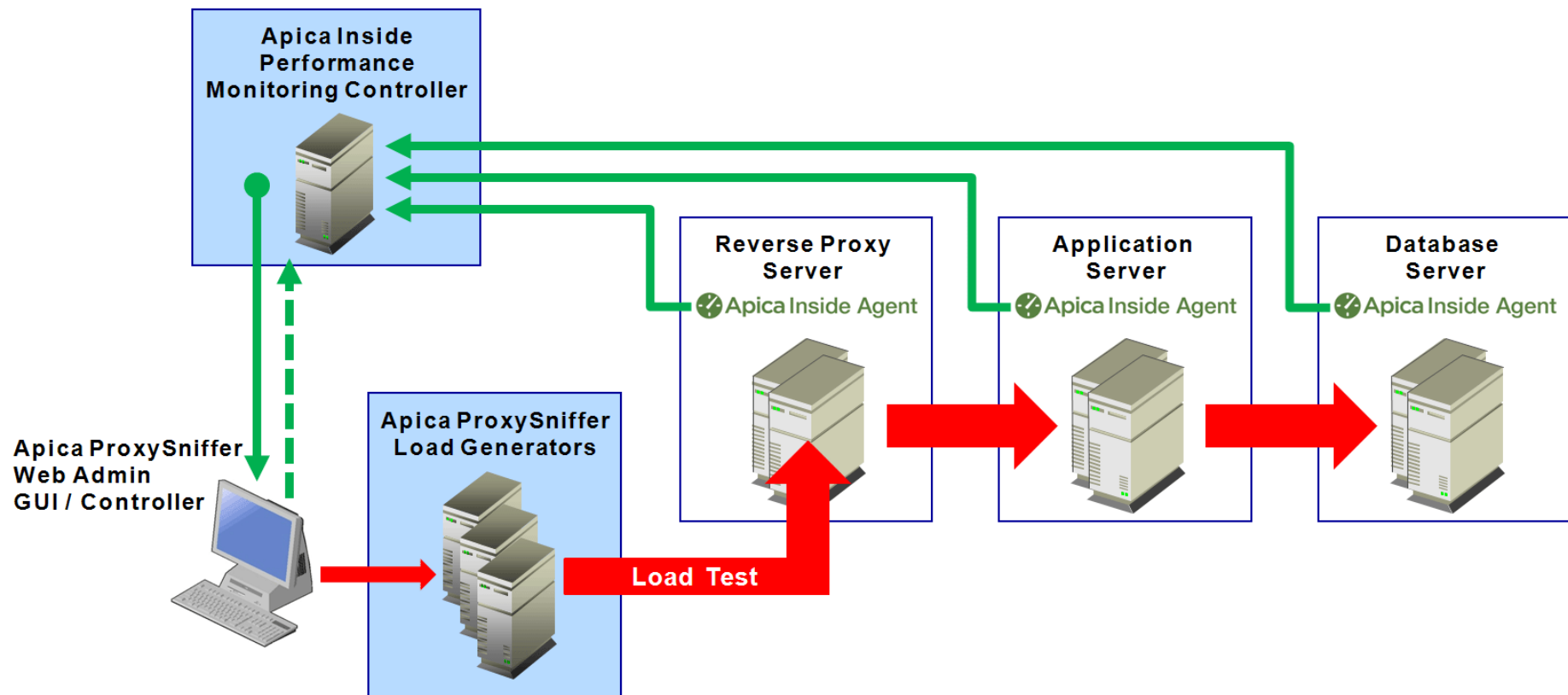


Apica Inside Agent

Using Apica Inside Performance Monitoring Controller with Apica ProxySniffer



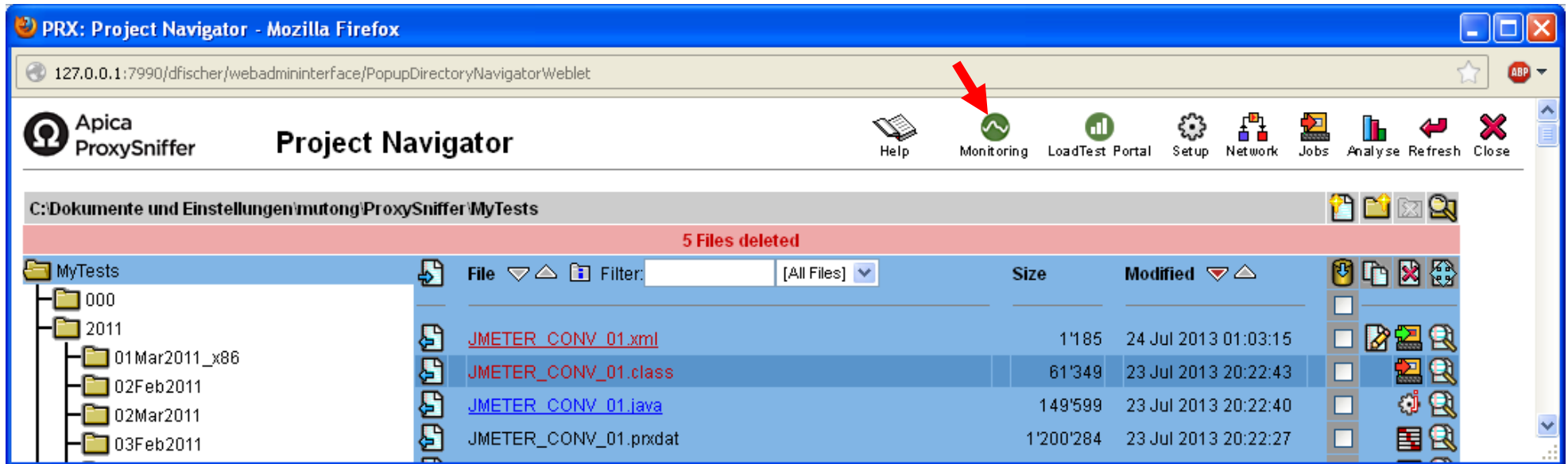
Apica Inside Agents collect **real-time performance information** from multiple sources such as Operating Systems (Performance Data), Network and Systems Management frameworks, SNMP, ARM APIs and the Application Management Modules themselves.

All the captured data are stored in the **Apica Inside Performance Monitoring Controller**, with no need for importing or exporting, and are presented as graphs in the **ProxySniffer GUI**. For example:

- When the server CPU's are at 100% use.
- Which server consumes the most memory.
- Server hard drive write and read times.





The captured data, respectively the graphs of them, can also be integrated into the **ProxySniffer Load Test Results**.

By clicking on the  icon in the **ProxySniffer "Project Navigator"** menu, you can connect to an **Apica Performance Monitoring Controller**, define "Monitoring Templates", and display Real-Time Measurements collected from multiple sources, such as Performance Data of Operating Systems.



PRX: Apica Performance Monitoring Controller - Mozilla Firefox

127.0.0.1:7990/dfischer/webadmininterface/ApicaMonitoringControllerConfigAccessWeblet

 **Apica Performance Monitoring Controller - Network Access Configuration**   

Enable Network Connection to Apica Performance Monitoring Controller

Apica Performance Monitoring Controller

| | |
|---------------------------|--|
| Controller Host | <input type="text" value="194.213.119.243"/> |
| Controller Port | <input type="text" value="26400"/> |
| Controller Protocol | <input type="text" value="Plain TCP"/> |
| Request Timeout (Seconds) | <input type="text" value="30"/> |

Use Outbound HTTP Proxy for accessing the Controller

| | |
|-----------------|----------------------|
| Proxy Host | <input type="text"/> |
| Proxy Port | <input type="text"/> |
| Proxy User Name | <input type="text"/> |
| Proxy Password | <input type="text"/> |

Apply Configuration >>> Continue

PRX: Apica Performance Monitoring Controller - Mozilla Firefox
127.0.0.1:7990/dfischer/webadmininterface/ApicaMonitoringControllerConfigAccessWeblet

