

Ruby master - Bug #13654

irb save-history extension is not concurrency-safe

06/13/2017 01:17 PM - charles.cooke (Charles Cooke)

Status: Assigned	
Priority: Normal	
Assignee: keiju (Keiju Ishitsuka)	
Target version:	
ruby -v: ruby 2.4.1p111 (2017-03-22 revision 58053) [x86_64-linux]	Backport: 2.2: UNKNOWN, 2.3: UNKNOWN, 2.4: UNKNOWN

Description

Issue

If 2 simultaneous irb sessions are running with save-history enabled, the history will be overwritten in full by the last irb session to exit and history will be lost.

The save-history extension currently loads the existing file on session start, maintains history throughout the session, then regenerates the history file with the preloaded + new history from the current session. Therefore if the file contents are changed while the irb session is running, those changes are not overwritten when the session exits.

As many systems have logrotate and could manage the file buffering independently, one idea would be to just append the history from current session, rather than recreating the history file.

Steps to reproduce

1. Enable the save-history extension to log to a file
2. Start an irb session (Session #1)
3. Start a second irb session (Session #2)
4. In Session #1, execute commands and exit - verify that the output is generated correctly
5. In Session #2, execute commands and exit - PROBLEM - the output from Session #1 has been deleted

See output below:

```
[current]$ cat .irbrc
require 'irb/ext/save-history'

IRB.conf[:SAVE_HISTORY] = 1000
IRB.conf[:HISTORY_FILE] = File.join(Dir.pwd, 'log', 'irb.log')

==== START SESSION #1# ====
[current]$ irb
irb(main):001:0> puts 'Session #1 - Output'
Session #1 - Output
=> nil
irb(main):002:0>
[1]+  Stopped                  irb
==== BACKGROUND SESSION #1# ====

==== START SESSION #2# ====
[current]$ irb
irb(main):001:0> puts 'Session #2 - Output'
Session #2 - Output
=> nil
irb(main):002:0> exit
==== STOP SESSION #2# ====

==== OUTPUT IS EXPECTED ====
[current]$ cat log/irb.log
puts 'Session #2 - Output'
exit
```

```
==== RESUME SESSION #1 ====
[current]$ fg

irb(main):003:0* puts 'Session #1 - Overwrites everything'
Session #1 - Overwrites everything
=> nil
irb(main):004:0> exit

==== PROBLEM - OUTPUT FROM SESSION #1 ONLY ====
[current]$ cat log/irb.log
puts 'Session #1 - Output'
puts 'Session #1 - Overwrites everything'
exit
```

History

#1 - 07/14/2017 09:28 AM - naruse (Yui NARUSE)

- Assignee set to keiju (Keiju Ishitsuka)
- Status changed from Open to Assigned