

Server Virtualization

Utilizing virtualization servers at our datacenter will increase operational efficiency and cut spending costs by nearly 65% over the next three years. By virtualizing 80% of our current servers onto virtual machines we can experience various IT benefits, including reduced server incidents and downtime. Cost savings will come from running 280 servers far more effectively.

Our company needs to focus on business continuity as a top priority. Virtualization will reduce the amount of disruption to business operations. By fully utilizing the computing power, 10 physical servers can be consolidated onto a single virtual machine. Administrators are able “to seamlessly move live VMs between physical server hosts without having to first power them down.” Referring to table 1, virtualization reduces occurrences of server incidents by 27% and downtime by 26%. These reductions will allow our IT department to operate more effectively and efficiently by providing considerable benefits to the organization.

Investing in virtualization will cut costs by \$9,200,000 over three years. Current server costs are \$14 million per cycle, with \$8 million spent on initial purchase costs and \$6 million spent on maintenance. Cost savings will come from reduced “operational overhead of staffing, powering, backup, hardware, and software maintenance” (Ferro). Virtualization will allow the company to reduce this number of servers to 280 in total, with 80 virtual and 200 physical machines. Initial costs and maintenance for the 80 virtual machines will only cost \$2 million over three years. The remaining physical servers will cost \$2.8 million, bringing the investment total to \$4.8 million. This represents a 65% savings or \$9,200,000.

References

Mah, Paul. "Six Reasons Small Businesses Need Virtualization." *CIO*. CXO Media Inc, 11 Jan. 2012. Web. 26 Feb. 2014.

Ferro, Greg. "Top 5 Benefits of Server Virtualization." *Petri IT Knowledgebase*. Blue Whale Web, 23 Mar. 2012. Web. 26 Feb. 2014.

"Business and Financial Benefits of Virtualization." *VMware Technology & Virtual Machine Software*. VMware, 2011. Web. 26 Feb. 2014.

Significant Statistics

OPERATIONAL BENEFITS OF VIRTUALIZATION	OVERALL
Number of new projects increased by	21%
Application time to market improved by	22%
Rework and testing improved by	26%
Server incidents reduced by	27%
System downtime reduced by	26%

Table 1. Significant Operational Findings of Benchmark Study Research