Apica Performance Monitoring Controller - Select Measurement Data

 Help
 Refresh
 Close

Enable Network Connection to Apica Performance Monitoring Controller

A: Select Measurements

| | | |
|---|---|--------|
| <input checked="" type="checkbox"/> sestdclh01dev | <input type="checkbox"/> CPU Usage | % |
| | <input type="checkbox"/> Disk Read | MB/s |
| | <input type="checkbox"/> Disk Write | MB/s |
| | <input type="checkbox"/> IO Wait | % |
| | <input type="checkbox"/> Load Avg (1 Min) | count |
| | <input type="checkbox"/> Load Avg (15 Min) | count |
| | <input type="checkbox"/> Load Avg (6 Min) | count |
| | <input type="checkbox"/> Memory Cache Used | MB |
| | <input type="checkbox"/> Network Receive (RX) | Mbit/s |
| | <input type="checkbox"/> Network Transmit (RX) | Mbit/s |
| | <input type="checkbox"/> Pages swapped into memory/sec | count |
| | <input checked="" type="checkbox"/> Pages swapped out of memory/sec | count |
| | <input checked="" type="checkbox"/> Physical Memory Used | MB |
| <input checked="" type="checkbox"/> sestivt01p | <input checked="" type="checkbox"/> CPU Usage | % |
| | <input checked="" type="checkbox"/> Disk Read | MB/s |
| | <input type="checkbox"/> Disk Write | MB/s |
| | <input type="checkbox"/> IO Wait | % |
| | <input type="checkbox"/> Load Avg (1 Min) | count |
| | <input type="checkbox"/> Load Avg (15 Min) | count |
| | <input type="checkbox"/> Load Avg (6 Min) | count |
| | <input type="checkbox"/> Memory Cache Used | MB |
| | <input type="checkbox"/> Network Receive (RX) | Mbit/s |
| | <input type="checkbox"/> Network Transmit (RX) | Mbit/s |
| | <input type="checkbox"/> Pages swapped into memory/sec | count |
| | <input type="checkbox"/> Pages swapped out of memory/sec | count |
| | <input type="checkbox"/> Physical Memory Used | MB |

B: Save Selection as Monitoring Template

Filename: *

Description:

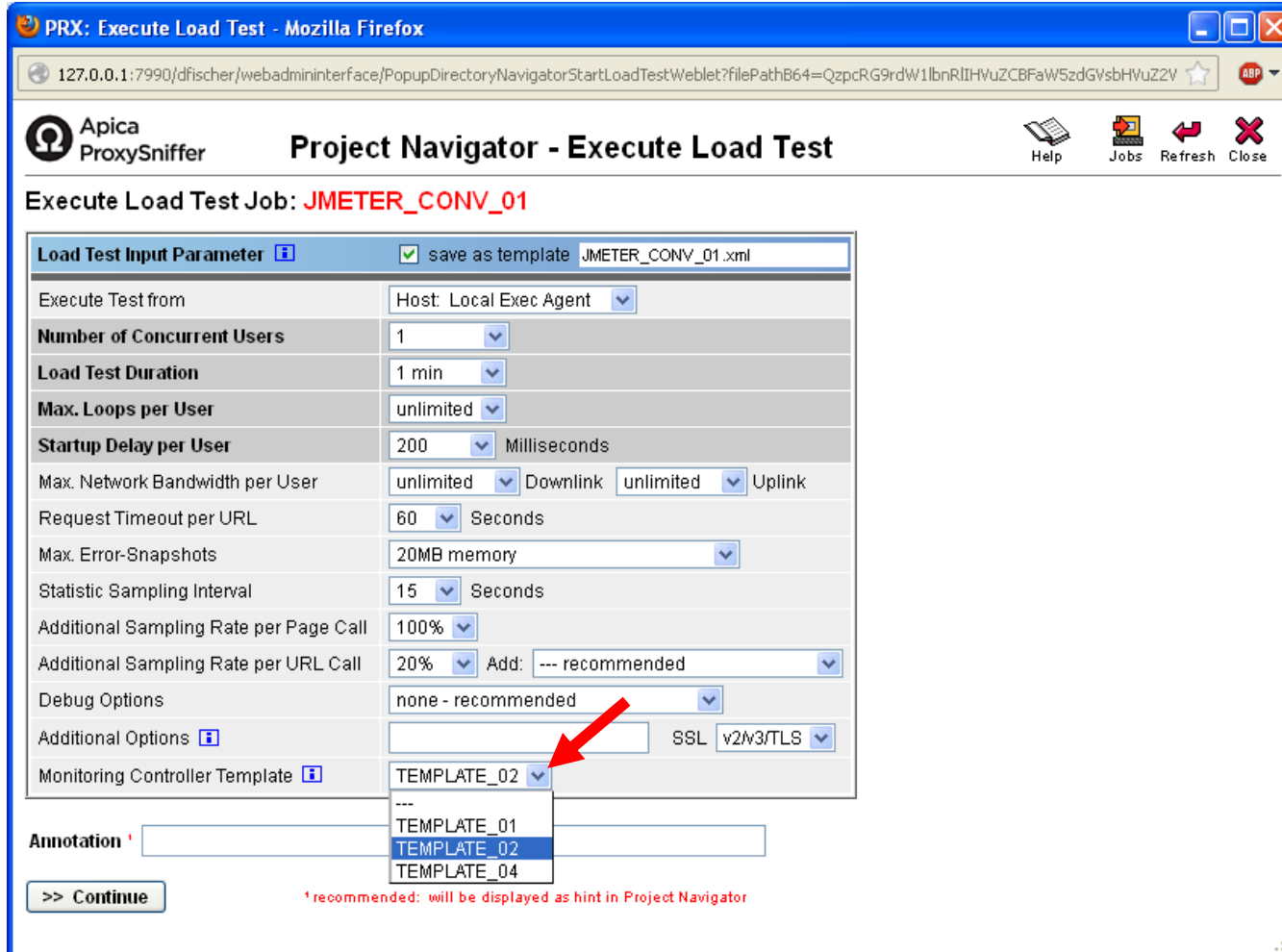
* required Enter a "simple" filename, with no path and no file extension.
The file extension is always *.xml. Example: "ServerSet_01"


