

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT

**LEARN. NETWORK.
EXPERIENCE OPEN SOURCE.**

www.theredhatsummit.com

SESSION TITLE

Jiri Moskovcak
Software Engineer, Red Hat

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



What is it going to be about?

- Nothing!

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



What is it going to be about?

- Nothing!
- Unless....

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



What is it going to be about?

- Nothing!
- Unless....
- ... there is a problem you should know about...

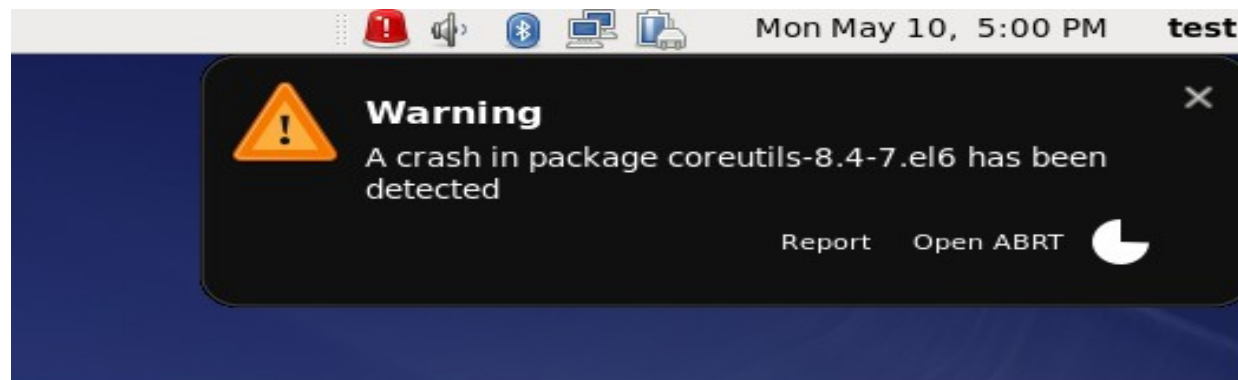
SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



What is ABRT?



SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



What is ABRT?

```
Terminal - root@localhost:~
File Edit View Terminal Go Help
May 13 13:17:00 localhost abrt[32476]: saved core dump of pid 32475 (/bin/sleep) to /var/cache/abrt/ccpp-1273749420-32475.new/coredump (3
56352 bytes)
May 13 13:17:00 localhost abrt: Directory 'ccpp-1273749420-32475' creation detected
May 13 13:17:00 localhost abrt: Crash is in database already (dup of /var/cache/abrt/ccpp-1273659822-13792)
May 13 13:17:00 localhost abrt: Deleting crash ccpp-1273749420-32475 (dup of ccpp-1273659822-13792), sending dbus signal
May 13 13:17:04 localhost abrt: Getting crash infos...
May 13 13:17:45 localhost abrt: Getting crash infos...
May 13 13:17:48 localhost abrt: Getting crash infos...
May 13 13:17:55 localhost abrt[32522]: saved core dump of pid 32521 (/bin/sleep) to /var/cache/abrt/ccpp-1273749475-32521.new/coredump (3
56352 bytes)
May 13 13:17:55 localhost abrt: Directory 'ccpp-1273749475-32521' creation detected
May 13 13:17:55 localhost abrt: New crash /var/cache/abrt/ccpp-1273749475-32521, processing
May 13 13:17:55 localhost abrt: Registered Action plugin 'RunApp'
May 13 13:17:55 localhost abrt: RunApp('/var/cache/abrt/ccpp-1273749475-32521','test x`cat component`" = x"xorg-x11-server-Xorg" && cp
/var/log/Xorg.0.log .')
May 13 13:17:57 localhost abrt: Getting crash infos...
May 13 13:17:59 localhost abrt: Creating report...
May 13 13:18:08 localhost abrt[32567]: not dumping repeating crash in '/bin/sleep'
(END)
```

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



OK, so what is it?

