Recording and Quality Monitoring Systems – Making the ROI Case

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Recording-based quality monitoring systems ("RBMS") are rapidly penetrating the contact center marketplace, growing – according to one study – by 26% annually through 2006[1]. With growth that rapid, it should be relatively easy to make the business case for adopting these systems. However, as many contact center managers know, making a business case for systems which can cost $1,000-$2,000 per agent station or more, is often more difficult than it appears, especially when the business case is to upgrade from an existing system, rather than purchasing a new system where none existed before.

This paper provides methods for developing a business case for the adoption of a recording-based monitoring system. It examines possible sources of cost-savings and revenue enhancements available with RBMS and provides some tips on developing a business case when the available data is limited. Finally, it suggests using a "service bureau" model for acquiring an RBMS as a way of making the business case easier and more attractive.

A snapshot summary:

- Although either case can be made, it is easier to build a business case for recording-based monitoring systems using cost savings as a rationale than it is to build a business case using revenue enhancement;
- While it is relatively easy to establish the conceptual basis for a business case, the biggest challenge is in quantifying the benefits in a way that applies specifically to a particular contact center;
- Quantifying the benefits is especially difficult when using revenue enhancements as the rationale, even though the magnitude of revenue enhancements is likely to be much larger in impact than that of cost savings;
- The newly introduced "service bureau" model makes the business case for an RBMS much easier. Under most scenarios, the service bureau option provides a higher return on investment and faster breakeven than a purchase model and yields a positive ROI <u>even when the benefits of an RBMS are as little as a 2% savings</u> in call handling, etc.

Making the Business Case for an RBMS

What are the cost savings or revenue increases that can be used to justify the acquisition of a recording based monitoring system (RBMS)? By combining our review of the trade

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[1] "Quality Monitoring Software Market", <u>North American Agent Performance Optimization Software Markets,</u> Frost & Sullivan, 2002, p.2-4

literature, our own call center experience and our experience providing quality monitoring for others, we've developed the following list[2]:

- Higher productivity resulting in fewer required agents
- Reduction in time required to monitor and score a call
- Reductions in schedule disruption associated with call monitoring
- Reduced risk of EEOC-complaints associated with call monitoring
- Reduced turnover because of improvements in morale
- Better customer retention

Since most or almost all call centers do monitor, we compare monitoring with RBMS to monitoring without recording-based systems [3], rather than with no monitoring at all.

<u>Higher productivity reducing the need for agents.</u> The claim of higher productivity is easily the most compelling cost-basis on which to build a business case for RBMS. The claim rests on the argument that monitoring leads to effective feedback to agents, which then results in shorter calls, higher first-time resolution rates, etc. Jon Anton of Purdue University notes that call centers which monitor have ASA (average speed of answer) times that are 19% lower, average talk time 29% lower and after-call work time that is nearly three times lower than those call centers that do not monitor[4].

RBMS systems improve the effectiveness of call monitoring and therefore should bring call centers more of the benefits that monitoring brings. Recording-based monitoring allows for improvements in the representativeness of the calls monitored, objectivity of the monitoring session, reliability of monitoring, and the usefulness of the monitoring – four of the six items Nelson and Adler identify as critical to effective monitoring[5]. One vendor has documented an Average Handling Time reduction of about 1% and a first-contact resolution rate improvement of more than 2%, suggesting that implementation of an RBMS can improve these metrics.

Translating these improvements into dollars requires an estimate of the average cost per minute of handling time and the average cost of multiple calls. Because the number of supervisors is usually geared to the number of agents, we believe it's appropriate to include supervisor costs in the calculation, by dividing total payroll for agents and

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[2] Actually, the list could be MUCH longer. Monitoring can aid in organization-wide quality improvement and innovation, contribute to consistency and effectiveness of call center processes, provide data for trend analysis, support coaching, identify training needs, evaluate effectiveness of training, identify customer needs and expectation, evaluate customer satisfaction, refine the selection process for agents, provide legal compliance, and help with reward and recognition. Since RBMS can improve the effectiveness of monitoring generally, it presumably helps with all these benefits.   See: "Are you Getting the Most from your Call Monitoring Process", Donna Schwartz, <u>Call Center Management Review</u>, January, 2002 and <u>Monitoring and Coaching Fundamentals</u>, Cleveland and Harne, eds., ICMI, 2003, p.2

[3] See for example, Call Center Monitoring Study II Final Report, 2002, ICMI, p1, which shows 93% of call centers reporting some type of monitoring.

[4] "Ask Dr. Jon, Research Highlights from Purdue University", Benchmark Portal website at www.benchmarkportal.com/newsite/article_detail.taf?topicid=21

[5] Nelson and Adler, "The Components of Effective Call Monitoring" CRM Xchange white paper

supervisors (and possibly, the amortized cost of plant and equipment) by the total amount of handling time for the same period. Developing an estimate for first-call resolution savings requires a count of multiple calls and the average cost per call for the center.

