GETTING STARTED

If you are like most executives, buying technology can be exciting, hopeful, uncertain, frustrating and everything in between. You must identify requirements, weigh competing needs, evaluate capabilities, assess ROI and consider a host of other factors – all of which can be overwhelming, especially when they involve new delivery models like managed services.

The CompTIA Buying Guide for Managed Services is designed to provide you with a starting point.

From providers to pricing to contracts terms, there are many elements you should consider when deciding whether to engage a managed services provider (MSP) for some or all of your IT needs. Even for the most tech-savvy of businesses, evaluating managed services can be a complicated and challenging endeavor.

Computing Technology Industry Association (CompTIA) designed this guide to assist you in navigating the decision-making process for a managed services engagement. This guide is not intended to be a Consumer Reports-style product review, but rather a framework for “asking the right questions” to ensure that you are making an informed decision.

What you will find in the CompTIA Buying Guide for Managed Services:

1. OVERVIEW
   • What are managed services?
   • Who are managed services providers?
   • How are managed services delivered?
   • How are managed services purchased?
   • What IT functions are delivered as managed services?

2. CONSIDERATIONS
   • What are the benefits of managed services?
   • What are the challenges of managed services?
   • What are sample business cases for managed services?

3. QUESTIONS
   • What are the MSP’s capabilities and offerings?
   • What are the MSP’s data protection and accountability policies?
   • What is the MSP’s level of support?
   • What is the MSP’s expertise?
   • What are the MSP’s costs and contract terms?
The term “managed services” is at best vague and at worst confusing. As a technology buyer, this can make it more difficult for you to search for a managed services provider (MSP), frame a conversation with a potential provider and, ultimately, decide what’s best for your organization’s IT needs.

That’s a shame since the potential benefits of the managed services model can hold significant value for your business – no matter its size. Indeed, there’s no “one size fits all” in managed services. By its nature, the model is scalable and, therefore, can address the smallest, most discrete technology need for one company while also tackling the full range of IT demands for another.

To get a better understanding of managed services, let’s clarify the definition:

**WHAT ARE MANAGED SERVICES?**

The central tenet of the managed services model is a provider-customer relationship based on a contract backed by a service level agreement (SLA).

In practice, the managed services model is a form of outsourcing that involves contracting with a third-party MSP to handle one or more of your company’s IT services, such as email, help desk, security, etc. The MSP is tasked with remotely monitoring, updating and managing your IT services as part of a contractual arrangement that typically spans one to three years. The MSP’s work is guaranteed under the terms of an SLA, which usually covers performance expectations and metrics, such as Internet uptime and 24/7 support as well as remediation steps and remuneration should something go wrong.

Additionally, an MSP may offer reporting on not only the technical actions that have been taken to maintain your IT solutions, but also intelligence gleaned from data, traffic patterns and activities that will allow your organization to make tactical and strategic decisions that can improve your business performance.

Similarly, today’s MSPs are spending an increasing amount of time with their customers on strategic issues outside of the day-to-day tech concerns. While quarterly business reviews are standard operating procedure, four in 10 MSPs surveyed by CompTIA in 2016 said they spent time – in person or virtually – with their clients’ business and technology stakeholders on a monthly basis in order to help them plan for future needs and align technology with business goals.
WHO ARE MANAGED SERVICE PROVIDERS?

Enterprises have long turned to large business process outsourcing outfits, such as Accenture or IBM Global Services, to handle some or all of their custom software development projects and other major IT initiatives or departmental functions. That said, the typical MSP is smaller and focuses on delivering basic IT services, such as remote desktop monitoring, security patching and maintenance, and other functions.

CompTIA research estimates six in 10 technology-based channel companies provide at least some level of managed services offerings, while also continuing to operate a business that sells technology products and repair work.

HOW ARE MANAGED SERVICES DELIVERED?

MSPs use their own data centers for remote monitoring, contract with a hosting center, or increasingly take advantage of the cheap compute available via the major cloud infrastructure providers such as Amazon and Microsoft. They are managing not only their customers’ on-premises infrastructure, but also those workloads and applications that reside in the cloud. MSPs increasingly are taking on the role of “cloud orchestrator.”

