MEASURING LEVELS OF CUSTOMER SATISFACTION
by Neil Thiessen

Abstract. Although it currently receives few complaints regarding its vegetation control work, TransAlta recently launched a customer survey to measure levels of satisfaction with control methods used, the quality of completed work, explanations given for the work, state of property after crews have gone, and crew work habits. All respondents returning negative comments or questions (six percent of 567 responses) were contacted by TransAlta or its contractors. The survey was a very useful tool for identifying customer service areas needing improvement and used its preliminary results to initiate appropriate staff and contractor training programs.

Résumé. Bien qu'elle reçoit peu de plaintes concernant son travail de contrôle de la végétation, TransAlta lançait récemment une enquête auprès des consommateurs pour évaluer son niveau de satisfaction vis-à-vis des méthodes de contrôles employées, de la qualité du travail accompli, des explications données concernant le travail, de l'état de la propriété après le départ des équipes et de l'habileté des équipes de travail. Tous les répondants qui ont retourné des commentaires négatifs ou des questions (six pourcent sur 567 réponses) étaient contactés par TransAlta ou ses contractors pour discuter de leurs inquiétudes. L'enquête était très utile pour l'identification des aires où les services aux consommateurs nécessitaient des améliorations et pour son utilisation comme résultats préliminaires aux fins d'initier des programmes appropriés de gérance et d'entraînement des contracteurs.

With over 80,000 km of powerlines crisscrossing public and private land throughout central and southern Alberta, one of TransAlta Utilities' most important goals is to ensure that customers have positive experiences whenever they are in contact with its staff or contractors who work on its powerlines and rights-of-way. One TransAlta department in constant contact with customers is Distribution Line Clearance (DLC), which is responsible for maintaining the company's low-voltage (25kV and under) powerlines. Each year, DLC contacts over 33,000 of TransAlta's 300,000 customers to discuss trimming or removal (mechanical or chemical) of tall-growing trees and shrubs to stop them from growing into the company's powerlines.

Through its vegetation management program, DLC can significantly influence how customers perceive TransAlta. To determine all DLC activities that might influence customer's perceptions of TransAlta, points of contact were defined on a service cycle that begins with a letter informing customers of upcoming visits from TransAlta or its contractors, and ends only when every effort has been made to make certain that customers are fully satisfied with completed vegetation management work. A service cycle describes every opportunity for contact or interaction between a customer and TransAlta, both on and off the customer's property (see Figure 1).

To obtain customer feedback on various parts of its DLC service cycle, TransAlta implemented a two-phased pilot survey designed to measure levels of customer satisfaction with each part of the service cycle. TransAlta based its decision to develop the survey, in part, on the findings of a survey by the Technical Assistance Research Program Institute, Washington, D.C. (TARP). The statistics from TARP's survey show that most businesses do not hear from 90 percent of their unhappy customers, and for every complaint received, another 26 exist, at least six of which are serious. TARP statistics also show that customers who have had unpleasant experiences with a business will relate their experience to as many as 10 other people. In addition, 13 percent will repeat their complaints to more than 20 people.

Objectives. Through its pilot, TransAlta distributed 2104 door-hanger surveys to homes in three of its seven divisions: Calgary, Camrose and St. Albert. As well as creating positive, memorable experiences with the customer, the objectives of the study were to:

• provide feedback, both positive and negative, to employees and contractors
• provide immediate opportunities for TransAlta to reestablish a positive image among customers who respond negatively to DLC vegetation management work
• provide more individual customer choices and flexibility by identifying strengths, barriers to be removed, and areas of customer dissatisfaction, and to reinforce positive parts of the program
• collect useable feedback and diagnostic information for DLC and corporate improvement efforts

• test the usefulness of the survey as a method for obtaining customer feedback

The program was a considerable success and responses proved the survey to be a useful and cost-effective tool for measuring levels of customer satisfaction. TransAlta plans to continue the survey program with the ultimate goal of incorporating it as a permanent component of customer service programs.

Survey Design and Procedures

The survey design and procedures were developed by Kaset Consulting, Florida, in conjunction with DLC and TransAlta’s Public Affairs departments. The survey form was an 11-question, door-hanger questionnaire that could be left behind on customers’ door knobs (see Figure 2). In addition to questions, space was available on the survey card where respondents could provide further comments. To encourage response, the introduction to the survey was written and signed by TransAlta’s Vice-President, showing respondents their comments would reach senior management. In addition, TransAlta attached a pencil to each survey card and used business-reply mail service so customers did not have to pay postage.

The survey questions asked for customers’ impressions of activities in the service cycle that have the greatest potential for influencing their perception of TransAlta. The areas included work procedures and cleanup habits; timeliness and efficiency of contractors; ability to meet customer expectations; visual impact of the worksite, workers and equipment, and the behaviour of crew members.