- set of tools to automatically detect and warn about problems
- new and easy way to report bugs
- ... and find a solution in existing knowledge base
- process to speed up bug resolutions

SUMMIT

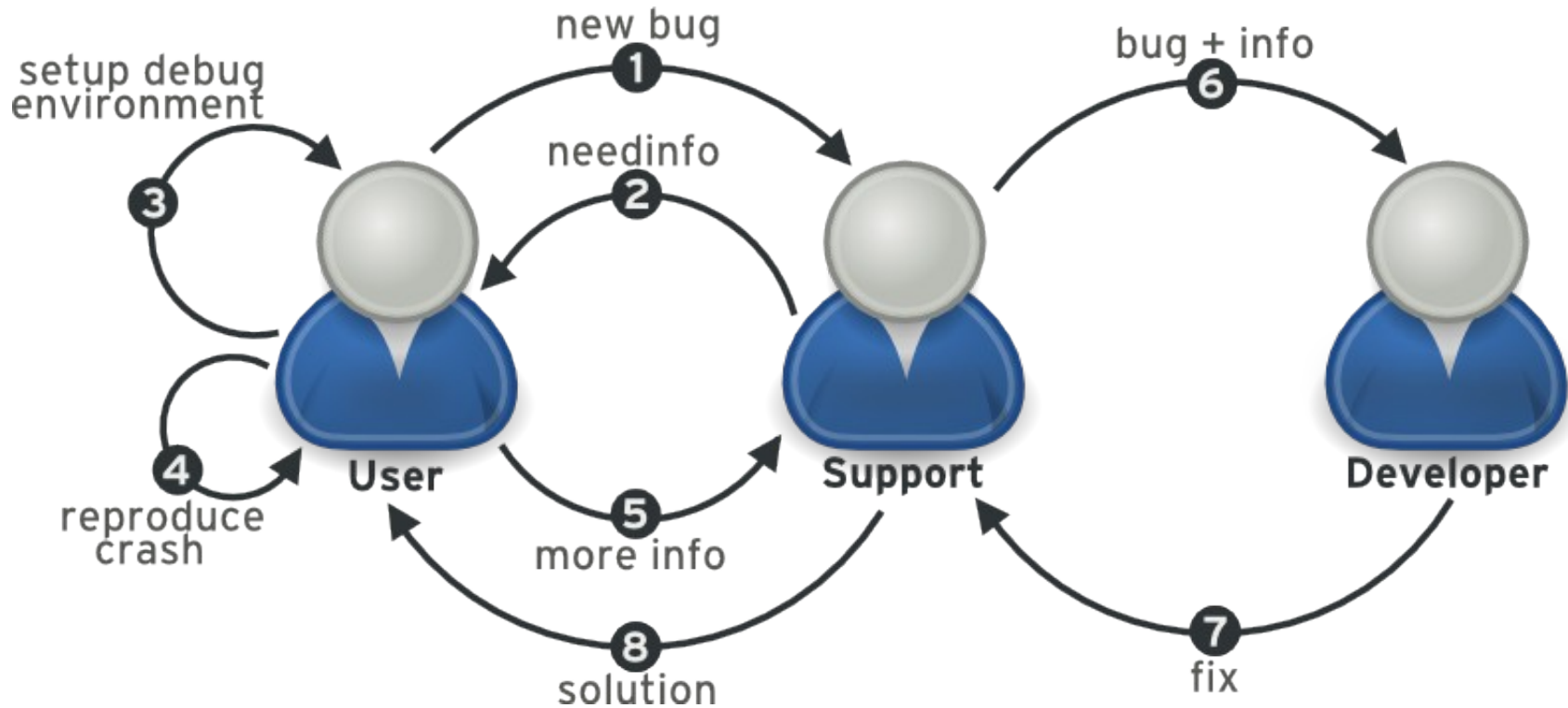
**JBoss
WORLD**

PRESENTED BY RED HAT



How it can help you/us – Saving time

- RHEL5 bug flow



SUMMIT

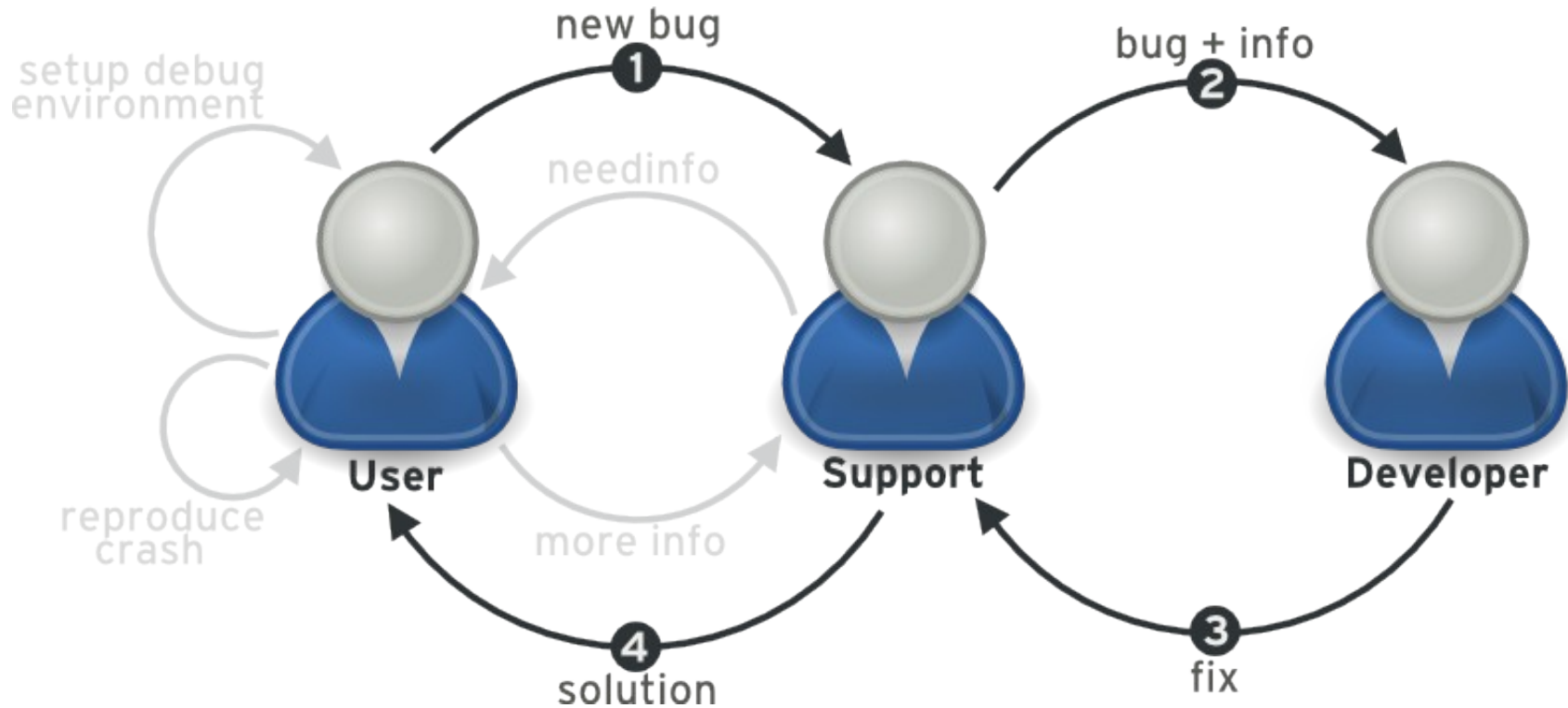
JBoss
WORLD

PRESENTED BY RED HAT



How it helps you/us – Saving time

- Bug flow with ABRT



SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



How it helps you/us?

- Automatic detection
- Automatic data collecting
- Faster fix delivery
- Saves **time** and **money**

SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



How does it work?

- Daemon
 - A background process which looks for potential problems
 - notifies the clients about it
- Client
 - A process that can communicate with the daemon
 - Notification applet, GUI, CLI, email client ...



