Executive Project Metrics

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Mick Dobroff, CEO of Interconnecting Cable, Inc. (ICC), knew roughly what he wanted of vice-presidents of engineering, Ian Plachy, and marketing, Rod Stewart. He saw it in a management conference, where they called it the Project Dashboard. The Dashboard is a tool that highlights and briefly describes the status of the project by reporting on progress toward achievement of the major business goals of the initiative. Project Dashboard is used to predict the future state of the project based on past and current performance. Mick wanted the Dashboard to show the status of all company projects. More precisely, Mick's intent was to have the vice-presidents create such a report for him. In order for Mick to have these reports resemble exactly what he wanted, he needed to issue detailed specifications to Ian and Rod.

OUR CABLE BUSINESS

ICC makes custom-made interconnecting cables for the health, computer, and other industries, with annual sales of $140 million. It is a market leader and business unit of a large conglomerate. Typically, ICC would develop platform cables (big projects) per customer requirement, which could be changed to a minor degree—color, slight changes of material—(called small projects), or to a great degree—color, major changes of materials, length, etc.—(called medium projects).

EXECUTIVE DASHBOARD

Mick decided to use one free Saturday, which was usually a day off, to come to the office to tackle many miscellaneous tasks, among them the Dashboard specification. "What sort of Dashboard do I need?" Mick asked himself. He wrote out a stream of thoughts: "First, I need it to include four to six project metrics that would help me follow the health of the engineering department on a regular, periodic basis, what engineering folks do each month and what kind of performance they put out, as well as how they fare against engineering departments throughout

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the company. No, I do not want to have only the financial metrics. On the contrary, I want and need as much information as possible—a group of well-balanced financial, process, customer, and learning metrics.

"In addition, the Dashboard must be a one-pager and should take no more than three minutes to interpret it. No words in the Dashboard. . ." Mick kept on writing the specification for the Dashboard. "Only graphical signs, colors—green, yellow, and red—should be used to indicate the progress toward reaching the project goals. Green indicates the project is on track to meeting the goals, yellow indicates a goal is in jeopardy, and red indicates a goal has been compromised and immediate action is needed to recover. The use of colors to indicate project status reminds many users of the automobile dashboard, where color lamps indicate the status of all major car systems, hence the name of this tool. Also shown may be a project summary including status of work completed, significant accomplishments, and risks and issues currently being addressed by the project team."

"Frequency? Once a month, that's it," thought Mick. "Let me not forget that at times the Project Dashboard should predict trend, and state actions required to overcome issues and reverse a negative trend. The Dashboard will be used for multiple projects, actually for all company projects—240 projects per year, i.e., roughly 20 a month. And, yes, I want both types, driving metrics (also called lagging) to show and warn me the intermediate results and trend, and outcome metrics (also called leading metrics) to indicate the final results."

IMPLEMENTATION

To respond to the request of CEO Dobroff, an interdepartmental project team of engineering, finance, and marketing was formed that proposed the following metrics:

- EBIT/FTE Engineer Number of EBIT dollars earned per an engineer; also a measure of an engineer's productivity expressed in dollars; the larger the metric, the better.
- Average project profitability index: A sum of profits from all projects divided by the sum of all projects' cost; also a measure of a project's profitability; the larger the profitability index, the better—the larger a project's profits.
- Customer satisfaction with product quality: Customers' assessment of product quality on a scale of 1 to 5, 1 being the lowest, 5 the highest measure of product quality; measure of perception of customer satisfaction with product quality.
- Customer satisfaction with milestones' accomplishment: Customers' assessment of project milestones' punctuality on a scale of 1 to 5, 1 being the lowest, 5 the highest measure of timeliness; measure of perception of customer satisfaction with accomplishing project milestones timely.

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- Percent of milestones accomplished: Percent of all project milestones that are met in a certain time period expressed as percentage of all project milestones planned to be met in the same time period; also, a measure of punctuality of project delivery.
- Percent of milestone budgets met: Percent of all project milestone budgets that are met in a certain time period expressed as percentage of all project milestones planned to be met in the same time period; also, a measure of adherence to project budget.

CEO Mick Dobroff was content with the proposed metrics but wanted to see the reaction of internal and external customers, those who provide metrics data. Mick's intent was to see if the data obtained could be processed in a way that benefited ICC and for engineering to be able to hear the customers' voice. Following this line thought, the project team developed a survey to get data for the above metrics. They sent out the survey and the response obtained produced this information:

- EBIT/FTE better engineer (not available)
- Average project profitability index = 1.8
- Customer satisfaction with product quality = 4.3/5.0
- Customer satisfaction with milestones' accomplishment = 1.9/5.0
- Percent of milestones accomplished = 38%
- Percent of milestone budgets met = 19%

These metrics really surprised Mick. Now, he had something to seriously think about with his engineers.

Discussion items

1. Do individual metrics that the project team propose meet Mick's specification to include four to six project metrics that are well-balanced financial, process, customer, and learning metrics? Which metric is of what kind?
2. Can Mick use the metrics to follow the health of the engineering department?
3. What do you think of ICC's average project profitability index of 1.8? Explain.
4. Should ICC be satisfied with the customer satisfaction with product quality of 4.3/5.0? Explain.
5. What should ICC do about customer satisfaction with the milestones' accomplishment of 1.9/5.0? Elaborate.
6. What should ICC do about the 38 percent of milestones accomplished statistic? Elaborate.
7. What should ICC do about the 19 percent of milestones budgets met metric? Elaborate.