Indeed, only 4 percent of MSPs surveyed by CompTIA said they don’t support cloud services. More than half (54%) say cloud services are a strategic offering while 44% support cloud services on customer request.

Specifically, there are three primary ways that managed services can be delivered.

- The first is monitoring your on-premises network and applications remotely. To do this, MSPs often install a system of electronic “agents” that collect trending data, monitor for problems and report performance back to the MSP’s data center. Many providers also use specialized professional services automation (PSA) and remote monitoring and management (RMM) platforms to manage your services and their own internal operations.
- The second way MSPs deliver managed services is providing cloud-based infrastructure and application services from their own data center or by reselling services of cloud services provider.
- The third is a mix of both on-premises monitoring and cloud delivery.

HOW ARE MANAGED SERVICES PURCHASED?

As with other utilities, you pay for managed services on a subscription basis, creating an operational expense rather than a hit to your capital budget for on-premises infrastructure. Note: Often there are capex charges associated with the lifetime of a managed services contract for such items as on-premises infrastructure upgrades and on-site visits.

Managed services subscription terms vary from month-to-month to annual – paid upfront or monthly. Note: While there are some pay-as-you-go models, particularly for cloud-based applications, many MSPs...
will require term agreements of 1-3 years for managed services contracts, although that is also changing as the market is seeing more month-to-month arrangements.

The subscription price typically is determined by one or more of the following variables:
- Number or types of services managed
- Number of users or devices
- Types of features delivered

WHAT IT FUNCTIONS ARE DELIVERED AS MANAGED SERVICES?

The types of managed services available on the market today are quite varied. Depending on the scope of your company’s IT needs, you can choose to outsource a single service to a third-party MSP or opt to contract for an integrated, more comprehensive suite of services. The list below is by no means exhaustive, but offers a solid foundational catalog.

### Common Types of Managed Services

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<th>Service Type</th>
<th>Description</th>
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<tr>
<td><strong>MANAGED NETWORKS &amp; INFRASTRUCTURE</strong></td>
<td>These services include managed IP VPNs, which are widely used for secure, high-performance and cost-effective networking. Also, managed hosting and storage services fall into this category. These services eliminate the cost of owning and running a data center — the MSP will provide that back-end under an SLA. Likewise, managed LAN and WAN services also help to reduce total cost of ownership (TCO).</td>
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<td><strong>MANAGED SECURITY SERVICES</strong></td>
<td>This type of managed service provides a broad range of solutions from patch management to antivirus, malware and other remote security updates.</td>
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<td><strong>MANAGED COMMUNICATIONS SERVICES</strong></td>
<td>This managed service merges data, voice, and video services on the same IP network. It also can include a managed contact center that combines traditional call center features with intelligent IP call routing and integrates e-mail, phone, Web, instant messaging, fax, and other human or automated forms of customer contact.</td>
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<td><strong>MANAGED WIRELESS &amp; MOBILE COMPUTING SERVICES</strong></td>
<td>Like managed hosting and storage, this service enables wireless capabilities without the capital expenditure and implementation.</td>
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<td><strong>MANAGED PRINT SERVICES</strong></td>
<td>Often grouped just outside the larger framework of managed services, managed print enables remote monitoring, updating and management of an organization’s document management infrastructure.</td>
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<td><strong>MANAGED SUPPORT SERVICES</strong></td>
<td>This service handles traditional help desk responsibilities, including trouble ticketing for IT problems among employees and resolution mechanisms.</td>
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<td><strong>BUSINESS INTELLIGENCE/DATA ANALYTICS SERVICES</strong></td>
<td>Increasingly MSPs are capturing and analyzing data that reveal trends and patterns that clients can act upon to further their business goals. Case in point: Trending information on peak Internet usage times around e-commerce. If an MSP can provide a timeline of peaks and valleys in traffic on a quarterly basis, customers can make adjustments to their marketing, sales staffing, supply chain and inventory plans.</td>
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<td><strong>MANAGED CLOUD INFRASTRUCTURE SERVICES</strong></td>
<td>With managed cloud, the MSP’s or cloud provider’s engineers manage the customers’ computing, storage, networks and operating systems. It also may include managing the tools and application stacks (e.g. databases, ecommerce platforms and DevOps tools) that run on top of that infrastructure. Often customers can choose which functions to manage in-house and which to outsource to the service provider. In some cases where there are multiple cloud providers, the MSP fulfills the role of “cloud orchestrator.”</td>
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<td><strong>MANAGED SOFTWARE AS A SERVICE</strong></td>
<td>Software-as-a-service (SaaS) delivery is inherently managed. The provider hosts and delivers the application to the customer and makes sure that it is constantly updated and improved. In some cases the MSP is the SaaS provider and in others it resells the services and assists with integrations to other on-premises and cloud applications.</td>
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Any business investment decision requires you to weigh a range of factors, including the needs of your company’s stakeholders and alignment with your corporate objectives as well as the functional requirements, pros/cons and total cost of ownership (TCO) for each solution.