User experience - Desktop



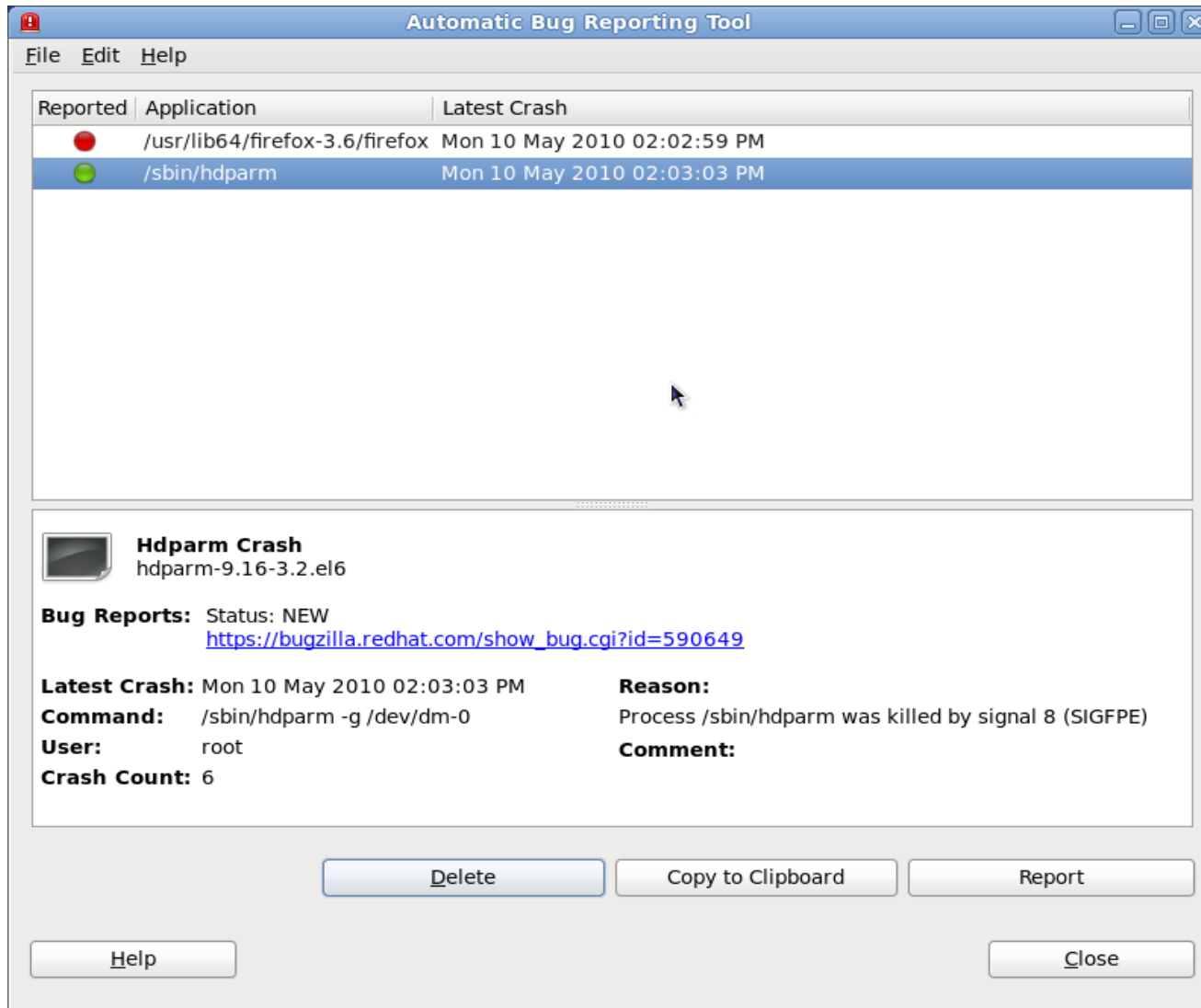
SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



User experience – main window



SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



Reporting assistant – reporter selector



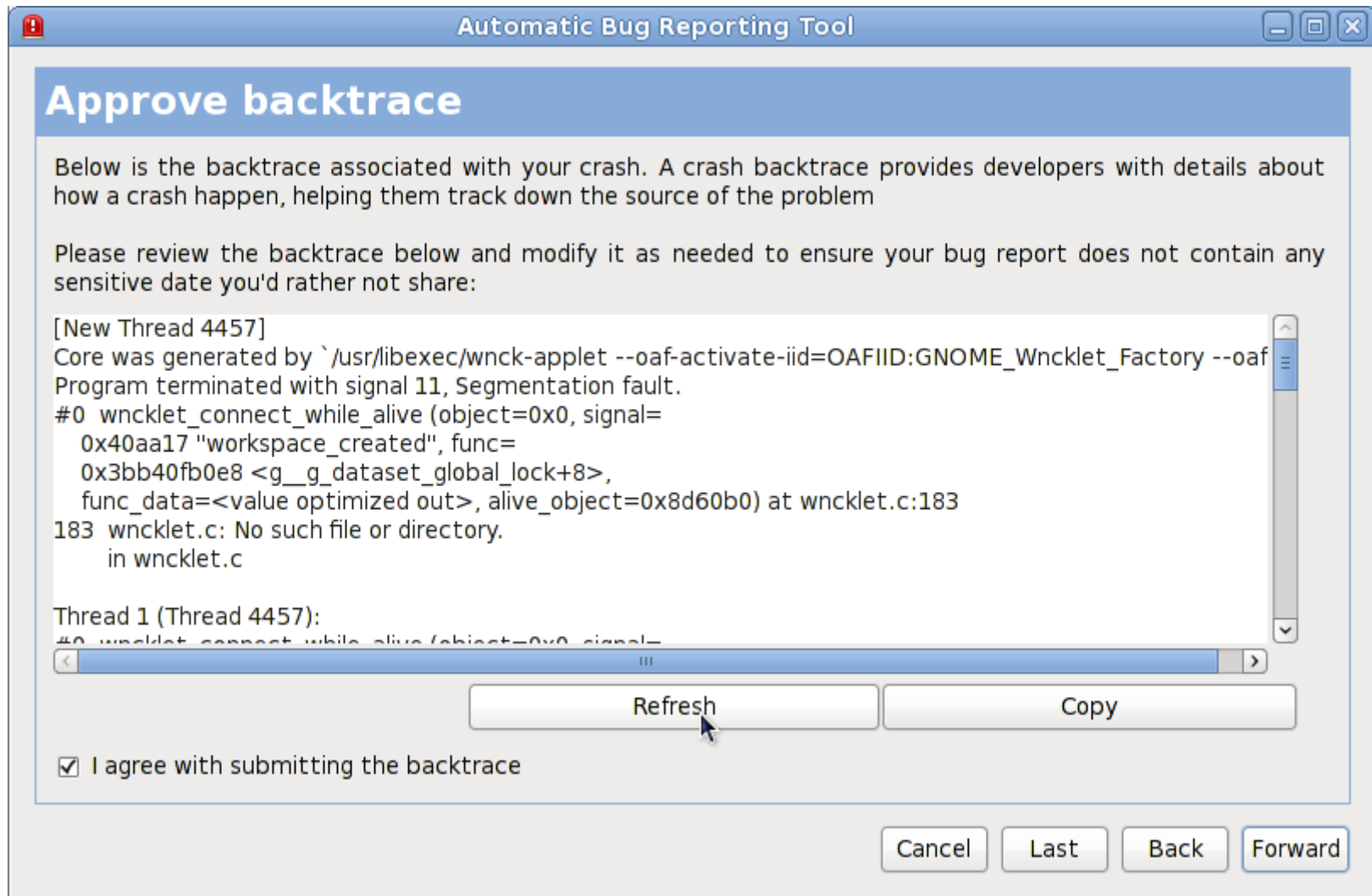
SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



