> <p>Exception StackTrace:</p> <p>Server stack trace:</p> <p>at System.Convert.ChangeType(Object value, Type conversionType, IFormatProvider provider)</p> <p>at System.Runtime.Serialization.FormatterConverter.Convert(Object value, Type type)</p> <p>at System.Runtime.Serialization.SerializationInfo.GetValue(String name, Type type)</p> <p>at System.Collections.Generic.Dictionary`2.OnDeserialization(Object sender)</p> <p>at System.Runtime.Serialization.ObjectManager.RaiseDeserializationEvent()</p> <p>at System.Runtime.Serialization.Formatters.Binary.ObjectReader.Deserialize(HeaderHandler handler, __BinaryParser serParser, Boolean fCheck, Boolean isCrossAppDomain, IMethodCallMessage methodCallMessage)</p> <p>at System.Runtime.Serialization.Formatters.Binary.BinaryFormatter.Deserialize(Stream serializationStream, HeaderHandler handler, Boolean fCheck, Boolean isCrossAppDomain, IMethodCallMessage methodCallMessage)</p> <p>at System.Runtime.Remoting.Channels.CoreChannel.DeserializeBinaryResponseMessage(Stream inputStream, IMethodCallMessage reqMsg, Boolean bStrictBinding)</p> <p>at System.Runtime.Remoting.Channels.BinaryClientFormatterSink.DeserializeMessage(IMethodCallMessage mcm, ITransportHeaders headers, Stream stream)</p> <p>at System.Runtime.Remoting.Channels.BinaryClientFormatterSink.SyncProcessMessage(IMessage msg)</p>		
Exception rethrown at [0]:	<p>at System.Runtime.Remoting.Proxies.RealProxy.HandleReturnMessage(IMessage reqMsg, IMessage</p>		

```
retMsg)

    at System.Runtime.Remoting.Proxies.RealProxy.PrivateInvoke(MessageData& msgData, Int32 type)

    at Smuxi.Engine.GroupChatModel.get_Persons()

    at Smuxi.Frontend.Gnome.GroupChatView.Sync()

    at Smuxi.Frontend.Gnome.GnomeUI.<SyncChat>c__AnonStoreyA.<>m__13(Object , EventArgs )
</pre>
```

Associated revisions

07/24/2016 10:01 PM - Mirco Bauer

Frontend-GNOME: detect and report Mono <-> .NET incompatibility for remote engines (refs: #589)

Smuxi users running a smuxi-server on Mono and connecting from Windows using the Microsoft .NET framework will lead to an user-unfriendly crash dialog like this:

Exception Type:

System.InvalidCastException

Exception Message:

Object must implement IConvertible.

Exception StackTrace:

Server stack trace:

```
at System.Convert.ChangeType(Object value, Type conversionType, IFormatProvider provider)
at System.Runtime.Serialization.FormatterConverter.Convert(Object value, Type type)
at System.Runtime.Serialization.SerializationInfo.GetValue(String name, Type type)
at System.Collections.Generic.Dictionary`2.OnDeserialization(Object sender)
at System.Runtime.Serialization.ObjectManager.RaiseDeserializationEvent()
at System.Runtime.Serialization.Formatters.Binary.ObjectReader.Deserialize(HeaderHandler handler, __BinaryParser serParser, Boolean fCheck,
Boolean isCrossAppDomain, IMethodCallMessage methodCallMessage)
at System.Runtime.Serialization.Formatters.Binary.BinaryFormatter.Deserialize(Stream serializationStream, HeaderHandler handler, Boolean
fCheck, Boolean isCrossAppDomain, IMethodCallMessage methodCallMessage)
at System.Runtime.Remoting.Channels.CoreChannel.DeserializeBinaryResponseMessage(Stream inputStream, IMethodCallMessage reqMsg,
Boolean bStrictBinding)
at System.Runtime.Remoting.Channels.BinaryClientFormatterSink.SyncProcessMessage(IMessage msg)
```

Exception rethrown at [0]:

```
at System.Runtime.Remoting.Proxies.RealProxy.HandleReturnMessage(IMessage reqMsg, IMessage retMsg)
at System.Runtime.Remoting.Proxies.RealProxy.PrivateInvoke(MessageData& msgData, Int32 type)
at Smuxi.Engine.GroupChatModel.get_Persons()
at Smuxi.Frontend.Gnome.GroupChatView.Sync()
at Smuxi.Frontend.Gnome.TwitterGroupChatView.Sync()
```

The user has no hint how to proceed here. Since this is a known incompatibility since Mono 2.10 [0], we detect this condition and hint the user how to fix it.

History

04/22/2011 10:14 PM - Mirco Bauer

Are you using smuxi-server? If so, which side have you upgraded to 2.10.1?

04/22/2011 10:14 PM - Mirco Bauer

For the record: smuxi-server on mono 2.6.7 and smuxi-frontend-gnome on mono 2.10.1 works for me

04/23/2011 08:23 AM - Carlo Kok

server is:

```
[ck@buurtnet ~]$ mono --version
```

```
Mono JIT compiler version 2.10.1 (tarball Mon Apr 11 15:46:24 UTC 2011)
```

gui runs on windows (not mono). It worked before I updated the server to 2.10

04/30/2011 04:21 PM - Mirco Bauer

Carlo Kok wrote:

> server is:

>

>

```
> [ck@buurtnet ~]$ mono --version
```

```
> Mono JIT compiler version 2.10.1 (tarball Mon Apr 11 15:46:24 UTC 2011)
```

>

>

> gui runs on windows (not mono). It worked before I updated the server to 2.10

Have you installed Smuxi from source tarball or a binary package? Please check if it links .NET 2.0 by running:

```
<pre>
monodis --assemblyref smuxi-server.exe
</pre>
```