Formulas:

Agent + supervisor salaries	/	Total handling time (minutes)	=	Cost of minutes of handling time	*	1%	=	Dollar value of increased handling speed
	/		=		*		=	

For example, a center with 100 agents and 10 supervisors at an average salary of $12 and $15 each plus benefits, might cost for a month $206,400 plus $25,800 for salaries only, or $301,860 per month, including salaries (we assume an average month of 4.3 weeks). A reasonable estimate of total handling minutes might be 619,200 for an average cost per minute of $0.49. A 1% reduction yields a savings of about $0.005 per minute or about $3,000 per month or $36,000 per year.

Agent + supervisor salaries	/	Total calls	=	Cost per call	*	% repeat calls	*	2%	=	Value of first call resolution
	/		=		*		*		=	

First call resolution rates vary widely, depending on the center's activities. Using our hypothetical month above and assuming an average call length of five minutes, we get 123,840 calls for a cost per call of $2.44.   If 20% of the center's calls are repeats, that's 24,768 repeat calls. A 2% reduction yields a savings of 495 calls per month, for a dollar savings of $1,209 per month, or $14,500 in savings for the year.

Reduction in time required to monitor a call. At its most simplistic level, recording-based monitoring is more time-efficient. To begin, recorded audio can be played back at up to 40% faster than its original speed without loss of comprehension[6]. In fact, a number of studies demonstrate that faster speaking speeds can actually result in increased comprehension. In addition, there are efficiencies that come from using an automated and integrated scoring tool, rather than a paper or even computer-based form for live monitoring. Finally, as anyone who has monitored live calls knows, considerable time can be wasted waiting for a call that allows an agent to demonstrate their abilities, while recorded material can quickly be sampled to find a useful call for scoring purposes.

The result of all these factors leads to significant time savings in monitoring. At least one vendor has documented reductions in monitoring time of about 1/3rd when using an RBMS vs. "real-time" monitoring and our own experience at VoiceLog would suggest

[6] Foulke, W. & Sticht, T.G. "*Review of research on the intelligibility and comprehension of accelerated speech.*" Psychological Bulletin, 72: 50-62, 1969.

that scoring recorded material can be up to 40% faster. Another vendor claims to cut monitoring time in half. Using a 33% savings would therefore seem reasonable.

Calculating the cost-savings benefits of an RBMS for monitoring is easy:

Supervisor/ QM salaries	*	% time spent in QM	=	Cost of Quality Monitoring	*	33 %	=	Dollar value of increased monitoring speed
	/		=		*		=	

For example, a 100-agent call center that averages 20 observations a month per agent, running ten minutes each and pays its QM staff a fully loaded cost of $20 per hour would save about $2,200 per month. (100 agents * 20 observations *10 minutes /60 minutes per hour *20 $/hour *33% savings). Of course, a savings of $2,200 per month or $26,400 per year won't justify a capital expense that's likely to run $100,000 or more. Of course, a center that invests significantly more time in monitoring will see a proportionately bigger savings[7]

The same might be said for schedule disruptions that come from call monitoring. Many call centers require supervisors to include monitoring as part of their duties and many supervisors fall behind on their monitoring "quotas" and scramble to catch up. Quantifying the impact of this disruption is difficult and not likely to make the business case on its own. Nevertheless, the ability to schedule monitoring activities at will, (especially when call volumes are light) should not be under-appreciated.

Reduced Risk of EEOC Complaints. A major disadvantage of "real-time" monitoring without an audio recording is that there is no "audit trail" to document the scoring of the call. As Nelson and Adler point out "Any information that is used to rate calls, other than the behavior actually displayed by the CSR on that call, is considered to be bias and threatens the objectivity of the assessment.[8]" Without a recording, it is much easier for an agent to claim they're being discriminated against, while a recording provides the proof of the agent's failure, if that's the case. In addition, with recordings, multiple supervisors can score the same call to insure consistent application of the scoring method (a process called "calibration") and reduce the likelihood of discrimination.

In an age where the mere threat of a discrimination suit can cost an enterprise thousands of dollars, this may be a useful part of the business case. Unfortunately, it's one that is very hard to quantify, unless the center has a history of discrimination issues and the costs associated with them.

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[7] The vendor that documented the 1/3rd savings used an average of 5 monitoring hours per agent per month in its example. Nelson and Adler ("The Components of Effective Call Monitoring" CRM Xchange white paper) write "In many organizations, supervisors are expected to spend 20%-35% of their time monitoring calls…" At a supervisor to agent ratio of 1:12 that's about 2.5 – 5 hours per agent. Our example works out to about 3.3 hours per agent.

