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## **AT&T: TELEMARKETING SITE SELECTION (B)**

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McMartin Catalog Distributors (McMartin) distributed a wide range of specialty catalogs and accepted orders from customers by telephone using toll-free 1-800- numbers. Following several successful seasons of catalog sales, McMartin had made the decision that their business volume would now support their own telemarketing centers, rather than paying to buy call processing capacity from third-party call center operators.

Management now faced a critical decision: where should their telemarketing centers be located?

### **McMartin's Telemarketing Site Selection Problem**

McMartin planned to operate two inbound order-entry call centers, with each site handling approximately the same volume of calls. Working with telemarketing specialists at AT&T, McMartin's management had identified several possible call center locations and had established the annual fixed cost of operating at each site, along with the wage rate for operators at each location (Table 1).

Site Area Code	Metropolitan Area	Annual Fixed Cost	Wage per hour.
204	Selkirk, MB	\$542,950	\$8.77
204	Brandon, MB	\$407,140	\$9.23
514	Saint - Hyacinthe, PQ	\$610,710	\$8.87
514	Saint - Jean - sur - Richelieu, PQ	\$520,370	\$9.13
514	Saint - Jerome, PQ	\$452,310	\$8.95
613	Cornwall, ON	\$429,720	\$8.79
705	Sault Ste. Marie, ON	\$520,370	\$8.64
819	Shawinigan, PQ	\$565,540	\$7.86
819	Drummondville, PQ	\$452,310	\$8.31
902	Sydney, NS	\$678,460	\$7.33

**Table 1:** Candidate Call Center Locations

AT&T telemarketing specialists were also able to provide some additional information. An analysis of the past calling experience of McMartin's customers suggested that the average call was six minutes in length, with an extra one minute of operator time required to process the order after disconnecting. Call center employee utilization could be expected to average 87%, with employee's fringe benefits averaging twenty percent of the hourly wage. For the purpose of the analysis, taxes could be ignored.

An analysis of previous calling patterns produced estimates of the annual numbers of incoming calls expected from each originating area code (summarized in Table 2).

Area Code	Region	Expected Number of Calls
204	MB	78,397
250	BC	112,746
306	SK	70,399
403	AB	193,330
416	ON	289,617
418	PQ	122,353
506	NB	51,854
514	PQ	238,019
519	ON	100,988
604	BC	131,861
613	ON	102,583
705	ON	41,983
709	NF	40,687
807	ON	17,591
819	PQ	141,881
902	NS	74,110
905	ON	191,599
<b>Total Volume</b>		<b>1,999,998</b>

**Table 2:** Expected Volume Of Incoming Calls From Each Calling Area.

Finally, AT&T telemarketing specialists provided the hourly costs for calls between each possible telemarketing site and each possible originating area. These costs are summarized in Table 3.

Area Code	204	514	613	705	819	902
204	\$9.20	\$12.36	\$11.75	\$11.75	\$12.36	\$12.36
250	12.36	12.36	12.36	12.36	12.36	12.36
306	11.75	12.36	12.36	12.36	12.36	12.36
403	12.36	12.36	12.36	12.36	12.36	12.36
416	11.75	11.75	10.93	10.93	11.75	12.36
418	12.36	10.93	11.75	11.75	10.93	12.36
506	12.36	11.75	12.36	12.36	11.75	11.75
514	12.36	7.80	11.75	11.75	10.93	12.36
519	11.75	11.75	10.93	10.93	11.75	12.36
604	12.36	12.36	12.36	12.36	12.36	12.36
613	11.75	11.75	10.64	10.93	11.75	12.36
705	11.75	11.75	10.93	11.30	11.75	12.36
709	12.36	12.36	12.36	12.36	12.36	11.75
807	11.75	11.75	10.93	10.93	11.75	12.36
819	12.36	10.93	11.75	11.75	10.64	12.36
902	12.36	12.36	12.36	12.36	12.36	12.79
905	11.75	11.75	10.93	10.93	11.75	12.36

**Table 3:** Hourly Calling Costs Between Originating Locations and Possible Call Center Locations

McMartin was looking for help in determining the most economical locations for its two centers. No location had any preference over another, apart from the costs of labor, communications, and the facilities.