

Performance Test report - Load Test

★ **Tester:** Liviu Lazar

1 Machine: Apple M1 Pro

Memory: 16GB of RAM



MacBook Pro

14-inch, 2021

Chip	Apple M1 Pro
Memory	16 GB
Serial number	XGXRFKVQY
macOS	Sonoma 14.0

More Info...

[Regulatory Certification](#)
™ and © 1983-2023 Apple Inc.
All Rights Reserved.

Operating system: Sonoma 14.0

Dockerized 2 containers

solr-container: 15.06GB RAM, CPU 0.38%

apache-container: 15.06GB RAM, CPU 0.01%

Containers

Container CPU usage

0.61% / 800% (8 CPUs available)



Container memory usage

800.35MB / 15.06GB

Show charts

Search

Only show running containers

	Name	Image	Status	Port(s)	CPU (%)	Last started	Actions
<input type="checkbox"/>	<div><div></div><div>solr-container 2ce94498499d</div></div>	solr:latest	Running	8983:8983	0.43%	46 minutes ago	<div><div></div><div></div><div></div></div>
<input type="checkbox"/>	<div><div></div><div>apache-container 05b12f4a16f5</div></div>	sebiboga/php-apache:latest	Running	8080:80	0%	46 minutes ago	<div><div></div><div></div><div></div></div>

IPs:


-apache-container --network mynetwork --ip 172.18.0.11 -d -p 8080:80 -v

-solr-container --network mynetwork --ip 172.18.0.10 -d -p 8983:8983 -v

SUT (Apple M1 Pro with 16GB of RAM, docker contained Apache SOLR 9.6.1)

Application: Apache SOLR

Build Version: 9.6.1



Dashboard

Logging

Security

Core Admin


Java Properties

Instance

Start


3 days ago

Versions

 **solr-spec** 9.6.1

 **solr-impl** 9.6.1 d7f7166567f52f1b31e3315b0188e11f2c4c9b60 – houston – 2024-05-23 13:50:22

 **lucene-spec** 9.10.0

 **lucene-impl** 9.10.0 695c0ac84508438302cd346a812cfa2fdc5a10df – 2024-02-14 16:48:06

Test Scenario:

Select 1 job from 250.000.000 jobs from Apache SOLR

Performance Test Scenario:

Workload: 25 Users

Ramp-up: 60sec

Duration: 3600s (1hour)

Testing Scope:

- After **1hour** error rate to be <**2%**
- **CPU <85%**
- **Memory <95%**

Test results:

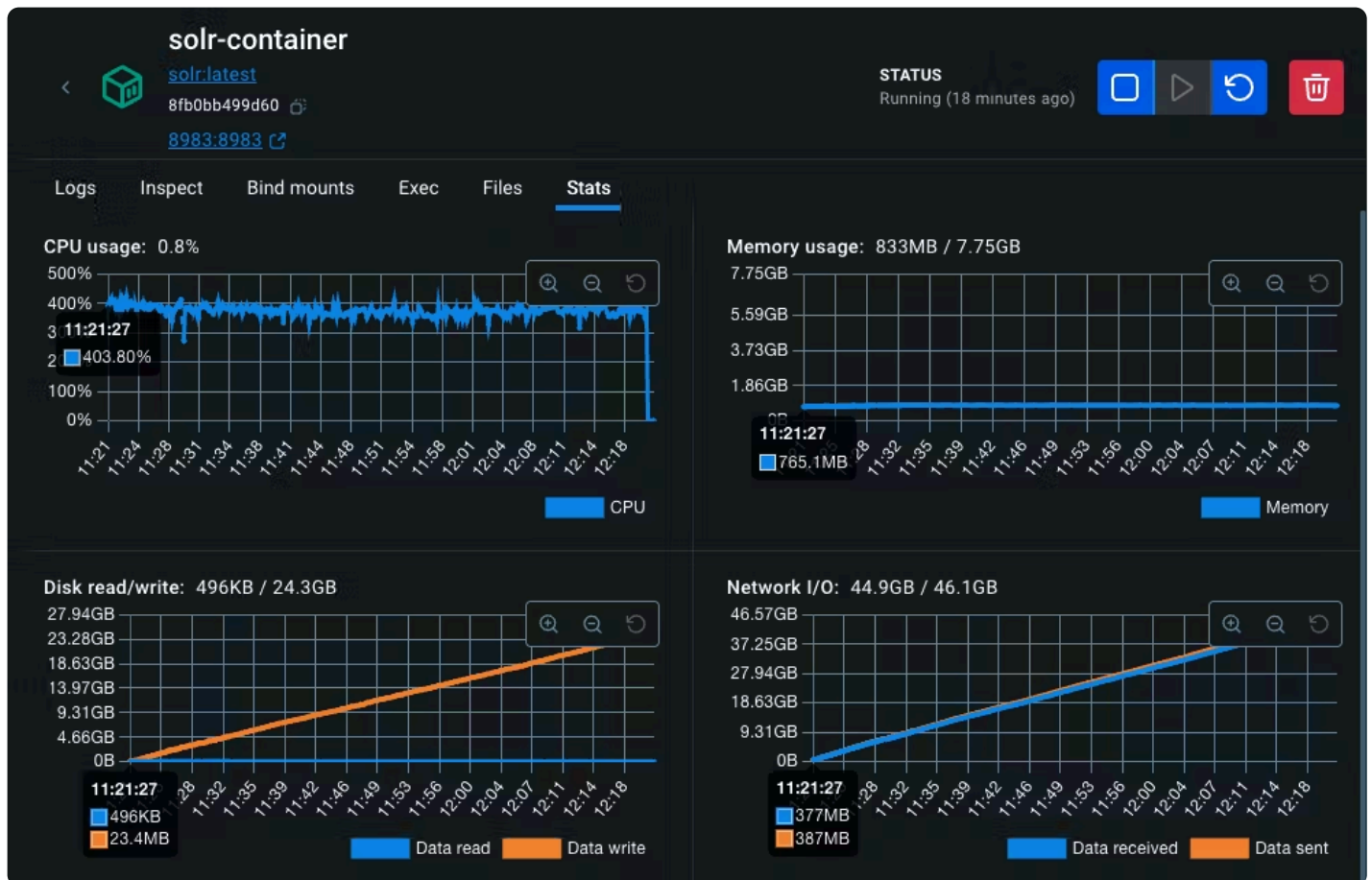
- Aggregate report
 - After

Label	# Samples	Average	Median	90% Line	95% Line	99% Line	Min	Maximum	Error %	Throughput	Received KB/sec	Sent KB/sec
Select_from_SOLR	54426552	1	1	2	3	6	0	1058	0.00%	15119.1/sec	11531.25	10231.95
TOTAL	54426552	1	1	2	3	6	0	1058	0.00%	15119.1/sec	11531.25	10231.95