Reporting assistant -



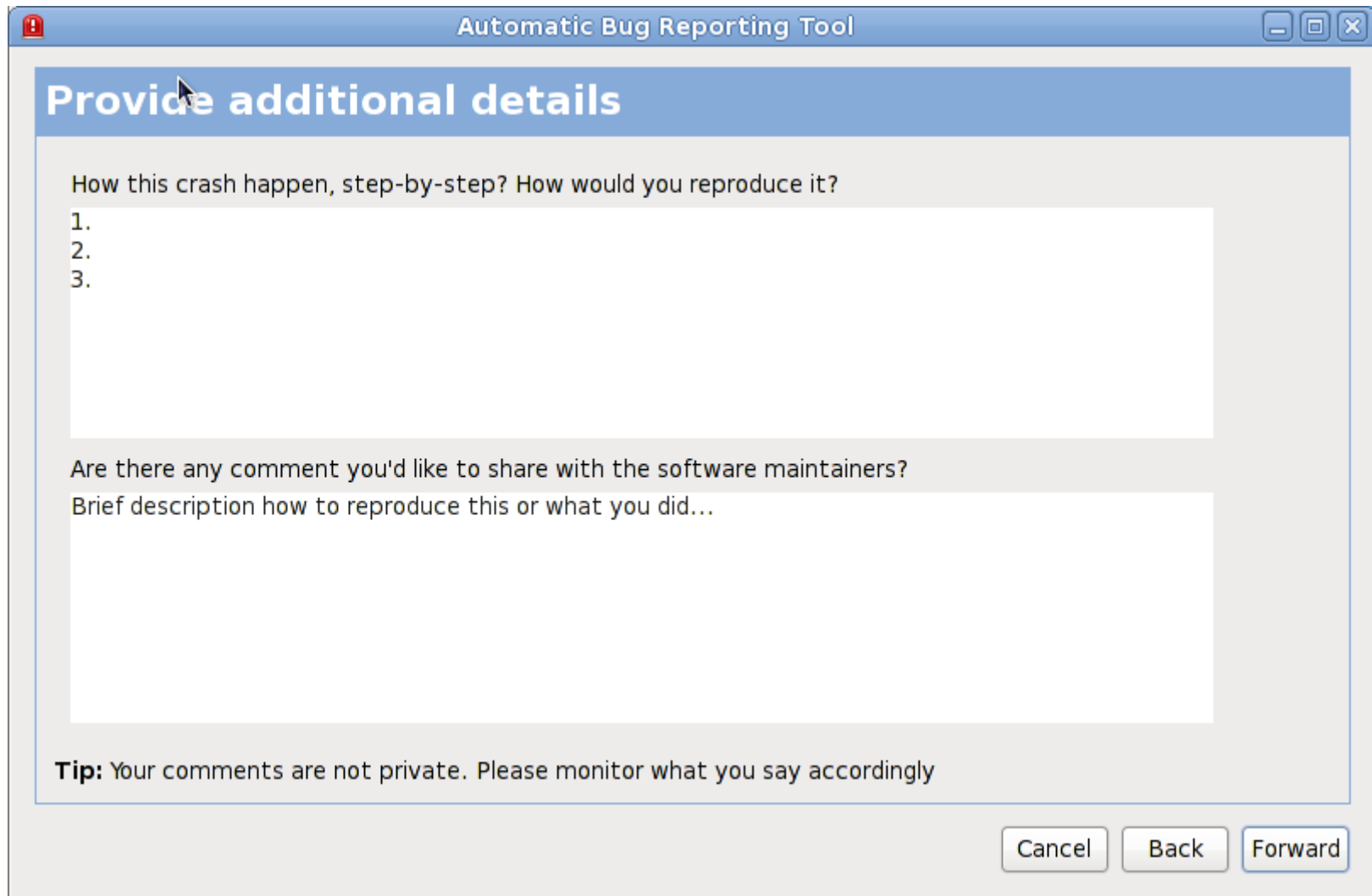
SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