C: List of All Monitoring Templates / Display Real-Time Measurements

TEMPLATE_01 This is my second Template

TEMPLATE_04

Once you have defined one or multiple "Monitoring Templates" you can select such a template when **Starting a Load Test:**



During the **Load Test Execution** you can display the **Real-Time Measurements** by clicking on the  icon:

PRX: Job 33 - Mozilla Firefox


127.0.0.1:7990/dfischer/webadmininterface/PopupDirectoryNavigatorDisplayLoadTestWeblet?filePathB64=QzpcRG9rdw1lbnRIIHVuZCBFaW!




Apica ProxySniffer Project Navigator - Execute Load Test

Local Exec Agent Job 33 Real-Time Comment: [Add]

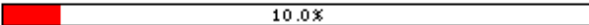
Job Parameter: JMETER_CONV_01 -u 1 -d 60 -t 60 -sdelay 200 -maxloops 0 -sampling 15 -perpage 100 -percurl 100 -maxerrmem 20 -nolog

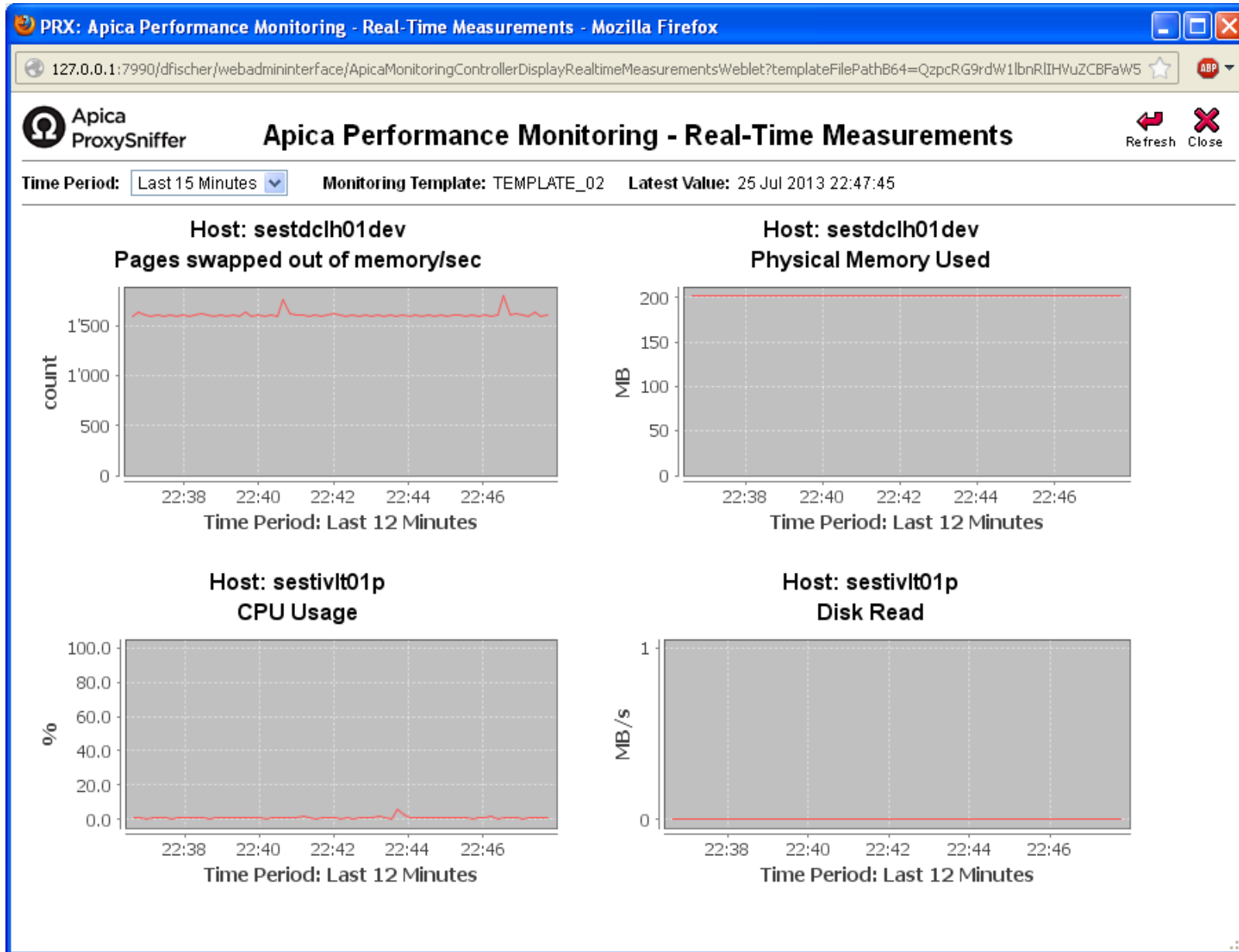
Test started at 25 Jul 2013 22:47:54 ECT / Planned test duration 1:00 min / 9 sec elapsed

TEMPLATE_02 

| Graph Title | Y-axis | X-axis | Real-time Icon |
|-----------------------------------|--------|---------|---|
| Web Transaction Rate | tr/sec | minutes |  |
| Session Failures / Ignored Errors | | minutes |  |