As a foundation for evaluating your potential investment in managed services, this buying guide reviews some of the considerations — benefits and challenges — that should be factors in your decision. In addition, it includes a few examples of scenarios where managed services make business sense.

**WHAT ARE THE BENEFITS OF MANAGED SERVICES?**

Nearly two-thirds (64%) of organizations are using managed services for at least one IT function, according to a 2015 CompTIA study of technology buyers.

There are many reasons why an organization may decide to turn over some or all of its IT functions to an outside provider. CompTIA research finds that the drivers can range from the desire to reduce costs and secure predictable pricing for routine IT expenses to the belief that an outside party can provide top-notch security, uptime and general peace of mind.

**WHAT ARE THE CHALLENGES OF MANAGED SERVICES?**

For some companies, the main hurdle in moving to managed services lays with their internal IT staff, who understandably are concerned about the security of their jobs as a result of outsourcing. And yet CompTIA research in 2015 found less reason to worry than some might think. More than half (53%) of companies that are using managed services today said they have kept their internal IT headcounts exactly the same as they were before onboarding.

**Top 10 Factors Driving Managed Services Adoption**

1. Improve security
2. Proactive approach to IT problems
3. Better uptime
4. Gain access to newer technologies
5. Cost savings over in-house IT
6. Peace of mind
7. Free internal staff for strategic work
8. Tap into cloud solutions
9. Lack of internal IT
10. Handle remote office IT
their MSP. Another 15% of companies simply had no internal IT staff to begin with so using an MSP was simply a way to bring professional technology expertise into the operation. A quarter made some reductions to head count internally, but only 6% actually eliminated their in-house staffing as a result of adopting managed services.

What’s more likely to happen with the addition of an MSP contract is that internal IT staff are freed from routine tasks of running the network, applications, devices and user help desk to instead focus on strategic projects that drive revenue and further the core mission. Moreover, the services model enables internal IT staff to work with the MSP to gain access to newer technologies, such as cloud and mobility solutions, in a faster, more economical way than implementing offerings on-premises.

While you can assuage the job concerns of your IT staff, there are some other challenges that should be considered before engaging a managed services provider (See list: Managed Services Challenges). Many of these can be overcome, but you should understand them and be prepared to discuss them with your prospective MSP.

ONLY 6% OF COMPANIES ELIMINATED THEIR IN-HOUSE STAFF AS A RESULT OF ADOPTING MANAGED SERVICES.