05/01/2011 07:11 AM - Carlo Kok

1: Version=2.0.0

Name=mscorlib

Flags=0x00000000

Public Key:

0x00000000: B7 7A 5C 56 19 34 E0 89

2: Version=1.2.10.0

Name=log4net

Flags=0x00000000

Public Key:

0x00000000: A5 71 5C C6 D5 C3 54 0B

3: Version=0.8.0.0

Name=smuxi-common

Flags=0x00000000

Zero sized public key

4: Version=0.8.0.0

Name=smuxi-engine

Flags=0x00000000

Zero sized public key

5: Version=2.0.0.0

Name=System.Runtime.Remoting

Flags=0x00000000

Public Key:
0x00000000: B7 7A 5C 56 19 34 E0 89
6: Version=2.0.0.0
Name=System
Flags=0x00000000
Public Key:
0x00000000: B7 7A 5C 56 19 34 E0 89

Installed from a binary package, I think the "Other" package.

05/01/2011 04:04 PM - Mirco Bauer

So Mono 2.10.1 is no longer ABI (Remoting) compatible with .NET 3.5, that is very sad. I hope this will be fixed in Mono. Can you give Mono 2.10.2 a try?

11/21/2011 02:22 AM - Mirco Bauer

- *Priority changed from Normal to Urgent*

11/24/2011 05:57 PM - Mirco Bauer

There is no known workaround yet. Mono 2.10.x broke ABI compatibility with MS .NET when it comes to the System.Collections.Generic.Dictionary<K, V> type which Smuxi makes use of. We will need a fix in Mono for this issue.

01/10/2012 07:48 PM - Mike Gibson

Has this bug been reported upstream? If so, do you have a link to the case? I'm having the same issue in my code and would like to look into fixing it.

05/26/2012 05:07 PM - Mirco Bauer

- *Status changed from New to Closed*

I never experienced this issue with Mono 2.10.8 so I think I can assume the issue is no longer present

01/03/2013 12:43 PM - Mirco Bauer

https://bugzilla.xamarin.com/show_bug.cgi?id=3050

10/29/2013 02:27 PM - Mirco Bauer

- *Category set to Server*
- *Status changed from Closed to New*

10/29/2013 02:28 PM - Mirco Bauer

This issue only becomes visible when the smuxi-server runs on Mono 2.10 and the frontend on Microsoft .NET

03/10/2015 07:18 PM - Mirco Bauer

The only known workaround is to use Mono on Windows

06/14/2015 03:55 PM - Mirco Bauer

- *Complexity set to High*

06/14/2015 04:03 PM - Mirco Bauer

Most people start to only see this issue when they add a Twitter account for some reason. Here is such sample:

```
<pre>
Exception Type:
System.InvalidCastException
```

Exception Message:

Obiekt musi implementować element IConvertible.

Exception StackTrace:

Server stack trace:

```
w System.Convert.ChangeType(Object value, Type conversionType, IFormatProvider provider)
w System.Runtime.Serialization.FormatterConverter.Convert(Object value, Type type)
w System.Runtime.Serialization.SerializationInfo.GetValue(String name, Type type)
w System.Collections.Generic.Dictionary`2.OnDeserialization(Object sender)
w System.Runtime.Serialization.ObjectManager.RaiseDeserializationEvent()
w System.Runtime.Serialization.Formatters.Binary.ObjectReader.Deserialize(HeaderHandler handler, __BinaryParser serParser, Boolean fCheck,
Boolean isCrossAppDomain, IMethodCallMessage methodCallMessage)
  w System.Runtime.Serialization.Formatters.Binary.BinaryFormatter.Deserialize(Stream serializationStream, HeaderHandler handler, Boolean
fCheck, Boolean isCrossAppDomain, IMethodCallMessage methodCallMessage)
    w System.Runtime.Remoting.Channels.CoreChannel.DeserializeBinaryResponseMessage(Stream inputStream, IMethodCallMessage reqMsg,
Boolean bStrictBinding)
  w System.Runtime.Remoting.Channels.BinaryClientFormatterSink.SyncProcessMessage(IMessage msg)
```

Exception rethrown at [0]:

```
w System.Runtime.Remoting.Proxies.RealProxy.HandleReturnMessage(IMessage reqMsg, IMessage retMsg)
w System.Runtime.Remoting.Proxies.RealProxy.PrivateInvoke(MessageData& msgData, Int32 type)
w Smuxi.Engine.GroupChatModel.get_Persons()
w Smuxi.Frontend.Gnome.GroupChatView.Sync()
w Smuxi.Frontend.TwitterGroupChatView.Sync()
w Smuxi.Frontend.ChatViewSyncManager.Sync(IChatView chatView)
w Smuxi.Frontend.ChatViewSyncManager.SyncWorker(ChatModel chatModel)
```

</pre>

07/12/2016 12:51 PM - Mirco Bauer

- Subject changed from remoting error since updating mono to 2.10.1 to remoting error since updating smuxi-server to Mono 2.10.1
- Status changed from New to Assigned
- Assigned to set to Mirco Bauer

07/12/2016 12:53 PM - Mirco Bauer

The real fix of this issue will come with switching to a new RPC system like REST. HTTP/JSON/REST does not rely on binary serialization like .NET remoting currently does.

11/19/2016 11:57 AM - Mirco Bauer

- Status changed from Assigned to Resolved
- Target version set to 1.0+stable

11/19/2016 11:58 AM - Mirco Bauer

- Status changed from Resolved to Closed

Smuxi is now detecting this issue and shows a dialog with a link to resolve the issue instead of crashing.