Reporting assistant – additional info



The screenshot shows a window titled "Automatic Bug Reporting Tool" with a standard Windows-style title bar. The main content area has a blue header with the text "Provide additional details". Below the header, there are two text input fields. The first field is preceded by the question "How this crash happen, step-by-step? How would you reproduce it?" and contains a numbered list with three empty items: "1.", "2.", and "3.". The second field is preceded by the question "Are there any comment you'd like to share with the software maintainers? Brief description how to reproduce this or what you did...". At the bottom of the window, there is a "Tip" section that reads "Tip: Your comments are not private. Please monitor what you say accordingly". In the bottom right corner, there are three buttons: "Cancel", "Back", and "Forward".

Automatic Bug Reporting Tool

Provide additional details

How this crash happen, step-by-step? How would you reproduce it?

- 1.
- 2.
- 3.

Are there any comment you'd like to share with the software maintainers?
Brief description how to reproduce this or what you did...

Tip: Your comments are not private. Please monitor what you say accordingly

Cancel Back Forward

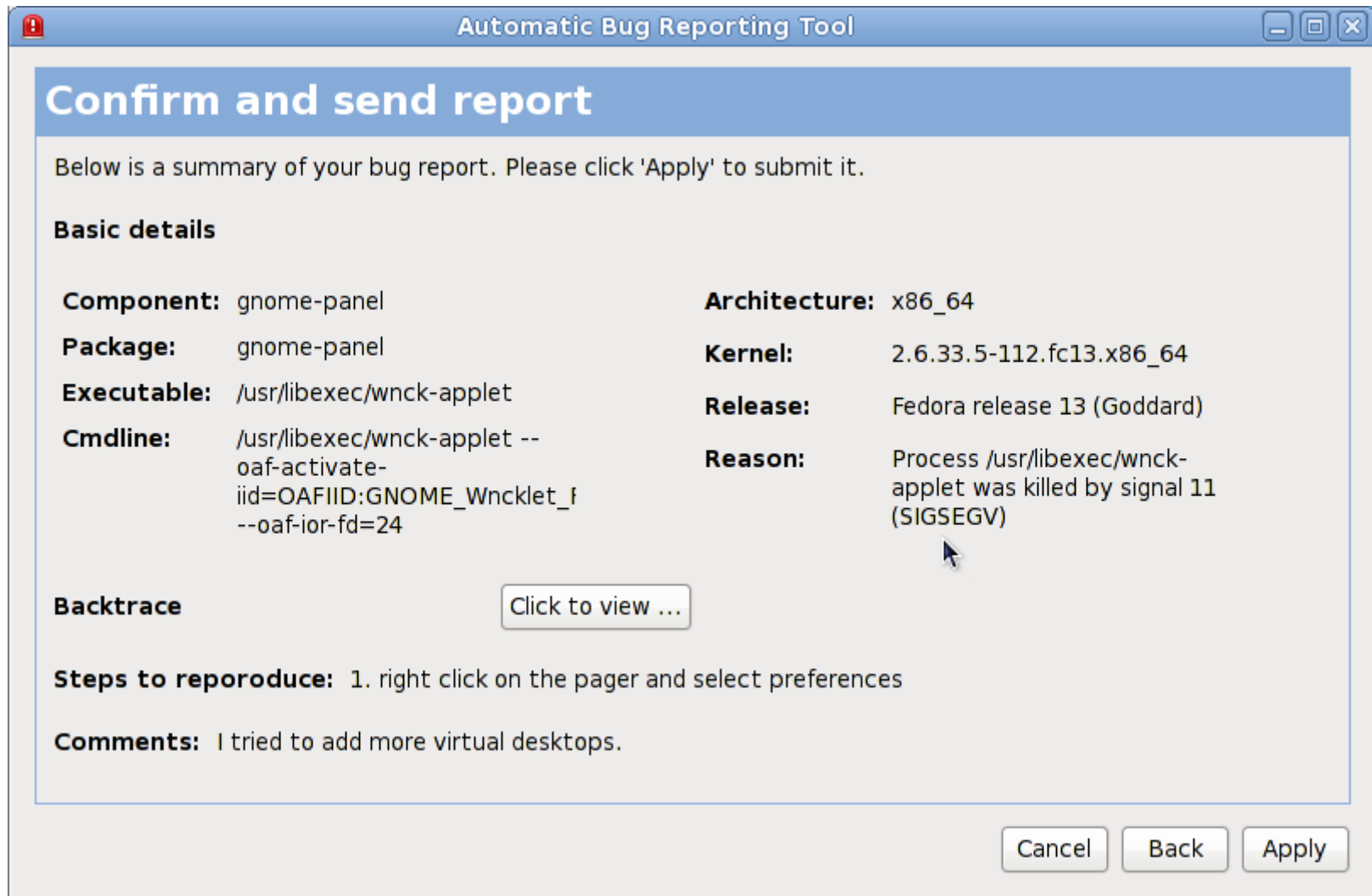
SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