Managed Services Challenges

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<td>BROADBAND DEPENDENT</td>
<td>Remote management of even on-premises equipment is highly dependent on Internet uptime, reliability and connectivity. You will need to pay special attention to your connectivity, including available bandwidth and redundancy.</td>
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<td>INTEGRATION CHALLENGES</td>
<td>Few IT systems or applications operate in isolation. Cloud-based services inevitably will need to interact with other cloud or in-premises systems or applications. Integration can be a significant challenge.</td>
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<td>UNEXPECTED COSTS</td>
<td>While the barrier to entry with managed services appears low (due mostly to the utility-like billing involved), there can be upfront costs that need to be accounted for. Often prior to the start of routine billing per terms of the contract, many MSPs will require an upfront assessment of the network for which they charge separately on a project-fee basis. Likewise, there may be infrastructure purchases such as new servers and other devices that must be made to accommodate the new managed services operation. These transactions usually are not rolled into the managed services monthly contract bill, and should be regarded as capex investments.</td>
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<td>CONTRACT LOCK-IN</td>
<td>What happens if the provider isn’t working out? If an exit clause or other strict terms of disengagement aren’t written into the SLA, you may have to wait until the contract termination date to sever ties with your MSP.</td>
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<td>EXPERTISE GAP</td>
<td>MSPs can’t be all things to all people. This is especially true in terms of technical acumen around specific vendor products/services. For example, some may be certified experts in Cisco or Microsoft, but lack Apple knowledge. You need to be sure to map your environment to the MSP’s skills area.</td>
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<td>FLEXIBILITY &amp; CONTROL TRADEOFFS</td>
<td>Are you an organization that prefers stringent in-house controls and flexibility or are you comfortable with a common set of practices provided by an MSP? Addressing this fundamental outsourcing question will go a long way to determining your company’s readiness for managed services.</td>
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<td>REGULATORY REQUIREMENTS</td>
<td>Are you an organization, such as a financial or health care institution, that is beholden to any number of compliance and regulatory requirements? Federal and state laws regarding privacy, data breach notification and much more continue to evolve, so you need to make sure to engage an MSP that can help you achieve and maintain compliance.</td>
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<td>PERFORMANCE</td>
<td>Performance depends on the provider, so the requirements and threshold should be clearly established in the service level agreement (SLA).</td>
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<td>SECURITY</td>
<td>While many buyers view managed services as an insurance policy against IT security woes, others are wary that putting their technology in the hands of a third party will put them at further risk. Look for customer references and certifications or credentials (e.g., CompTIA Security Trustmark) that demonstrate expertise in security.</td>
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<td>SERVICE LEVEL AGREEMENTS</td>
<td>Nothing is more important — or potentially detrimental — to a managed services contract than the service level agreement (SLA). Make sure yours is clearly written and includes provisions such as 24/7 support, data security and privacy guarantees, performance targets and a service-cessation mechanism.</td>
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WHAT ARE SAMPLE BUSINESS CASES FOR MANAGED SERVICES?

Clearly, many potential benefits exist within the managed services framework, depending on the type of business you run, your IT needs and corporate culture. It is impossible to predict the specific needs of your individual organization, but here are a handful of scenarios that might serve as examples where managed services could be a great fit.

1 SCENARIO 1: ADDRESSING IT COMPLEXITY

The decision to use managed IT services can be as simple as the lack of an in-house IT department. If yours is a company with just a handful of employees you may rely on the most “technically savvy” among your employees to take on the ad hoc role of the help desk or IT guy when problems arise with devices, software or the network.

As your company grows or adds complexity to its technology slate, this approach isn’t always the most sensible or cost-effective. At this point, your decision comes down to hiring an IT person internally or looking outside to an MSP to take on the management of your network on contract, as you would with any other utility such as electricity or heat.

Depending on the extent of your IT needs, a full-time in-house person makes sense if they are utilized consistent with the wages they are being paid. But if your IT needs ebb and flow or are mostly low-grade with few major initiatives, an MSP that offers pricing commensurate with technology usage or consumption might be the more cost-effective way to go.

2 SCENARIO 2: OFFLOADING DAY-TO-DAY IT MANAGEMENT

Another driver for adopting managed services is offloading routine IT tasks, such as patches, user help desk, adds/moves/changes, etc. These activities do not require a high skill level but they are constant. As a result, you may find that your pet development projects seem to drag on and on because the IT department is always busy with keeping devices, networks and security running and up-to-date.

3 SCENARIO 3: ADDING NEW CLOUD INFRASTRUCTURE & APPLICATIONS

The push to cloud services also can be a reason to consider managed services for your organization — big or small.