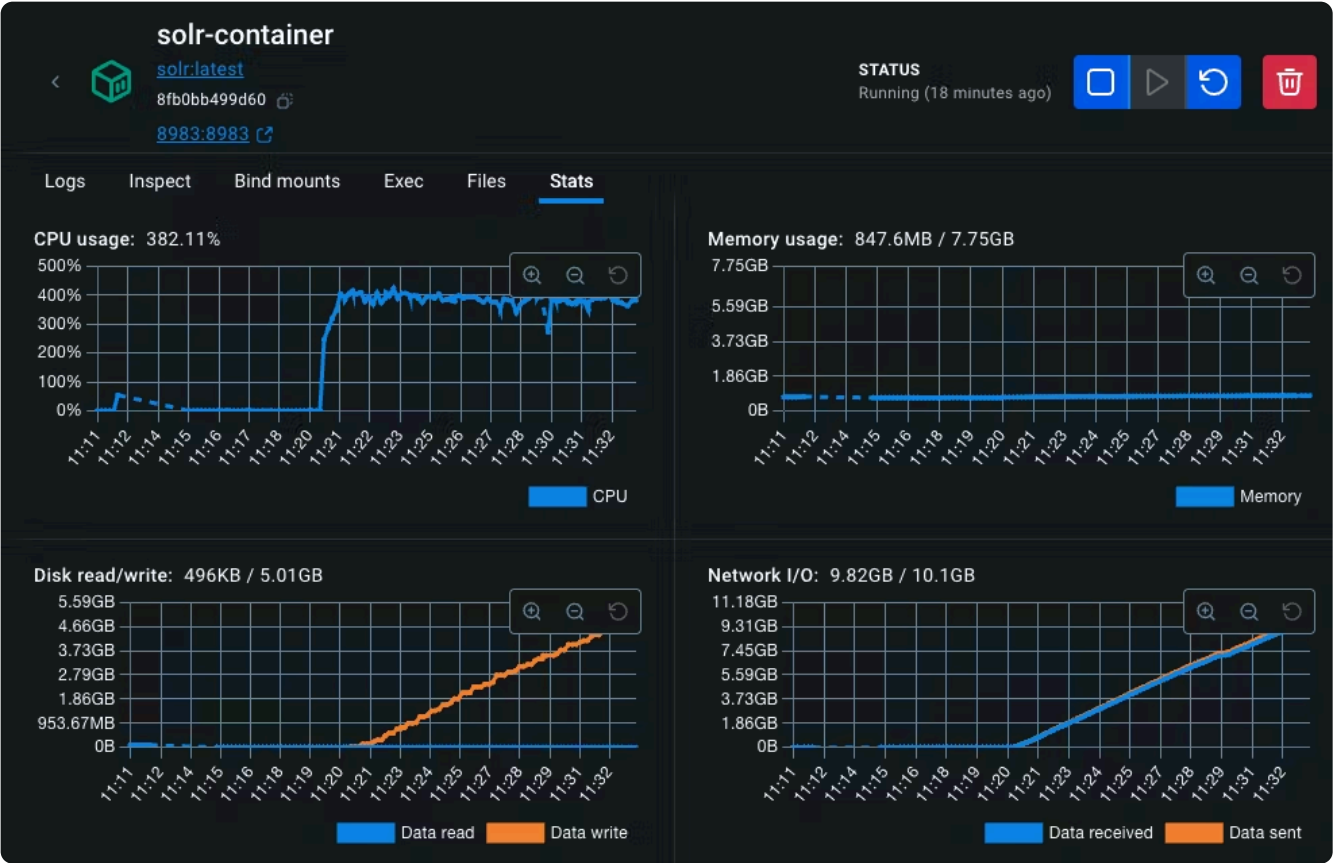
- During

Label	# Samples	Average	Median	90% Line	95% Line	99% Line	Min	Maximum	Error %	Throughput	Received KB/sec	Sent KB/sec
Select_from_SOLR	9890814	1	1	2	3	6	0	1058	0.00%	15544.7/sec	11855.84	10519.97
TOTAL	9890820	1	1	2	3	6	0	1058	0.00%	15544.7/sec	11855.84	10519.97

