Maximize the Value of Capstone Projects for Your Company

Donald H. Hopkins Jr.
Wright State University - Main Campus, donald.hopkins@wright.edu

Valerie Stueland
Wright State University - Main Campus, valerie.stueland@wright.edu

Follow this and additional works at: https://corescholar.libraries.wright.edu/infosys_scm

Part of the Management Information Systems Commons, and the Operations and Supply Chain Management Commons

Reference:
Maximize the Value of Capstone Projects for Your Company

Traditionally, graduate programs (as well as some undergrad­uate programs) relied on a thesis as means for the student to demonstrate an understanding of the concepts presented to them during the course of the program. In many cases, the thesis was considered an academic deliverable and did not relate directly to the student’s work environment.

A more practical approach to validating the student’s ability to demonstrate the new skills and knowledge acquired during a program is the evolution of the capstone project. The capstone project approach was developed to integrate the learnings associated with the program and the real world environment in which the student worked. The student is encouraged to pick a project that will benefit their employer, which in many cases, is funding all or part of the tuition. The capstone project needs to satisfy two major objectives: demonstrate the student’s mastery of the program’s major concepts and techniques, and provide a significant return to their sponsoring organization.

The student is encouraged to find a project sponsor who has the responsibility for the area or processes that will be affected by the student’s project. The process of obtaining an organization sponsor will bring additional visibility to the student proposing the project and potentially provide them with a new network within the organization. This relationship with the organization’s sponsor also allows the student and organization to scope a project with the available resources and capabilities to ensure a successful outcome. While some graduate theses have as their key deliverable the final paper, the capstone project’s key deliverable is a positive change for the organization resulting in increased efficiency, effectiveness or growth. While the audience for any oral presentation of a thesis is the academic community, the audience of a capstone project is both the academic community and the management team of the organization.

The Master of Information Systems at Wright State University has a long history of successful capstone projects that make a difference to the sponsoring organization. For example, one local company needed more visibility into their order status. The capstone project took a look at the current processes of the organization and came up with a solution to implement a single place to obtain order status regardless of the systems involved. This has resulted in over $480,000 in annual savings, not including the soft savings such as customer satisfaction, analytics opportunities, and faster response time.

Another great capstone project dealt with a company that, like most of us, had to deal with maintaining a high quality IT infrastructure while dealing with reduced budgets. The goal of the capstone project was to create an architecture that allowed flexibility and scalability without sacrificing security or reliability. The capstone project lead the team to look at cloud computing, which resulted in a 69% efficiency improvement, and a return on their investment of over $800,000 over a three year period.

Organizations are always in the position of determining where to invest their limited funds. Many times when organizations are trying to determine whether to support the higher education aspirations of their employee, they are considering what the positive impacts the program will have on the organization. Very often, one of the key aspects of this decision is determining the impact of the investment on the retention of the employee through providing the educational opportunity and the hope that providing this opportunity will build loyalty with the employee/student. The beauty of the capstone project is that it has the ability for the organization to receive immediate payback from the program. The capstone project also provides the organization a glimpse of potential future projects that can be undertaken due to the fact that employee/student has obtained knowledge through the program and the experience gained through the capstone project.

One more significant benefit to the capstone project is that the student gets a faculty advisor to assist with the project; this is like having an additional consultant on the project. This is a real advantage when they are undertaking a project in an area that the student (or organization) is unfamiliar. The organization will get the advantage of a new perspective and another set of eyes on the project.

The bottom-line is that the capstone project provides a practicum to the student while allowing the organization to immediately benefit from the investment they made in the student.

Mr. Don Hopkins, ISSCM Advisory Board Chair, donald.h.hopkins@gmail.com

Ms. Valerie Stueland, Director for Master Programs, Department of Information Systems & Supply Chain Management, Raj Soin College of Business, Wright State University, Valerie.Stueland@wright.edu