Certainly if yours is a sizable business, you can consider building private cloud infrastructure, but increasingly enterprises are outsourcing that too as virtual private clouds. The beauty is being able to take advantage of the economies of public cloud while having the security of a private cloud. In addition, you may find your business is using multiple clouds and needs a way to manage them; some MSPs specialize in orchestrating and managing multi-cloud environments.

What’s important to understand about managed cloud infrastructure is it doesn’t stop at the server and storage, but includes the OS and often databases and other platforms required to support your computing environment.

Cloud applications also are an option, providing flexible, scalable and future-proof environments for your distributed workforce to access information, communicate and collaborate from anywhere and on any device. Instead of moving ahead with a full license, cloud apps are easy for you to test with small groups and rollout to larger workgroups or across departments. What’s more is that the software is continually updated with patches and new features automatically. Plus, your users have access to an experienced help desk as part of the managed subscription service.
Before you move to managed services, there are a series of discussions that you must initiate with prospective MSPs and your internal staff in order to make sure managed services are right for your organization. The following questions offer a suggested framework for those conversations:

**CAPABILITIES & OFFERINGS**
- What metrics are used to assess speed, reliability and overall performance?
- What is your average network uptime performance?
- Are there “good, better, best” tiers of features and capabilities?
- Do you offer on-site hours built into the regular contractual fee?
- Is there flexibility to add or subtract service offerings on the fly, based on need?
- Are you able to not only diagnose problems remotely, but also fix them without customer intervention?
- If customization is required, how is that handled?
- Do you use a commercial software platform to run your managed services operation, like a professional services automation (PSA) software or remote monitoring and management (RMM) software?
- Do you have an official service catalog that describes your offerings and pricing scale?

**DATA PROTECTION & ACCOUNTABILITY**
- What methods are used to protect my data?
- Who owns my data if it is hosted at your facility?
- What happens to my data if you go out of business or are sold to/merge with another firm? Are there portability dictates written into the SLA?
- Are there any guarantees to protect my data against security breaches or data leaks?
- Who can access my data (e.g., insiders, other firms, government agencies, etc.)?
- How is data backup and disaster recovery handled?
- What redundancy is built into the solution?
- Do you use a multitenant environment to host many customers on the same systems?
- Do you use a third-party hosting provider/data center to run your operations? If so, which provider? Are they or you responsible for my data?

**SUPPORT**
- How is support provided (e.g., phone, email, IM)?
- Is emergency support available 24/7?
- What can I expect from your customer help desk?
- How are complex questions escalated?
- Do you offer on-site hours built into the regular contractual fee?
- Do you offer traditional break/fix support for hardware, software and other infrastructure?
- Is there a user forum or other self-serve repository of FAQs?
- What type of training is provided to ensure my staff gets the most out of this investment?
EXPERTISE

- How does your team stay current with new technology developments and trends?
- What percentage of your business is dedicated to managed services vs. other types of business models?
- How many years have you been providing managed services offerings? Are they strategic to what you do?
- What members of your team will be working on my project? Will this change over time?
- What relevant industry credentials or certifications, if any, does your firm or team have?
- What is your level of expertise with the regulatory compliance requirements for my industry?
- If I am required to provide an audit trail to demonstrate compliance, how will this be handled?
- Do you have any customers that are in a similar line of business as mine?
- Can you provide customer references and direct access to customers that have done business with you?

COSTS & CONTRACTS

- What is your fee structure? Are there any extra or hidden fees?
- Do you conduct an upfront network assessment before quoting a fee for the contract? How much does this cost?
- Do you use the same service level agreement for all customers or can we negotiate/collaborate its terms individually?
- Do you offer contract flexibility, such as the option of annual or monthly payments?
- Is there a cap on how much rates can be increased?
- What happens if I want to terminate my contract?
- How do I get my data back?
- Do you have any case studies or ROI assessments to help me understand the cost/benefits of this proposed solution?
- Do you have any comparisons showing the cost of on-premises vs. cloud solutions over time?
- Will I need to purchase any additional infrastructure, software, etc. to use this solution?
About CompTIA

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