In the first phase of the pilot, 104 surveys were distributed in the Calgary division by one contractor who performed only mechanical vegetation management work. In this phase, respondents were asked to rate each of the areas using the following scale: very dissatisfied, dissatisfied, satisfied and very satisfied.

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**Figure 1**

**Figure 2**

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After assessing the results of this phase, TransAlta expanded the rating scale to six categories (extremely dissatisfied, dissatisfied, satisfied, very satisfied, extremely satisfied and not applicable), to allow for a more balanced response and to make room for future growth and improvement in customer-satisfaction levels. In the second phase, the revised survey was distributed to 2000 households in the Camrose and St. Albert divisions. The second phase was undertaken to include a more diverse customer base, multiple contractors and both mechanical and non-mechanical work.

In the first phase, surveys were distributed over a five-week period; in the second phase surveys were distributed over a six-week period. Contractors distributed the surveys to every home at which they worked until they ran out of surveys. In the first phase, one contractor was involved; in the second phase, four contractors participated. The results were tabulated by TransAlta staff.

Comments and complaints were directed to the contractor or DLC staff member in charge of the area of concern. The staff members and contractors then made follow-up calls to respondents who expressed complaints or concerns. The follow-up calls were used to resolve misunderstandings, correct problems resulting from vegetation management work, or simply apologize when, although it met its own standards, TransAlta could not meet customer expectations. A number of comments and complaints about other TransAlta departments were also received and forwarded to them.

Results
At the end of October 1989, responses from both phases totaled 567 (27 percent). Results were tabulated at the time although additional surveys were returned over the next three months.

Overall, the results showed the majority of customers are satisfied with current standards of performance, 94 percent of respondents indicated that they were either satisfied, very satisfied or extremely satisfied with the work done on their trees and shrubs (see Figure 3). Forty-four percent of the respondents also provided written comments, 63 percent of which were negative. These comments could be categorized as comments about the consent process, work performed, personnel, mowing, herbicide applications, trimming, clean up and other concerns. In many cases, positive ratings of TransAlta’s vegetation management work were indicated even when negative comments were provided. Positive comments, which totaled 31 percent of all comments, concentrated on crew and work habits.

TransAlta’s pilot survey met all of its objectives as follows:
• By conducting the survey, TransAlta showed customers it is interested in how vegetation management work affects them. Customers who received a follow-up call were also impressed with TransAlta efforts to respond quickly and effectively to concerns.
• The comments from respondents were specific enough to provide very useful feedback to TransAlta staff and contractors. Contractors and staff welcomed the feedback because they were genuinely interested in how they are perceived by customers.
• Soliciting feedback from customers immediately after completion of the work allowed customers to help choose methods to correct any problems that occurred and gave TransAlta an excellent opportunity to recover its image in a timely manner.
• The survey provided clear indicators of strengths, barriers and areas of customer dissatisfaction. In addition, the high level of satisfaction measured reinforced the need for changes already implemented.
• All feedback, both positive and negative, could be used or reacted to in a constructive manner by many TransAlta departments.
• The quantity and variety of feedback gained

Survey Results

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<tr>
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<th>Phase One Results</th>
<th>Phase Two Results</th>
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<tbody>
<tr>
<td></td>
<td>104 Surveys delivered</td>
<td>2000 Surveys delivered</td>
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<tr>
<td></td>
<td>- 53% Response</td>
<td>- 26% Response</td>
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<td>91%</td>
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<tr>
<td>Explanation</td>
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<td>Meeting expectations</td>
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</tr>
<tr>
<td>- Courteous</td>
<td>100%</td>
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<td>- Safety</td>
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</tr>
<tr>
<td>Crew</td>
<td>100%</td>
<td>100%</td>
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<td>- Courteous</td>
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<tr>
<td>Crew</td>
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<tr>
<td>- Safety</td>
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</tbody>
</table>

Figure 3
from the survey proved it to be a very useful method for obtaining customer feedback.

In addition to meeting its objectives, TransAlta also found the following:
• Some staff and contractor groups required additional training in gaining consent from customers.
• Customer concerns and comments should be resolved within 10 working days from the date TransAlta receives survey response. During the pilot, response time was less than 48 hours.
• TransAlta's contractors involved in the pilot project provided excellent customer service and represented TransAlta very well. Although the results provided positive reinforcement for contractors, there was a tendency for TransAlta to pass on mainly negative feedback as it applied to contractors. In future surveys, TransAlta plans to communicate both positive and negative comments throughout, to ensure contractors receive timely positive feedback as well.
• Although response numbers were manageable, a central computer system for logging, sorting and tabulating is recommended. The 567 responses collected from the pilot were handled manually, requiring 70 hours to sort, log and tabulate. TransAlta, however, numbered each survey to allow the cards to be quickly sorted into division and contractor categories.
• TransAlta is fostering an easier consenting process for the future by soliciting customer input and ensuring customer satisfaction now.
• In general, explanations provided to customers about the work to be done have been complete and descriptive; however, based on comments from dissatisfied customers, more thorough explanations are required for mechanical brush mowing and herbicide application.