| Number of Users / Outst. Requests | | minutes |  |

| | | | | | |
|-------------------------------------|------|-------------------------------------|-----|---------------------------------|-----------|
| Total Passed URL Calls: | 100 | Total Passed Loops: | 2 | Number of Users: | 1 |
| Total Failed URL Calls: | 0 | Total Failed Loops: | 0 | Outstanding HTTP/S Requests: | 0 |
| HTTP Keep-Alive Efficiency (%): | 98.0 | Σ User's Think Time per Loop (sec): | 3.0 | TCP Socket Connect Time (ms): | 1 |
| AV Web Trans. Rate (URL calls/sec): | 15.1 | Session Time per Loop (sec): | 3.1 | AV Network Throughput (Mbit/s): | 2.86 |
| | | | | Total Transmitted Bytes: | 2'363'972 |

Abort Job 33 Progress: 0%  10.0% 100% Detailed Statistic



After the **Load Test is completed** you can **examine the Performance Data** by clicking in the **Load Test Result Detail** menu on **Diagram: External Measured Data**:

PRX: Result Detail - Mozilla Firefox

127.0.0.1:7990/dfischer/webadmininterface/PopupAnalyseLoadtestDetails?Weblet?action=dataCollectionSequence&key=06141dabb461d8b30382ca7577fda9bf&dataCollectionIndex=...

