Challenge

Enterprises are generating tremendous amounts of data, with no sign of slowing down. Traditional storage systems are struggling to keep up and the challenge of reliably managing, storing, and protecting business critical data is on IT teams. However, IT budgets are not growing at the same pace as the data growth and in some cases, budgets are declining. What is IT going to do?

Solution

Deploying SwiftStack object storage with Silicon Mechanics hardware enables IT to cost efficiently store and manage this rapidly growing data, with a solution that easily scales from a handful of terabytes to exabytes. The SwiftStack platform simplifies storage management, is highly scalable, and offers seamless integration with existing enterprise systems and infrastructures across multi-geographic data centers.

Built on industry standard hardware from Silicon Mechanics, the SwiftStack solution lowers total cost of ownership (TCO) by enabling IT to leverage the next-generation Software Defined Storage (SDS) infrastructure, instead of paying massive premiums for proprietary storage solutions.

To help you get started quickly, Silicon Mechanics and SwiftStack have designed and tuned hardware platforms that scale from small deployments - such as test/dev environments - up to petabyte-scale clusters that are geographically distributed. Experts from Silicon Mechanics will assist you through the design and deployment processes, as well as offer training services, 24x7 support, and on-demand on-site assistance for the entire solution.

Highlights

- Fully Integrated Solution
- 24x7 Premium Support
- Lower TCO

Key Features

- Software Defined Storage
- Limitless Scalability
- Geographic Distribution

Use Cases

- Unstructured Data Storage
- Web/Mobile Applications
- Backup & Archive
- Disaster Recovery
# Turnkey Object Storage: SwiftStack Meets Silicon Mechanics

<table>
<thead>
<tr>
<th>Cluster Size</th>
<th>Capacity</th>
<th>Expanded by...</th>
<th>Use Cases</th>
<th>Example Architecture</th>
</tr>
</thead>
<tbody>
<tr>
<td>Test</td>
<td>&lt; 50TB</td>
<td>Nodes</td>
<td>Test/Dev and Unstructured Data</td>
<td>Single PACO* Node</td>
</tr>
<tr>
<td>Small</td>
<td>50TB &lt; 250TB</td>
<td>Nodes</td>
<td>All of the above, plus: • Web/Mobile Apps • Backup &amp; Archive • Disaster Recovery</td>
<td>Multiple PACO* Nodes</td>
</tr>
<tr>
<td>Medium</td>
<td>250TB ≤ 1PB</td>
<td>Racks</td>
<td>All of the above</td>
<td>• 2-Tiers: Proxy and ACO Nodes • 3-Tiers: Proxy, AC and O Nodes</td>
</tr>
<tr>
<td>Large</td>
<td>&gt; 1PB</td>
<td>Many Racks</td>
<td>All of the above</td>
<td>Custom Configuration</td>
</tr>
</tbody>
</table>

## Example Node Types

**P/PAC/AC/Gateway**
- Use for Proxy, Account, Container and Filesystem Gateway services
- Specifications:
  - 1U Rackmount Server
  - Dual Processor with 24 DIMM Sockets
  - Up to 24 cores and 768GB RAM
  - 8 Hot Swap SAS/SATA Drive Bays
  - Uses SSD for Account and Container
  - 1GbE and 10GbE interfaces
  - 1GbE Management Interface
  - 10GbE Cluster/Client/Replication networks

**PACO/ACO/O**
- Use for Proxy, Account, Container, and Object Storage services
- Specifications:
  - 4U Rackmount Storage Server
  - Dual Processor with 16 DIMM Sockets
  - Up to 24 cores and 512GB RAM
  - 36 Hot Swap SAS/SATA Drive Bays
  - 1GbE and 10GbE interfaces
  - 1GbE Management Interface
  - 10GbE Cluster/Client/Replication networks
  - Up to 200TB (raw) capacity per node

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**About Silicon Mechanics**

Silicon Mechanics, Inc., is a leading provider of servers, storage and high performance computing technologies to the world’s most innovative organizations. Since 2001 Silicon Mechanics has supported customers with its “Expert included.” approach, reflecting the company’s passion for providing complete customer satisfaction and customer confidence in the return on their technology investments. Recognized as one of the fastest growing companies in the greater Seattle technology corridor, Silicon Mechanics is changing the way systems providers engage with customers.

**About SwiftStack**

SwiftStack is an industry leading software-defined storage company. With OpenStack Swift at its core, SwiftStack offers a flexible and powerful software platform that allows operators to deploy, integrate and scale on standard hardware.