INTRODUCTION TO STORMAGIC
USE CASES AND BENEFITS

STORMAGIC SIMPLIFIES I.T. STORAGE

SVSAN IS A SIMPLE SOLUTION
Minimal hardware, lightweight software

REDUCE YOUR I.T. SPEND
Boost productivity & increase ROI

LOWER CAPEX AND OPEX
By at least 40%

CONFIGURATION FREEDOM
No vendor lock-in or strings attached

ELIMINATE COSTLY, COMPLEX PHYSICAL SANs

END DISRUPTION & DOWNTIME
Caused by I.T. problems

BUILD A RESILIENT SOLUTION
Inspires confidence - no single point of failure

KEEP SYSTEMS ONLINE
And mission-critical applications
INTRODUCTION

StorMagic simplifies IT storage. In contrast to the numerous competing solutions in the storage market, StorMagic SvSAN is not complex, expensive or difficult to manage. At its heart is an ambition to give your organization simple virtual storage. It makes the complex simple.

StorMagic SvSAN ensures your organization can keep critical processes and systems running 24/7, from headquarters to the most remote locations imaginable. Remove the threat of lost productivity and revenue due to IT hardware failure and keep data secure and always available.

Keep retail point-of-sale (POS) systems online even if a server fails in the store. Keep warehouse inventory applications running while the IT staff carry out routine maintenance. Keep wind turbine sensors online even when a power outage takes out a datacenter.

THE BUSINESS BENEFITS

To achieve all of this, you could be forgiven for assuming that SvSAN comes with a significant price attached. But it doesn’t. With its low hardware requirements and easy management, SvSAN saves your organization both time and money. Its simplicity ensures you spend less on physical hardware, less on the maintenance and upkeep of that hardware, less on power and cooling, and less on human resource to keep the solution running. SvSAN has been proven to lower capital expenditure (CAPEX) and operating expenditure (OPEX) by at least 40% each - and in some cases, much more. That’s money that can be used for other critical projects in your organization.

Less downtime caused by IT infrastructure will manifest itself in a number of benefits for your organization. Happier customers and clients result from systems that are consistently available and online, while stores or factories remain operational and staff can work without disruption. By removing the interruptions caused by IT failure or maintenance, your organization is more efficient, and less budget is required for IT. With increased productivity and less spend, the ROI on the money you do spend on IT and SvSAN will be far higher.
HOW SvSAN WORKS

SvSAN can do all of this by simply sharing (mirroring) data across two low-cost servers (nodes). The two nodes mirroring data are collectively known as a cluster. Rather than have all your eggs in one basket and have single points of failure in your IT deployments, SvSAN introduces redundancy into your infrastructure. This means you can take a server offline for maintenance, and still keep data online and applications running on the other server. This is known as a highly available system. Despite disruptions to the infrastructure, the data remains available to the applications and to your organization to keep things going.

You don’t need complex, expensive hardware to use SvSAN. Its low requirements mean it can be operated on any standard server model with any combination of storage types. There’s no requirement to buy new hardware either. If you already have servers that you’re happy with, SvSAN can simply be installed onto them. Unlike many of our competitors who will force you down a path of expensive upgrades or entire hardware refreshes, StorMagic grants the flexibility to do what your budget and ambition allows. There is no requirement to favor specific hardware manufacturers and SvSAN is compatible with VMware vSphere, Microsoft Hyper-V and Linux KVM hypervisors.

COPING WITH FAILURE

Mitigating the impacts of IT failure is why SvSAN exists. As outlined earlier, it allows an organization to endure a failure or perform maintenance with no interruption to operations. To achieve this, SvSAN uses a “witness service”. The witness service is the third member of the infrastructure alongside the two nodes. It monitors the SvSAN cluster’s “heartbeat”. If one node is taken offline through failure or maintenance, the witness ensures the remaining node operates normally and when the other node is brought back online, that both resynchronize correctly.

Taking one node offline in a two node cluster can leave the remaining node vulnerable however. While the other is offline, this remaining node becomes a single point of failure. To properly guard against this scenario, SvSAN can be deployed as a three node cluster. This ensures that if one node goes offline, the remaining two continue to operate as normal and still provide mirrored, highly available storage.
ACCOMMODATING FUTURE GROWTH

Growing your organization with StorMagic SvSAN is straightforward. Adding additional capacity to existing hardware can be done without disruption, as can upgrading your SvSAN licenses. Entire hardware refreshes can also be completed with no impact on your organization. Each server in the cluster can be taken offline, upgraded and then brought back online in turn while the remaining online server maintains data availability.

