

Ruby master - Bug #9365

Sporadic TypeError (wrong argument type Thread (expected VM/thread)) from IO#close (via Net:HTTP)

01/06/2014 07:44 AM - ggiesemann (Geoffrey Gieseemann)

Status: Closed	
Priority: Normal	
Assignee:	
Target version:	
ruby -v: ruby 2.0.0p353 (2013-11-22 revision 43784) [x86_64-linux]	Backport:

Description

I'm seeing the occasional error being thrown from Net:HTTP from a Rails app running under unicorn:

TypeError (wrong argument type Thread (expected VM/thread))

The two difference stack traces I see point back to IO#close:

```
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/protocol.rb: 88:in close'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/protocol.rb: 88:in close'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb: 946:in do_finish'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb: 854:in ensure in start'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb: 854:in start'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb:1367:in request'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb:1390:in send_entity'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb:1179:in post'
```

```
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/protocol.rb: 88:in close'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/protocol.rb: 88:in close'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb: 946:in do_finish'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb: 854:in start'  
/opt/rubies/ruby-2.0.0/lib/ruby/2.0.0/net/http.rb: 582:in `start'
```

Flipping through the source, I can see that we're calling the following under the hood:

```
void  
rb_thread_fd_close(int fd)  
{  
  st_foreach(GET_THREAD()->vm->living_threads, thread_fd_close_i, (st_index_t)fd);  
}
```

thread_fd_close_i is unpacking a thread out of GET_THREAD()->vm->living_threads but is expected a Thread and not a VM/Thread.

These errors only seem to occur sporadically (78 in the past 30 days) and seem to happen during quiet times. The only other place I've been able to find this mentioned is on the Twitters [1]

I'd like to dig further, but I'm a bit out of my depth at debugging ruby runtimes.

HALP

[1] - <https://twitter.com/Sutto/status/332103402681151489>

History

#1 - 01/28/2014 12:21 AM - ggiesemann (Geoffrey Gieseemann)

Any love?

#2 - 01/28/2014 12:41 AM - normalperson (Eric Wong)

Thanks for the bug report, I think we need more info...

What else are you running? (threads, weird extensions, etc)

Mainly, which C extensions which touch threading?
And how many threads do you need to reproduce this issue with?

Thanks.

#3 - 01/29/2014 10:20 AM - normalperson (Eric Wong)

I haven't been able to reproduce this. It appears something is corrupting the typed_flag in the thread VALUE before IO#close.
Do you get segfaults or other unexplained errors?
Does this happen near/when unicorn worker processes exit/spawn?

Thanks for any more info you can provide.

#4 - 08/10/2019 02:58 PM - jeremyevans0 (Jeremy Evans)

- *Backport deleted (1.9.3: UNKNOWN, 2.0.0: UNKNOWN, 2.1: UNKNOWN)*

- *Status changed from Open to Closed*