



自動化テスト環境 STP

Scalable Test Platform

佐久間 純一@Linux Conference 2002



What is OSDL?

- エンタープライズ Linux を推進する NPO
- IT 企業 22 社が協賛
- 特定の企業・団体に偏重せずオープンソースプロジェクトを支援
- 本部・米国オレゴン州
- 日本拠点・神奈川県横浜市
- <http://www.osdl.jp/>



What is STP?

- Scalable Test Platform
- Linux カーネルテストを自動化
 - 任意リリース + 自作カーネルパッチ
 - 各種代表的ベンチマークを選択可
- OSDL の 大規模マシンを利用可能
- <http://www.osdl.jp/stp/>



STP の使い方 - アソシエイト登録

Open Source Development Lab - Mozilla {Build ID: 2002091116}

File Edit View Go Bookmarks Tools Window Help Debug QA

http://www.osdl.org/cgi-bin/eidetic.cgi?module=users&command=edit Search

Lab Overview

- About OSDL
- Legal
- Equipment RFQs
- Sponsors
- Lab Equipment
- Press Releases
- Coming Events
- Newsletters
- Presentations
- Jobs at OSDL

Lab Activities

- Carrier Grade Linux
- Data Center Linux
- Linux Performance
- Scalable Test Platform
- Patch Lifecycle Mgr
- Hardware Schedule
- Mailing Lists

Projects

- Propose A Project
- See Proposed Projects
- See Active Projects
- See Completed Projects

Users: Submit user

In order to be a Lab Associate, please provide the following information (required info is indicated with a red asterisk):

* **Given Name:**
SAKUMA
Your given or first name.

* **Surname:**
Junichi
Your surname or last name.

* **Email Address:**
jun@osdl.jp
This will be our primary means of contacting you. Any information that it is pertinent for you to receive will be sent to this address.

* **Desired Username:**
jun
This is the name we will use for your UNIX accounts and other services, unless it has already been taken by someone else. (Note: the length of a username is 2-20 characters, and only the characters 0-9, a-z or _ are allowed. All others will be stripped out.)

Sign up for our bi-monthly electronic newsletter.

A randomly generated password will be sent to your email address; you can log in and change it as well as set other information and submit or register for other services.

Done



STP の使い方 - プロジェクト登録

Open Source Development Lab - Mozilla {Build ID: 2002091116}

File Edit View Go Bookmarks Tools Window Help Debug QA

http://www.osdl.org/projects/project.html Search

Projects

- Propose A Project
- See Proposed Projects
- See Active Projects
- See Completed Projects

Project Coordinator

Name: SAKUMA Junichi

Email Address: jun@osdl.org

Phone Number: +81-45-338-1567

Login Name: jun
(Requested username for OSDL systems)

Project

Name: Scalabe Test Platform Ver.3 Full, official name of project.

Tag: STP3 A short (20 char) version of project name, such as an acronym, abbreviation, or nickname.

Homepage: http://www.osdl.jp/stp3/
Homepage or sourceforge page.

Description: Scalable Test Platform Ver. 3 allows you to test your own Linux kernel patch against fancy OSDL's large scale server machines with popular benchmarks like bonnie++ or OSDL's DBT-1 without a pain of cumbersome repetitive re-installation. You can't miss it!
What is your project's purpose and what software does it make? (HTML is ok)

Team Members: SAKUMA Junichi <jun@osdl.org>
Shinji Takazawa <takazawa@osdl.jp>

Please provide the name, email address, phone number, and requested username for all project team members who will need access.

Lab: OSDL-JP

Done



STP の使い方 - パッチ登録

Patch Lifecycle Manager - Mozilla {Build ID: 2002091116}

File Edit View Go Bookmarks Tools Window Help Debug QA

https://www.osdl.org/cgi-bin/plm?module=addpatch Search

OSDL Patch Lifecycle Manager home user page search add patch logout

add patch

Adding a patch as user [jun]

Patch Name:

File to Upload: Browse...

The patch file can be in plaintext, gzip or bzip2 format.
Please name the file accordingly. (i.e. patchfile.bz2)

Fill in the ID or Name of the dependent patch or dependent baseline

Version ID to apply to:

Version Name to apply to:

NOTE: Official baseline versions are in the system with placeholder patch ID's
If you can't remember the name of a patch, you can [search](#) for it.

Add Patch

https://www.osdl.org/cgi-bin/plm?module=search



STP の使い方 - テスト選択

Open Source Development Lab - Mozilla {Build ID: 2002091116}

File Edit View Go Bookmarks Tools Window Help Debug QA

http://www.osdl.org/cgi-bin/auth/stp.cgi

Lab Overview

- About OSDL
- Legal
- Equipment RFQs
- Sponsors
- Lab Equipment
- Press Releases
- Coming Events
- Newsletters
- Presentations
- Jobs at OSDL

Lab Activities

- Carrier Grade Linux
- Data Center Linux
- Linux Performance
- Scalable Test Platform
- Patch Lifecycle Mgr
- Hardware Schedule
- Mailing Lists

Projects

- Propose A Project
- See Proposed Projects
- See Active Projects
- See Completed Projects

Stp: Submit [Return home](#)

Submit a test request by filling out the following form.