Apica ProxySniffer **Load Test Result Detail - Statistics and Diagrams**

Help Import Data PDF Report Export Close

Load Test: JMETER_CONV_01 Start Date: 25 Jul 2013 22:47:54 User: 1 Test Duration: 1:02 min Annotation: ---

| Advanced Test Parameter | Measured Results: per Single User - per Loop | Overall Test Results | Test Result |
|-------------------------------------|---|--|--------------------------|
| Startup Delay per User: 200 ms | AV Session Time per Loop: 3.15 sec/loop | Web Transaction Rate: 15.2 URL calls/sec | prev |
| Request Timeout per URL: 60 sec | AV Response Time per Page: 0.15 sec/page | Session Failure Rate: 0.00 % | Total Transmitted: 21 MB |
| Statistic Sampling Interval: 15 sec | Network Throughput per User: 375.7 kBytes/sec | Total Network Throughput: 2.88 MBit/sec | |

| | | | |
|--------------------------------------|--|-------------------------------------|--|
| ▶ Test Scenario | ▶ Diagram: Response Time per Page | ▶ Results per URL Call (Overview) | ▶ Results per URL Call (Details) |
| ▶ Diagram: Response Time Percentiles | ▶ Diagram: Top Time-Consuming URLs | ▶ Diagram: Concurrent Users | ▶ Diagram: Session Time |
| ▶ Diagram: Web Transaction Rate | ▶ Diagram: Outstanding HTTP/S Requests | ▶ Diagram: Completed Loops | ▶ Diagram: TCP Socket Connect Time |
| ▶ Diagram: Network Throughput | ▶ Diagram: HTTP Keep-Alive Efficiency | ▶ Diagram: SSL Cache Efficiency | ▶ Diagram: Session Failures |
| ▶ Diagram: Error Types | ▶ Diagram: Number of Errors per Page | ▶ Diagram: Number of Errors per URL | ▶ Diagram: External Measured Data |

Host: sestivt01p: CPU Usage
Host: sestdclh01 dev: Pages swapped out of memory/sec
Host: sestdclh01 dev: Physical Memory Used
Host: sestivt01p: CPU Usage
Host: sestivt01p: Disk Read

Save image to disk

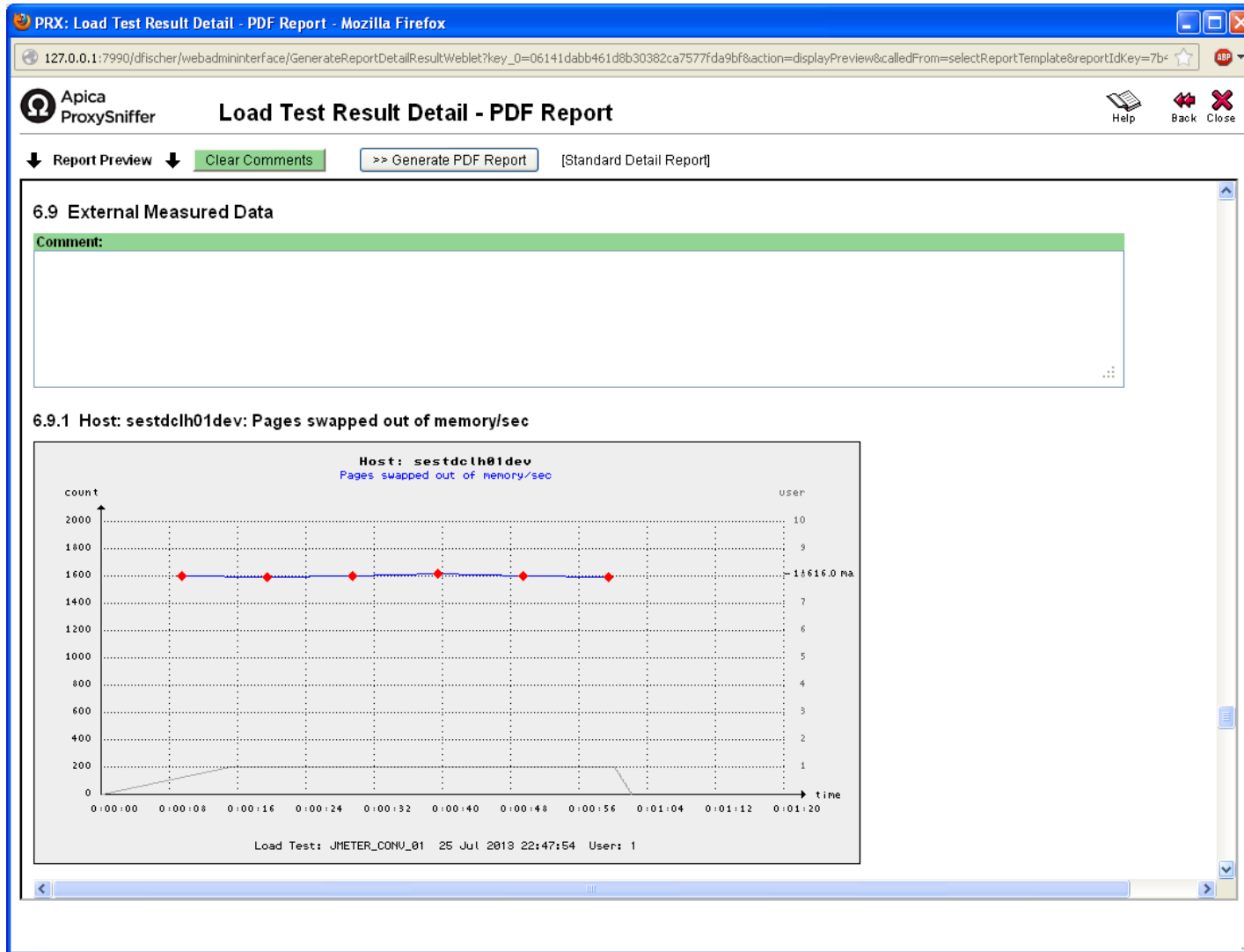
user
2.0
1.8
1.6
1.4
1.2
1.0
0.8
0.6
0.4
0.2
0.0