Reporting assistant - summary



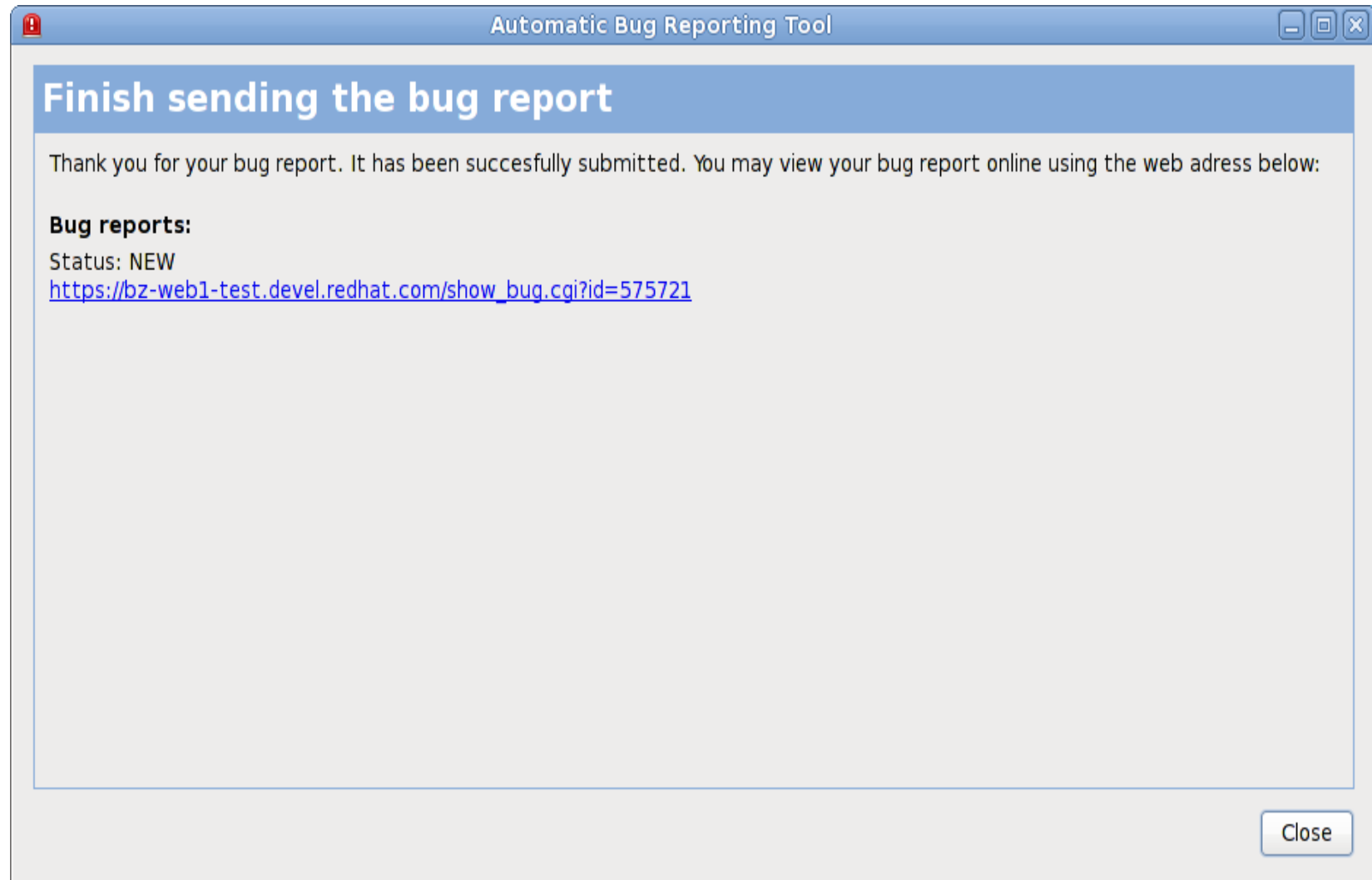
SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



