Data proliferation and machine learning: The case for upgrading your servers to Dell PowerEdge R7625 servers powered by 4th Gen AMD EPYC processors

Principled Technologies examined the performance improvements and cost savings associated with upgrading to the 16th Generation Dell PowerEdge R7625 for machine learning algorithms

We used the HiBench benchmark to understand the benefits of upgrading from the 15G Dell ™ PowerEdge™ R7525 server to the 16G Dell PowerEdge R7625 server powered by Broadcom® network interface cards (NICs) and PERC 11 storage controllers. Both servers feature two AMD EPYC™ 64-core processors for a direct core-to-core generational comparison. Our results demonstrate that organizations can potentially save money by consolidating older servers with higher-performing, newer servers that each do more work.

70.0%
higher k-means throughput*

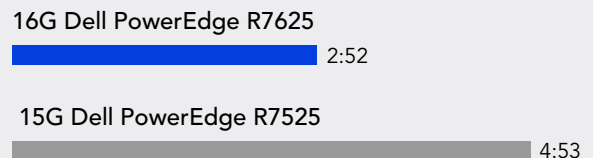**K-means throughput gen vs. gen**
MB/s | Higher is better

16G Dell PowerEdge R7625
1,384,859,005

15G Dell PowerEdge R7525
814,173,092
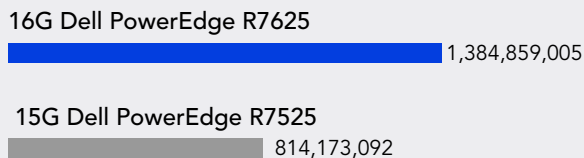
Complete k-means clustering workloads in
41.2%
less time*

K-means time gen vs. gen
Time (m:ss) | Lower is better

16G Dell PowerEdge R7625
2:52

15G Dell PowerEdge R7525
4:53

19.5%
higher Bayes throughput*

Bayes throughput gen vs. gen
MB/s | Higher is better

16G Dell PowerEdge R7625
51,364,850

15G Dell PowerEdge R7525
42,956,387
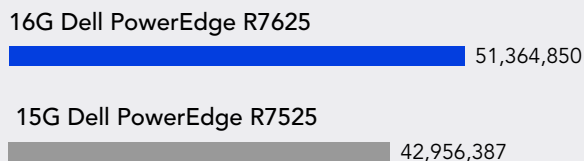
Complete Bayes workloads in
16.3%
less time*

Bayes time gen vs. gen
Time (m:ss) | Lower is better

16G Dell PowerEdge R7625
0:25

15G Dell PowerEdge R7525
0:31
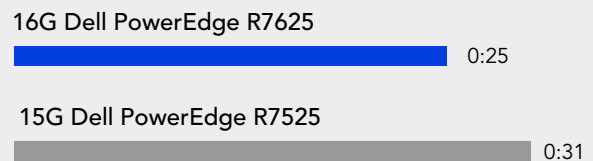
Get the same k-means performance with two Dell PowerEdge R7625 servers as three Dell PowerEdge R7525 servers and **save up to $10,178.99 per year on Red Hat OpenShift Platform licensing alone**. Save potentially even more with reduced datacenter power, cooling, and rack space.

Learn more at https://facts.pt/HqXEuP2

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