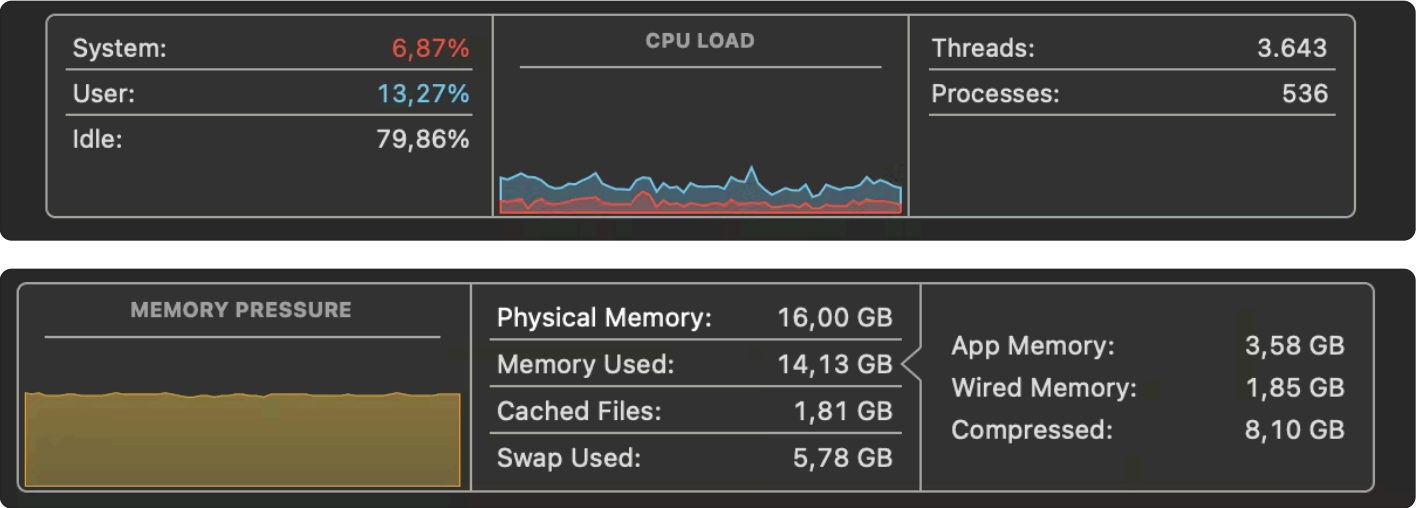
- Docker
 - After



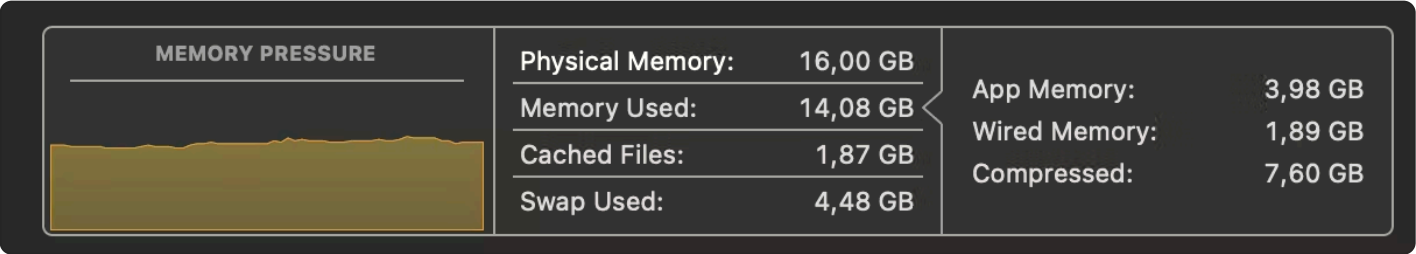
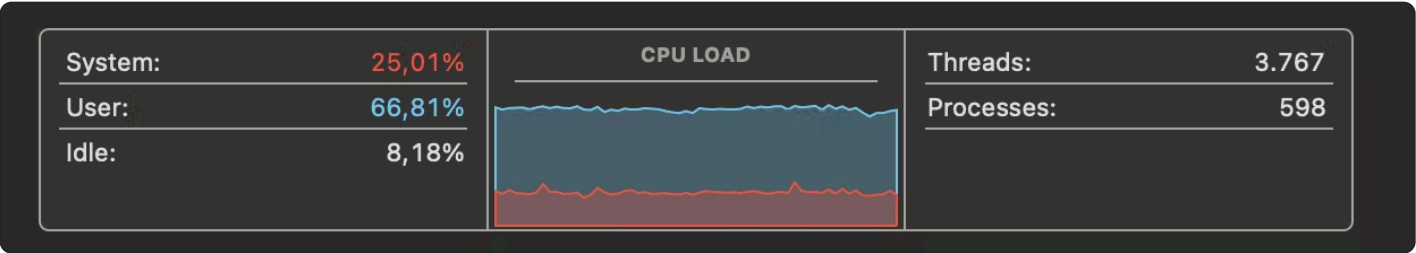
- During