[8] Ibid.

Reduced Turnover. Every call center manager knows how expensive turnover is. Recruiting, training, exit interviews and lost productivity (since experienced agents are generally more productive than new agents) are some of the major costs of turnover. For a given call center, these costs depend on what that center spends on recruiting and training. Assuming that most training is for new agents, the call center can divide the dollars spent on recruiting and training by the number of new hires to get a reasonable proxy for the direct costs of turnover. Exit interviews are probably a marginal cost, but may be significant for some centers.

Lost productivity can be estimated by comparing the productivity of newer agents (depending on the center's turnover statistics 6 months or a year may be the break used) with those with more tenure. More sophisticated methods would be to create a more segmented comparison (up to 6 months, 6 months – 1 year, 1-2 years, etc.) or to run a linear regression to determine the correlation of experience with productivity.

Once the relationship is established between productivity and tenure, the next task is to correlate monitoring with retention. The arguments for monitoring improving retention are dependent on feedback and training delivered to the agent as a result of monitoring. Recognition for good performance and corrective action and training for poor performance should improve retention because of increased morale and prevention of ongoing issues. In one study, employee retention improved by about 1.4%.

Because recruiting and training costs vary so significantly across centers (as does turnover), a simple model isn't that useful. An example for a 100-seat call center might look like this: At a 50% turnover rate, a 100-seat center might have to recruit and hire 50 people per year. Assuming a cost of $6,000 per agent for recruiting, training, etc. (several studies would argue it's more expensive than that), a 1.4% improvement in turnover is worth $4,200 per year (1.4% * 50 * $6,000).

Better customer retention.

Although potentially the most powerful argument for an RBMS, improving customer retention may also be among the most difficult to quantify. Variables in the calculation could include a valuation of a customer (we prefer to use the lifetime value of the profit stream of the customer), the cost of acquiring a customer, and the impact of proper call handling on customer retention.

In one survey[9], customers who rated the manner in which the agent handled the call as meeting or exceeding expectations reported a preference for future use of the company at 84% and 95% respectively, while only 63% of customers who reported an experience that failed to meet expectations said they were likely to prefer that company in the future. While using data like this can be tricky, it seems reasonable to infer that a company that handles customer calls well could be 1/3rd more likely to retain those customers than one that does not.

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[9] "Meeting Customer Expectations", Benchmark Portal, www.benchmarkportal.com/newsite/artcile_detail.taf?topicid=297

Using the same hypothetical 100 seat call center, handling 123,840 calls, representing 99,072 customers (20% of calls are repeat calls from the same customer), if we assume a telecommunications company with 5% churn (95% retention), a lifetime customer value of $50 and 5% of calls handled below customer expectations, we might reasonably assume that the value of good customer call handling could be worth $58,382 per month. The formula looks something like this:

99,072 customers * 5% of calls handled badly *(95% normal retention rate - 95%/1.33 retention rate of poorly handled calls) * $50 lifetime value of a customer.

Experienced managers will see how difficult it is to document the exact relationship between poor call handling and customer retention and to prove how much an RBMS is likely to improve call handling. Nevertheless, it should be clear that even relatively modest assumptions about these relationships can yield impressive financial returns.

Of course it is far easier to document the cost side of the equation, but in reviewing our example, our total annual cost savings from an RBMS is less than the likely system cost.

Higher productivity reducing the need for agents	$36,000
First call resolution	$14,500
Reduction in time required to monitor a call	$26,400
Reduced turnover	$4,200
Total cost savings from RBMS	**$81,100**

Since most such systems cost $1,000 per station plus 15%-20% annual maintenance, the more easily documented business case will still show a positive ROI over two years, but may find difficulty with a skeptical CFO, especially if capital funds are tight.

The Service Bureau Solution

A recent development in recording-based systems may make the business case for these systems much easier. Beginning in 2003, VoiceLog LLC has been offering recording-based monitoring on a service basis, charging a flat monthly fee of approximately $40 per agent station[10]. While VoiceLog is currently the only company that we know of offering such a service, we believe that other vendors will follow with a year or two[11].

The advantage of a service-based RBMS offering for ROI calculations should be obvious. With a much lower investment, positive financial returns are higher, faster.

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[10] In the spirit of full disclosure, it's obvious that this paper is written by a principle at VoiceLog. However, the ROI calculations are easily replicable by any financial analyst. It should be noted that the model we used is highly simplistic, ignoring, for example the time value of money. More sophisticated models yield similar – and in some cases – even more dramatic results.

[11] In our discussions with potential partners, we found at least two companies that had considered making such offerings in the past. Given the systems development required to support a viable offering, it will most likely be at least a year for others to enter this market segment.