Please check your entry and re-edit...

Test Information

Test Name [Details...](#)
Select the test that you'd like to run

Optional Script Parameters
Specify test script parameters. [More info...](#)

Priority Low Medium High

Auto Publish Automatically link and report test results on OSDL site.

Project (optional) [Details...](#)

Contact Information

Results will be mailed to jun@osdl.org

Done



STP の使い方 - マシン選択

Open Source Development Lab - Mozilla {Build ID: 2002091116}

File Edit View Go Bookmarks Tools Window Help Debug QA

http://www.osdl.org/cgi-bin/auth/stp.cgi

Lab Overview

- About OSDL
- Legal
- Equipment RFQs
- Sponsors
- Lab Equipment
- Press Releases
- Coming Events
- Newsletters
- Presentations
- Jobs at OSDL

Lab Activities

- Carrier Grade Linux
- Data Center Linux
- Linux Performance
- Scalable Test Platform
- Patch Lifecycle Mgr
- Hardware Schedule
- Mailing Lists

Projects

- Propose A Project
- See Proposed Projects
- See Active Projects
- See Completed Projects

Stp: Submit [Return home](#)

Choose the type of machine you'd like to run the test on:

Machine Selection	Choice	CPU	RAM (MB)	Storage (GB)	Spindles	Eth100	Eth1000
	<input type="radio"/>	1-CPU PIII 1Ghz (256k cache)	512	18	2	82557 - EthernetPro100	
	<input type="radio"/>	2-CPU PIII 850 MHz (256k cache)	1024	38	10	EthernetPro100	
	<input type="radio"/>	4-CPU PIII 700 MHz (1MB cache)	3831	249	20	EthernetPro100	
	<input checked="" type="radio"/>	8-CPU PIII 700 MHz (1MB cache)	8056	334	40	EthernetPro100	

Distro: RedHat 7.1 [Details...](#)
Choose the operating system distribution image to use

Lilo String (Optional):
append="" line for memory control options

PLM Patch:
Enter valid PLM System Patch ID. [Search for PLM Patch ID...]

Send



STP の使い方 - テストキュー確認

Open Source Development Lab - Mozilla {Build ID: 2002091116}

File Edit View Go Bookmarks Tools Window Help Debug QA

http://www.osdl.org/cgi-bin/auth/stp.cgi

Lab Overview

- About OSDL
- Legal
- Equipment RFQs
- Sponsors
- Lab Equipment
- Press Releases
- Coming Events
- Newsletters
- Presentations
- Jobs at OSDL

Lab Activities

- Carrier Grade Linux
- Data Center Linux
- Linux Performance
- Scalable Test Platform
- Patch Lifecycle Mgr
- Hardware Schedule
- Mailing Lists

Projects

- Propose A Project
- See Proposed Projects
- See Active Projects
- See Completed Projects

Stp: Record 5208 was stored successfully.

2002-05-07 10:47:45: Logged in: jun

IMPORTANT: the STP no longer uses CVS as its source repository

Patch submission has changed, please see the PLM HOWTO at: [HOWTO](#)

Load the test results for request

Test Requests: [More...](#)

ID #	Status	Distro Tag	Patch #	Test	Host	Project	Completion Date
5208	queued	RedHat 7.1	20	dbt1-1tier		Unaffiliated	0000-00-00 00:00:00
3309	failed	RedHat 7.1	3	lmbench_short	stp2-003	Unaffiliated	2002-07-19 13:14:40
3308	completed	RedHat 7.1	1	bonnie++	stp8-003	Unaffiliated	2002-07-19 09:57:00
3191	completed	RedHat 7.1	2	lmbench_short	stp1-001	Unaffiliated	2002-07-17 03:04:39
3190	completed	RedHat 7.1	1	lmbench_short	stp1-001	Unaffiliated	2002-07-17 01:02:33
3173	failed	RedHat 7.1	20	lmbench_short	stp1-001	Unaffiliated	2002-07-16 03:35:50



STP の使い方 - テスト結果公開

The screenshot shows a Mozilla browser window with the address bar containing <http://khack.osdl.org/stp/3308/>. The page title is "Bonnie++ Sequence Report". The content is organized into three sections:

- Results in TXT format**
 - [Results for base run](#)
 - [Run with no write buffering \(fsync\(\)\)](#)
 - [Run with 1,024 files](#)
 - [Run with 10,240 files](#)
- Results in CSV format**
 - [Base run CSV numbers](#)
 - [Run with no write buffers \(fsync\(\)\) CSV numbers](#)
 - [Run with 1,024 files](#)
 - [Run with 10,240 files](#)
- Other Information**
 - [Summary Information on Machine](#)
 - [Error log for all Bonnie Sessions](#)
 - [System Environment Documentation](#)
 - [Results Copyright License](#)



まとめ - STP の利点

- カーネルテストのリモートバッチ実行
- 任意リリース・自作パッチをテスト可能
- OSDL の大規模リソースが利用可能
- テスト結果の公開・共有
- <http://www.osdl.jp/stp/>