

# The IP Telephony / VoIP Business Case

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## **It's inevitable.**

Eventually, IP Telephony will affect your organization's communications infrastructure. Equipment manufacturers are no longer making investments in traditional PBX technology. Over time, organizations using legacy technology may find it increasingly difficult and expensive to maintain their current voice infrastructure.

IP Telephony enables the integration of business applications and processes with an organization's communication services. This, combined with the operational cost savings from a converged infrastructure, improved customer service and enhanced employee productivity can leave those who have not made the transition at a competitive disadvantage.

If you have not yet done an analysis of whether IP Telephony can benefit your organization, begin now. In addition, to the aforementioned reasons that you should conduct an evaluation of the technology benefits, the analysis may reveal some compelling justifications to begin the transition much sooner than you had anticipated.

The first step, of course, is to determine if, and when, a migration is justified. Therefore, you should create a business plan, present the results and acquire the necessary approvals to move forward.

## **The following tips may assist you with this crucial phase:**

- Create a factual and credible business case. While some vendors may offer ROI / TCO analysis at a reduced cost or perhaps even free, the results are often overly optimistic and lack credibility. Typically, they will include questionable cost savings and arbitrary values related to employee productivity and customer service improvements.
- A technology focused business case that lacks quantifiable business benefits will likely never get past the CEO or CFO's desks. Clearly articulate the business drivers and how they complement your company's strategic goals.
- Identify other technology initiatives or challenges in your organization that could benefit from an IP Telephony infrastructure. For example, a municipal government could potentially improve two-way radio communications by integrating disparate radio systems. You may be surprised to discover a compelling IP Telephony ROI based solely on how the implementation will benefit a seemingly unrelated initiative or business challenge.
- It is acceptable to estimate the financial benefits associated with improved customer service or enhanced employee productivity. However, unless you have a verifiable and trusted data source that you are prepared to defend, it is best to leave these values out of the financial analysis and cash flow.

- Limit your financial projections to five years; beyond that it's mostly guesswork.
- Include the cost of maintaining your current services when estimating the payback period. For example, if you are a Centrex customer you will continue to pay monthly charges for these services until they have been transitioned to the new environment. You may also incur financial penalties for early contract termination. Vendor based estimates will sometimes neglect to include these costs in the financial projections.
- Ensure that you have captured all of the costs of your current environment including: maintenance, MACs (moves add & changes), personnel, external support and projected price increases. Also, estimate the cost of any hardware or software additions or changes to the existing infrastructure that will be required during the evaluation period.
- Build flexibility into your financial modeling tools. Include a section for cost assumptions that can be easily modified. Your modeling tool should also include the ability to add, remove or vary the percentage applied to a variety of cost factors.
- Network upgrade cost is often the most significant cost factor in an IP Telephony migration cost analysis. Adding redundancy, increasing bandwidth and hardware replacements to support in-line power and QOS can sometimes destroy the financial justification of an IP Telephony implementation. However, should the IP Telephony business case bare the burden for all of these costs? There are likely other initiatives and unrelated business processes that require, or would benefit from, an improved network infrastructure. The variables you initially incorporated into your modeling tool will allow you to include, exclude or modify the weight of this and other cost factors.

The following is a partial list of the most common benefits attributed to IP Telephony. You should evaluate the relevance and the potential benefits to your organization and include them in your business plan:

- Reduced Long Distance: LD savings was once the primary motive for transporting voice over a data network (VoIP). Today, this factor is often negligible to the business plan. However, if your organization is geographically dispersed, it could be a significant cost component of your financial analysis.
- Improved customer service and employee productivity
- Converged voice and data infrastructure (reduced cost of building and maintaining separate infrastructures and associated personnel)
- Reduced cost for moves, add and changes (An employee can just login to a phone at new location)
- Enhanced business continuity and survivability (Geographic diversity, work from home, etc)
- Instant messaging and presence services (can improve productivity and customer service)
- Find-Me / Follow-Me (can improve productivity and customer service)
- Integrated messaging

- Reduced cost for conferencing (for organization's that currently buy these services, the cost savings can be significant)
- Reduced administration
- Eliminate or reduce recurring costs (Centrex, PRI, etc)
- Reduced maintenance costs

Ensure that your financial modeling has captured all the following cost factors:

### ***Capital Expenditures***

- Data centre facilities upgrades or additions to accommodate hardware requirements of to provide redundancy
- Wiring infrastructure
- UPS for data centres and wiring closets
- Network hardware and software upgrades to support QoS, Admission Control, VLAN segmentation, enhanced security
- Installation of network circuit additions or upgrades to remove bandwidth bottlenecks, increase redundancy or support QoS and Admission Control.
- Training for end users, administrators and support staff
- Network management tool upgrades
- External consultants and services including engineering, configuration, project management and implementation
- Lab equipment (important requirement for large implementations)

### **The IP Telephony specific components:**

- Servers for IP-PBX call signalling and feature servers
- Media servers
- PSTN Gateways
- Session Border Controllers
- IP Phones (Often the highest cost component of the business analysis)
- Software licensing (don't forget licensing costs associated with the phones)
- Voicemail servers
- IM / Presence hardware & software
- Conferencing hardware & software
- Storage devices
- Remote survivability components
- Management tools (FCAPS)

### ***Operational Costs***

- Staff for operations and support
- Hardware maintenance
- Software maintenance
- Voice circuits (PRI, Analogue, etc)
- Data circuits
- Future software upgrades
- Ongoing training

Finally, your business case should evaluate and report on the potential costs and risks associated with **not** making the transition to IP Telephony including:

- Competitiveness
- Ability to acquire and retain customers
- Employee productivity and job satisfaction
- Ability to survive disruptive events (weather, pandemics, etc)

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