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## USING LOTUS 1-2-3 TO COMPLETE A TRIPLE PLAY IN A SIMULATED COMPETITION

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### ABSTRACT

This paper will examine the value of providing decision support systems to students and faculty during the play of a complex marketing management simulation. From a pedagogical standpoint, the three decision support systems discussed below offer benefits to everyone involved in the simulated competition. The decision support systems are external to the simulated competition, but are incorporated into the simulation model for the professor, and are made available to each student via a pre-specified Lotus 1-2-3 disk attached to the student manual.

The integration of LOWS 1-2-3 with the COMPETE simulation engenders a deeper, more meaningful relationship between students and administrators and among student teammates. By fostering greater understanding, the Lotus/COMPETE combination significantly enhances the educational value of the simulated competition for the student participants.

### INTRODUCTION

In the fourth edition of Compete: A Dynamic Marketing Simulation (Richard D. Irwin, Inc., 1993), the authors have integrated the power of Lotus 1-2-3 with the COMPETE program to significantly enhance the educational value of the simulated competition. As can be inferred from the title of this paper, the enhancements are threefold:

- I. PARAM.WK1: This new interior program allows the professor (game administrator) to view the simulation's entire parameter structure via a *vivid* graphical display to alter (or edit) any, or all, of its contents.
- II. PROFSUM/MENU1.WK1 & MENU2.WK1: These two new Professor Summary programs, inserted in the COMPETE program, are designed to help the professor quickly and automatically generate graphs and tables that summarize the periodic and cumulative decisions and results.
- III. COMPETE ANALYSIS PROGRAMS/CAP: Included in each COMPETE (4th Edition) student manual is a floppy disk containing a series of computer-based 'Decision Support System' modules. The modules are written in Lotus 1-2-3 'Macro' language, and are specifically linked to the COMPETE simulation.

Each of these independent programs linking the simulation's parameters, the periodic and cumulative results of the decision-making, and the analysis thereof to Lotus 1-2-3, was created to enable the game administrator and the student(s) to obtain greater value from their involvement in the simulated competition. Together, the three programs represent a giant step forward regarding the ease and flexibility of simulation administration and each student's understanding and mastery of the marketing process.

COMPETE is designed to highlight the dynamic nature of the competitive environment in which business firms operate, and the interrelationships among each firm's

marketing mix variables. COMPETE is an interactive simulation, wherein each company's performance is a function of the decisions made by all companies in the industry. As such, an individual company's success or failure is determined not only by how well the student team understands and handles the marketing variables at their disposal, but by how well they can anticipate and react to the strategies of their competitors.

The COMPETE model allows up to five companies to participate in each industry. Each company manufactures and markets three products, which are sold in three separate geographic markets (constituting the entire US. market). Consumer reactions to each firm's offerings vary by product and by geographic region. A successful marketing program developed for one product or market will not necessarily work for another. Further, since competitors' decisions change overtime, a successful strategy in one period will not necessarily be successful in a future period.

Learning flows from understanding. In any environment, if understanding is lacking, learning cannot occur. This is particularly true in a simulated competition where the lack of understanding impacts both sides of the podium. If the professor does not have a solid grasp of the basic simulation model, he/she cannot successfully administer and/or impart useful assistance to students involved in the competitive exercise. Furthermore, without a thorough understanding of the model's inner workings, without the ability to effect change, the professor cannot inject style or personal preferences into the competition. Similarly, lack of student understanding typically results in haphazard, chaotic decision-making and little, or no, learning

PARAM.WK1 offers the professor the ability to understand and change the simulation to suit his/her specific needs. PROFSUM, by providing a graphic and tabular overview of the periodic and cumulative decisions and their subsequent results, assists the professor in explaining the competition to tire students in either a mentor or consultant mode.

CAP provides analytical tools geared specifically toward fostering better student understanding of the simulation's many and varied facets, and works to enhance their performance. Further, the 'What If' capability offered by Lotus 1-2-3 provides a true decision-making laboratory in which students can test alternative strategies within an actively competitive environment.

### CONCLUSION

Lotus 1-2-3, when combined with a dynamically interactive marketing simulation, can significantly enhance the educational value of the simulated competition from both the student and professor perspective. By providing a more thorough understanding of the simulation model, the ability to change the model's parameters, and a graphical summarization of all competitive activity, the Lotus/COMPETE combination significantly enhances the professor's role. In addition, by providing graphical summarization coupled with specific analytical methods, the Lotus/COMPETE combination enables the student to obtain a better, more comprehensive understanding of the competitive environment, the dynamics of competition, and the interaction of the controllable marketing mix variables within a highly competitive situation.