Reporting assistant – report status



SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



User experience – CLI

- Crash list

```
[12:24:05 jmoskovc@localhost Documents]$ abrt-cli --get-list
4.
    UID          : 501
    UUID         : 23f3d301581e97a63dd126c716a802fc61f4ccfd
    Package      : coreutils-7.6-9.fc12
    Executable   : /bin/sleep
    Crash Time   : Fri 23 Apr 2010 10:34:27 AM CEST
    Crash Count  : 2
[12:24:08 jmoskovc@localhost Documents]$ █
```

SUMMIT

JBoss
WORLD

PRESENTED BY RED HAT



User experience – report editor

```
## Please check this report. Lines starting with '#' will be ignored.
## Lines starting with '%----' separate fields, please do not delete.

%----backtrace
# Backtrace
# Check that it does not contain any sensitive data such as passwords.
Core was generated by `sleep 100'.
Program terminated with signal 11, Segmentation fault.
\#0  0x0000003edd4a4d00 in __nanosleep_nocancel ()
    at ../sysdeps/unix/syscall-template.S:82
82  ../sysdeps/unix/syscall-template.S: No such file or directory.
    in ../sysdeps/unix/syscall-template.S

Thread 1 (Thread 3872):
\#0  0x0000003edd4a4d00 in __nanosleep_nocancel ()
    at ../sysdeps/unix/syscall-template.S:82
No locals.
\#1  0x0000000000403d9b in rpl_nanosleep (requested_delay=0x7fff,
    remaining_delay=0x0) at nanosleep.c:69
    r = <value optimized out>
    delay = {tv_sec = 100, tv_nsec = 0}
    t0 = {tv_sec = 3919, tv_nsec = 511186517}
\#2  0x000000000040343b in xnanosleep (seconds=<value optimized out>,
    at xnanosleep.c:112
    overflow = false
```

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



User experience – CLI

- Report status

```
[12:26:13 jmoskovc@localhost Documents]$ abrt-cli --report @4

The report has been updated.
Report using Bugzilla? [y/N]: y
Wrong settings were detected for plugin Bugzilla.
Enter your login: jmoskovc@redhat.com
Enter your password: ██████████
>> Logging into bugzilla...
>> Checking for duplicates...
>> Creating new bug...
>> New bug id: 585166
>> Logging out...
Bugzilla: Status: NEW
https://bugzilla.redhat.com/show_bug.cgi?id=585166
```



Scalability

- Analyzers
 - For handling a specific group of crashes
 - C/C++, python, kerneloops
- Reporters
 - For reporting the incident to the respective bug tracker
 - Bugzilla, GSS portal, ftp/scp uploader, kerneloops.org, mailx
- Action plugins
 - runapp



Flexible configuration

- Reporting a crash

/etc/abrt.conf:

Ccpp = Bugzilla, mailx

Python = Bugzilla

Kerneloops = KerneloopsReporter

Ccpp:gimp = gimpreporter

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



Summary

- Automatic problem detection => don't miss anything
- Better bug reports => faster fix delivery
- Faster fix delivery => less money spent!
- Less money spent => happy customer
- Happy customer => We are happy :-)

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



Q & A

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



Useful links

- <http://fedorahosted.org/abrt/>
- jmoskovc@redhat.com
- Red Hat booth

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT



FOLLOW US ON TWITTER

www.twitter.com/redhatsummit

TWEET ABOUT IT

[#summitjbw](https://twitter.com/summitjbw)

READ THE BLOG

<http://summitblog.redhat.com/>

SUMMIT

**JBoss
WORLD**

PRESENTED BY RED HAT

