



**NUCLEUS  
RESEARCH**

CASE STUDY E54  
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ROI ANALYSIS YOU CAN TRUST™

## ROI Case Study: iWay Software Alcan Corporation

### **THE BOTTOM LINE**

The ability to tie together data from multiple sources using iWay Software and bring it forward in new e-commerce initiatives has enabled Alcan to realize significant savings in operational costs while also generating incremental revenue.

**ROI: 942%**

**Payback: 1 month**

### **THE COMPANY**

Alcan Corporation, based in Cleveland, Ohio, is a US subsidiary of Alcan, Inc., a global leader in aluminum and packaging as well as aluminum recycling, with revenues of approximately \$26 billion. The company employs more than 88,000 people in operating facilities in 63 countries.

### **THE CHALLENGE**

Alcan had developed an e-business strategy to increase collaboration and self-service capabilities for its customers, partners, and employees. With the goal to increase revenue and improve business processes, the company sought a low-cost, repeatable integration strategy that would enable it to build new e-business applications that could tap into its multiple back-end systems.

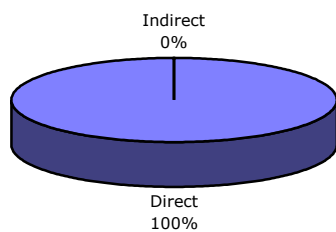
### **THE STRATEGY**

Alcan selected Microsoft BizTalk Server as the engine to drive its enterprise application integration (EAI) hub. Alcan then conducted an evaluation of adapter and connection technology using the criteria of cost, functionality, and compatibility with its existing data infrastructure. Alcan selected iWay Software because its products provided a breadth of connection capabilities to address Alcan's numerous back-end systems and an easy-to-use development environment that would enable a repeatable process that could be leveraged for all its integration projects.

iWay consultants worked with Alcan's development staff to help install the software and define and implement a service-oriented architecture. With this architecture in place, Alcan can build and reassemble data connections to transport data from back-end systems and deliver it to front-line applications.

With the Microsoft BizTalk Server integration hub in place, Alcan's development team used iWay adapters and connectors to build applications for procurement, logistics, online ordering, and an extranet that lets trading partners check the status of orders and access account information. The new applications combined data to deliver a composite view based on the business requirement. For

## BENEFITS



3-YEAR TOTAL: \$53.8M

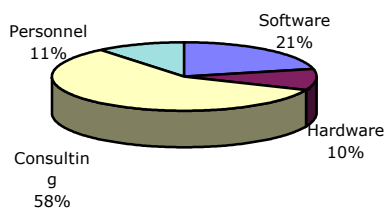
example, the procurement system pulls data from legacy purchasing and maintenance systems, an Oracle Financials system, and other point solutions to deliver a richer data set for improved business intelligence to make decisions on procurement operations.

## KEY BENEFIT AREAS

With iWay Software, Alcan has been able to cost-effectively transfer data between multiple back-end databases, legacy systems, transaction systems, and ERP applications. The ability to tie together data from multiple sources and bring it forward in new e-commerce initiatives has enabled Alcan to realize the following benefits:

- Development cost savings. The reusable iWay integration infrastructure has lowered the development costs associated with building new e-business applications, providing savings of \$4.4 million on four key projects.
- Vendor cost savings from improved information management for negotiating prices. Using more accurate and aggregated data has enabled Alcan to improve its price negotiation process and reduce the number of vendors it works with, resulting in annual savings of \$15 million.
- Profit on additional revenues. Incremental revenue generated through a self-service online ordering initiative has delivered profits of \$1 million to the company.

## COSTS



3-YEAR TOTAL: \$1.45M

## KEY COST AREAS

Key costs included consulting, software, personnel, and hardware. Consulting costs accounted for 58 percent of the total project costs. Software was the second largest cost category at 21 percent. Personnel costs associated with initial development and ongoing support of the integration projects totaled 11 percent, while hardware costs were 10 percent of the overall project costs.

## LESSONS LEARNED

During the course of Alcan's integration projects, the company recognized and adopted the following best practices for successful deployment:

- Use business process monitoring approaches and dashboards for the effective monitoring and control of business processes.
- To ensure that application throughput and response times are reasonable prior to deployment, conduct stress tests for each Web service contained within an application

## CALCULATING THE ROI

Nucleus calculated the costs of software, hardware, consulting, personnel, training, and other investments over a 3-year period to quantify Alcan's total investment in iWay Software.

The key benefits calculated included development cost savings, cost savings on materials procurement due to improved information management for negotiating prices, and profit on the incremental revenue generated through Alcan's new online ordering system.

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**SUMMARY**

Project:	<b>iWay Software</b>
Annual return on investment (ROI)	<b>934%</b>
Payback period (years)	<b>0.09</b>
Net present value (NPV)	<b>19,659,361</b>
Average yearly cost of ownership	<b>635,414</b>

<b>ANNUAL BENEFITS</b>	<b>Pre-start</b>	<b>Year 1</b>	<b>Year 2</b>	<b>Year 3</b>
Direct	0	20,433,000	16,693,000	16,693,000
Indirect	0	0	0	0
<b>Total Benefits per Period</b>	0	20,433,000	16,693,000	16,693,000

<b>DEPRECIATED ASSETS</b>	<b>Pre-start</b>	<b>Year 1</b>	<b>Year 2</b>	<b>Year 3</b>
Software	312,493	0	0	0
Hardware	145,038	0	0	0
<b>Total per Period</b>	457,531	0	0	0

<b>DEPRECIATION SCHEDULE</b>	<b>Pre-start</b>	<b>Year 1</b>	<b>Year 2</b>	<b>Year 3</b>
Software	0	62,499	62,499	62,499
Hardware	0	29,008	29,008	29,008
<b>Total per Period</b>	0	91,506	91,506	91,506

<b>EXPENSED COSTS</b>	<b>Pre-start</b>	<b>Year 1</b>	<b>Year 2</b>	<b>Year 3</b>
Software	0	0	0	0
Hardware	0	0	0	0
Consulting	842,760	0	0	0
Personnel	155,952	150,000	150,000	150,000
Training	0	0	0	0
Other	0	0	0	0
<b>Total per Period</b>	998,712	150,000	150,000	150,000

<b>FINANCIAL ANALYSIS</b>	<b>Results</b>	<b>Year 1</b>	<b>Year 2</b>	<b>Year 3</b>
Net cash flow before taxes		20,283,000	16,543,000	16,543,000
Net cash flow after taxes		10,187,253	8,317,253	8,317,253
<b>Annual ROI - direct and indirect benefits</b>				<b>934%</b>
Annual ROI - direct benefits only				934%
<b>Net present value (NPV)</b>				<b>19,659,361</b>
<b>Payback (years)</b>	<b>0.09</b>			
Average annual cost of ownership		1,606,243	878,122	635,414
3-year cumulative ROI	2055%			
3-year IRR	1047%			

**FINANCIAL ASSUMPTIONS**

All government taxes	50%
Discount rate	15%

All calculations are based on Nucleus Research's independent analysis of the expected costs and benefits associated with the application profiled in the accompanying case. Financial modeling tool, format, and methodology copyright Nucleus Research Inc., all rights reserved.