Costs. The total cost for phases one and two of the pilot survey was $17,500 (see Figure 4). This includes design and printing of the survey card, and time devoted by contractors and TransAlta employees. The survey coordinator spent 178.5 hours overseeing the survey and completing customer follow-up. An additional 12 minutes per survey were spent on distribution, and approximately 42 minutes were spent on each follow-up. Other time commitments included planning and design of the survey, sorting responses and tabulating results.

If TransAlta surveyed 33,000 DLC customers annually, the program would cost over $260,000 (approximately two percent of DLC's annual budget). On the other hand, the cost of conducting one-on-one interviews with all 33,000 customers is estimated at $1.2 million (approximately 10 percent of DLC's annual budget).

Future Plans
Although distribution and follow-up of future surveys will increase the resources required by the DLC group, TransAlta firmly believes the costs of not soliciting customer concerns in a timely manner will be much greater in the long term than the costs of running the survey. Problems left unresolved require much greater efforts to rectify later because customer attitudes toward TransAlta continually deteriorate while customers wait for solutions. In addition, customers with unresolved complaints spread both their complaints and their attitude to others, deteriorating other customers' attitudes toward TransAlta.

TransAlta is seriously committed to ensuring customer satisfaction and maintaining a positive public image. To maintain this commitment, TransAlta runs many customer relations programs, including the door-hanger survey. Based on the success of the pilot survey in meeting its objectives and identifying additional areas needing improvement, TransAlta will continue to use the survey as part of its customer relations program. In future, the survey will be used at intervals on small predetermined samplings of customers, in conjunction with follow-up calls on all negative responses. TransAlta plans to use the survey indefinitely to identify problem areas and track customer satisfaction and maintaining a positive public image.

Cost Summary for Pilot Survey
(2104 Cards)

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<th>Cost</th>
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<td>Cost to distribute (2104 cards)</td>
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<tr>
<td>Cost of contractor follow-up</td>
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<td>Cost of DLC staff follow-up</td>
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<td>Cost of other staff follow-up</td>
<td>$750</td>
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<td>Total survey cost</td>
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Estimated cost to survey 33,000 customers

$265,000

Figure 4
changes in customer satisfaction levels. Over the
long term, TransAlta expects its door-hanger
survey to become an extremely valuable tool for
measuring satisfaction levels and planning
customer service programs.

ABSTRACTS


Since only a few natural pest controls were widely available, early organic gardeners often fought an
ing battle against the endless onslaught of insects, weeds, and diseases. Many invented their own con-
ccoctions. Nineteen seventy-six marked a turning point for gardeners. That year, at an international con-
ference on entomology, the era of Integrated Pest Management was officially proclaimed. Inteprated Pest
Management, or IPM, considers the entire garden ecosystem to determine the best methods for controll-
ing pests. IPM was quite a radical departure from standard agricultural practices of the 1950s, 60s and
70s, which was based on regularly scheduled applications of pesticides to prevent the invasion of pests
anticipated each season. In fact, we've come so far in the last 13 years that a plethora of natural pestcon-
trol products for the home gardener is now available. The names of the larger companies specializino in
these natural gardening products—Safer and Ringer are two of the best known—are now household
words, at least among gardeners who prefer an organic approach. For the last few years, some of the pro-
ducts of these larger companies have been for sale at hardware stores and nurseries. Produce treated
with botanical pesticides is generally safer than produce treated with synthetics. However, the handling of
botanicals during the mixing and application is generally just as hazardous as the handling of most home
garden synthetics. Just because something is natural doesn't mean it isn't toxic.

59-61.

Two plants growing beside each other compete for sunlight, water and nutrients. Competition for soil
moisture and nutrients is not always clearly visible. Two similar plants competing for a limited supply of
water and nutrients divide what is available. Each gets a smaller share than if either were growing alone,
and this stunts the growth of both. If they are not similar plants, one plant has advantage over the other.
Foresters and orchardists have known for years that turfgrass competes more vigorously than trees for
soil moisture and nutrients. When grown together, turfgrass outgrows the tree. The tree's growth is less
than if it were grown without turfgrass. Compared to grass roots, even the smallest tree roots are coarselv
branched and less efficient at extracting water and nutrients from the soil. An organic mulch, such as wood
chips or composted leaves, is one of the best and most inexpensive soil and root enhancers available. It is
a good alternative to turf around trees.