To demonstrate this, we developed a spreadsheet model that calculates ROI for both a traditional purchased system and a monthly service alternative. While assumptions will vary depending on the system purchased, we used the following:

Cost per seat	$1,000
Annual maintenance	18%
Staffing support	2.5%
Period	36 months
Annual ROI	17%

These assumptions yield a total net return of approximately $2,037 per seat or $56.57 per seat per month. This is total return and does not discount for the time value of money.

Now, using the return of $56.57 per month, we subtract the $40 monthly fee for the service bureau alternative for a net return per month of $16.57 for the service option. Since the initial investment for the service option is VoiceLog's install charge of $100 per seat, the ROI is much larger – about 199% over the same 36-month period. In addition, breakeven is much shorter for the service alternative – about 6 months vs. almost 18 months for the purchased system.

Indeed, when we run different assumptions, we see that the service alternative yields a higher ROI and faster breakeven for most systems that are available in the market today.

ROI - VoiceLog vs. Purchased System
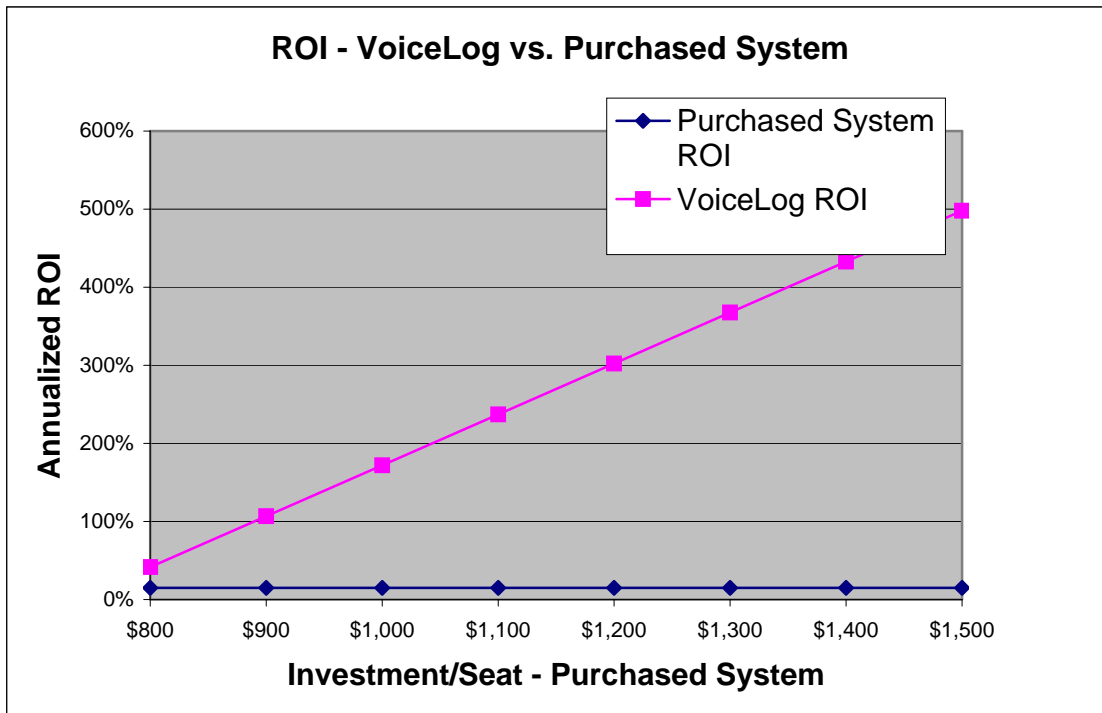
An alternative financial comparison is to look at how little a benefit is required to get a positive ROI using the service alternative. A 1% return on the purchased system at $1,200 per agent station still yields a 106% return on the service option and requires less than a 2% savings on overall staff costs for our hypothetical center.

Of course, call centers have the option of leasing a system, instead of purchasing one. But, depending on center's accounting practice, leases often must be capitalized and a lease still commits the center to the system. The service alternative, on the other hand, can be returned and the system will always be treated as an operating expense.

Conclusion

There are many ways to develop a business case for recording-based monitoring systems. These systems improve the efficiency and effectiveness of monitoring programs and have the potential to reduce call-handling costs, increase employee retention and improve revenue. However, documenting the cost-savings and revenue enhancements that can make the business case may be challenging, depending on the skepticism of senior management and the specifics of the center's methods of operation.

Proposing a service-based RBMS system makes the business case dramatically easier. It reduces the risk associated with RBMS adoption, can increase the ROI by a factor of 10 or more and reduces the breakeven point to well under a year. While only one vendor currently offers a service-based RBMS option, others are sure to follow over the next few years.