20 ma
1.1 av

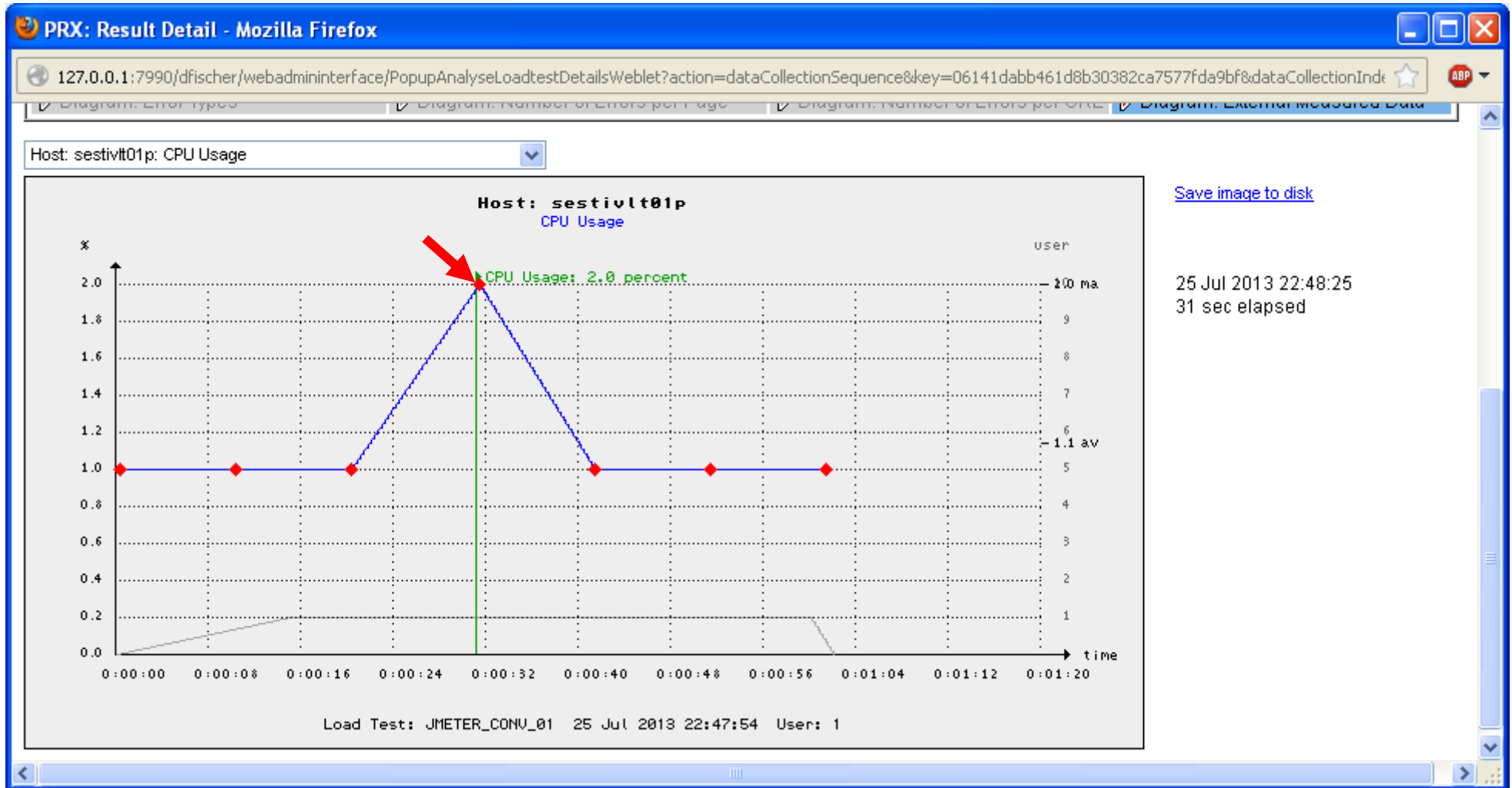
time
0:00:00 0:00:08 0:00:16 0:00:24 0:00:32 0:00:40 0:00:48 0:00:56 0:01:04 0:01:12 0:01:20