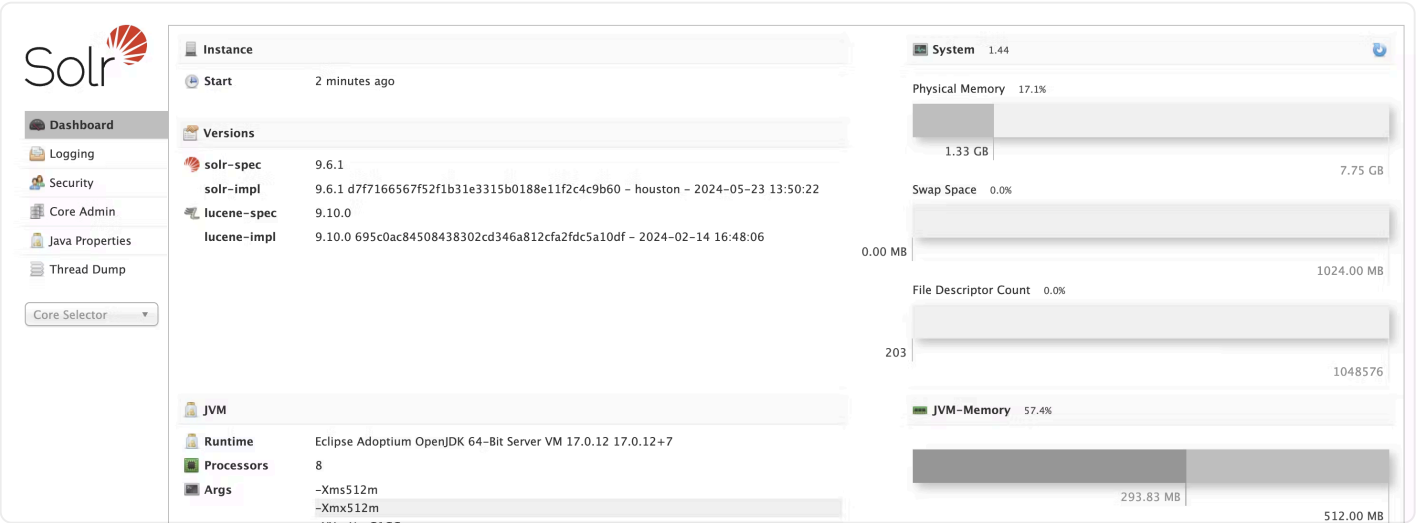
- CPU/Memory
 - After



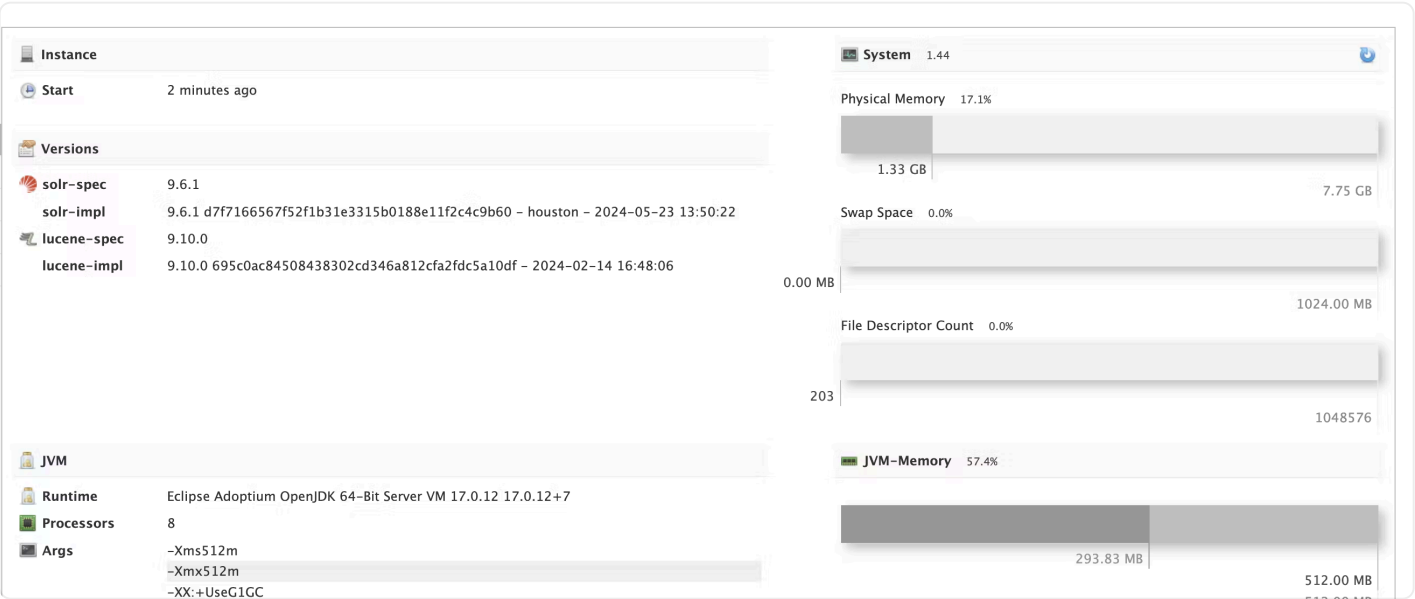
- During



- SOLR
 - Before



- After



Conclusions:

- 0% error rate
- CPU <85%
- Memory<95%

Based on the results, we will run load test for 1h for the same scenario.