All of the features necessary to allow your organization to keep data available and online at a low cost are available with an SvSAN license. There are also two performance and security-enhancing add-ons available, which are SvSAN's caching and data encryption features. SvSAN's caching features are collectively known as Predictive Storage Caching, and this is necessary for more intensive workloads. Data encryption ensures any data handled by SvSAN is encrypted and protected with an ultra-secure algorithm. All of SvSAN's features can be explored in more detail on the StorMagic website.

PURCHASING SvSAN

Purchasing SvSAN is very simple. The software comes as a license, with one license required for each server (node). A typical 2-node SvSAN deployment would therefore require two licenses. An SvSAN licence is perpetual - once you’ve bought it, that’s it. It’s yours forever. SvSAN is licensed in tiers, based on the amount of data that is shared, or mirrored, between the two servers. There are four tiers: 2TB, 6TB, 12TB and unlimited TB for the largest projects. Upgrading from one tier to another is very simple and can be done without disrupting your organization.

To make purchasing easier, we partner with leading server manufacturers like Cisco, Lenovo, HPE and Dell in various ways, should you wish to purchase new hardware when buying SvSAN. We also have a global network of channel partners (VARs) that are also capable of meeting your configuration and purchasing needs. These arrangements can take the hassle out of architecting your infrastructure while ensuring you get the best deal possible for your organization.

SUPPORT

StorMagic pre-sales and post-sales support is world class and is frequently cited by customers as a key factor in their decision to select SvSAN. StorMagic can assist your organization right from the start of the procurement process, helping you to determine what you need and when. The team can provide support with the initial deployment and are on-hand to help with any matters that might arise after SvSAN has been installed. One year of support is included with every SvSAN license purchase, with the option to extend support to three and five year periods as well.

WORLD CLASS SUPPORT
REAL WORLD APPLICATIONS OF SvSAN

Keeping E.ON’s wind turbines moving - even if there’s no wind!

Wind turbines are enormous, complex pieces of machinery. Such is their size, if the blades of each turbine stop rotating their weight will permanently damage the generator. As such, they need to be constantly moving, which is no problem when the wind is blowing, but when it stops, software is used to keep the blades turning at a very slow speed to prevent generator damage. If the servers running the software go down, the turbines are in big trouble. SvSAN is installed on the servers at over 100 of E.ON’s remote wind turbine facilities to make sure that if there are any failures, service is not interrupted and the blades keep on turning.

Delivering protection from localized fire, flooding or power outages

A localized disaster can be catastrophic for any organization, producing significant disruption and almost certainly lost productivity. This is particularly the case for IT systems which are often collected together in a single room or closet. US fitness equipment manufacturer Keiser chose to deploy SvSAN as a stretched three node cluster, locating each server at a different corner of the factory. SvSAN’s tolerance of low bandwidth, high latency links means a cluster’s nodes can be separated by hundreds of kilometres. Keiser not only benefit from highly available storage, but also added resiliency to their IT infrastructure - any disruption in one area of their facility will not impact the overall IT system.

Simplifying a retail chain’s IT across more than 2000 stores

A retail business makes money by selling things, and it can’t do that if it’s stores close because the IT systems are down. SvSAN was brought in by a large US retailer with more than 2000 stores across the country to put an end to 600 hours of outages every year. With an SvSAN two node cluster at each store, the retailer has virtually eliminated unplanned downtime. Furthermore, with SvSAN’s low requirements, it has reduced hardware costs by a third.
MORE INFORMATION AND NEXT STEPS

There is a wealth of information available on the StorMagic website, www.stormagic.com and SvSAN’s capabilities and features are covered in detail across an extensive collection of white papers. Learn how SvSAN can be used in different environments and industries in case studies, or sit back and watch experts from StorMagic talk you through the product in recorded webinars and videos.

Additional details on SvSAN are available in the Technical Overview which details SvSAN’s capabilities and deployment options.

If your organization is ready to test SvSAN, you can do so free of charge, with no obligations. Simply download our fully-functioning free trial of SvSAN from the website.

If you still have questions, or you’d like a demo of SvSAN you can contact the StorMagic team directly by sending an email to sales@stormagic.com.