Load Test: JMETER_CONV_01 25 Jul 2013 22:47:54 User: 1

The Performance Data collected from **Apica Inside Agents** are also integrated in the ProxySniffer **PDF Report**.



Additional Hint: you can also **Tag the Event Time** of a specific measurement value in the in the **Load Test Result Detail** menu by clicking inside the diagrams at the corresponding value:



The Tagged Even Time and it's description is shown in all (other) time diagrams:

PRX: Result Detail - Mozilla Firefox

Load Test Result Detail - Statistics and Diagrams

Help Import Data PDF Report Export Close

Load Test: JMETER_CONV_01 Start Date: 25 Jul 2013 22:47:54 User: 1 Test Duration: 1:02 min Annotation: ---

| Advanced Test Parameter | |
|------------------------------|--------|
| Startup Delay per User: | 200 ms |
| Request Timeout per URL: | 60 sec |
| Statistic Sampling Interval: | 15 sec |

| Measured Results: per Single User - per Loop | |
|--|------------------|
| AV Session Time per Loop: | 3.15 sec/loop |
| AV Response Time per Page: | 0.15 sec/page |
| Network Throughput per User: | 375.7 kBytes/sec |

| Overall Test Results | |
|---------------------------|--------------------|
| Web Transaction Rate: | 15.2 URL calls/sec |
| Session Failure Rate: | 0.00 % |
| Total Network Throughput: | 2.88 MBit/sec |

Test Result

[← prev](#)

Total Transmitted: 21 MB

| | | | |
|--------------------------------------|--|-------------------------------------|------------------------------------|
| ▶ Test Scenario | ▶ Diagram: Response Time per Page | ▶ Results per URL Call (Overview) | ▶ Results per URL Call (Details) |
| ▶ Diagram: Response Time Percentiles | ▶ Diagram: Top Time-Consuming URLs | ▶ Diagram: Concurrent Users | ▶ Diagram: Session Time |
| ▶ Diagram: Web Transaction Rate | ▶ Diagram: Outstanding HTTP/S Requests | ▶ Diagram: Completed Loops | ▶ Diagram: TCP Socket Connect Time |
| ▶ Diagram: Network Throughput | ▶ Diagram: HTTP Keep-Alive Efficiency | ▶ Diagram: SSL Cache Efficiency | ▶ Diagram: Session Failures |
| ▶ Diagram: Error Types | ▶ Diagram: Number of Errors per Page | ▶ Diagram: Number of Errors per URL | ▶ Diagram: External Measured Data |

Completed Loops per Minute
Sampling Interval: 15 Seconds

number of successful completed loops per minute (sessions per minute) user

time

Load Test: JMETER_CONV_01 25 Jul 2013 22:47:54 User: 1

[Save image to disk](#)