

Capsim Simulation: Team Baldwin Blows Round Three of the Competition

During the fall semester 2013 at Georgian Court University in Lakewood, NJ we have six teams competing in the Capstone (Capsim) simulation. There are four students on each of the following companies/teams: Andrews, Baldwin, Chester and Digby. The computer has two simulation companies/teams Erie and Ferris. The simulation begins with four basic modules: research and development, marketing, production and finance. We add human resources in the second round and total quality management in the fourth round. The competition is seven rounds beginning Saturday October 27, 2013 through Saturday December 8, 2013. On Saturday December 15, 2013 each company will make a power point presentation that includes the company mission statement, corporate vision, segment analysis, round analysis and financial statistical analysis compared to the other companies. Segment analysis describes company products in the traditional, low-end, high end, performance and size segments. Due to the effects of hurricane Sandy, we had to modify the competitive rounds. We now play six competitive rounds and remove totally quality management from the simulation.

During round two of the competition team Baldwin made an early retirement of debt on a bond issue 11.5S2014 of \$6,950,000 at 11.5% interest. Baldwin paid \$7,500,000 to retire this bond. Round two of competition ended December 31, 2014 when the bond was due. Baldwin would have been better off retaining the debt. This debt goes from long term debt to current debt on December 31, 2014 and is paid off during round three. Because Baldwin had low return on sales of a negative 2.5%, Baldwin was forced to take an emergency Big Al loan of \$17,743,068 at 7.5% to cover all of the company's current debt at the end of round three. **The main reason this loan was automatically given to Baldwin was because Baldwin had automation upgrades in all product segments of over nineteen million dollars.**

What hurt team Baldwin during the third round were the results from the traditional product segment. Team Erie a computer simulation company attacked the traditional segment with three products. In this segment, product Echo has 16% market share selling 1,512,000 units, product Eat has 15% market share selling 1,465,000 units and product Egg has 13% market share selling 1,220,000 units. Therefore Erie dominates the traditional market segment with 44% market share.

Baldwin's traditional product Baker sold 997,000 units and maintains an 11% market share. The Baker product sold 1% or 74,000 units in the low end product segment. Baker also had 4% market share in the size product segment selling 131,000 units. Baker had total sales of 1,202,000 units with an inventory of 384,000.

The Baldwin Company should remain in the traditional segment with Baker. At the end of round three an age of 2.0 years, is the most important traditional customer buying criteria at 44%. Baker has an age of 2.5 years. Price is the second most important criteria at 23%. Baker is competitive and should lower their price from \$26.50 to \$25.75 for round four. Ideal position is third in importance at 21% with performance of 7.3 and size of 13.2. Erie's Echo product has these optimal positions and will raise performance by plus 0.7 to 8.0 and decrease size by a negative 0.7 to 12.5 for round four. At the end of round three Baker does not have a good position with performance at 5.0. Baker's ideal size is excellent at 13.0. Baker will only have to lower size by a negative 0.5 to attain the optimal position of 12.5 for round four. Baker should increase performance by plus 0.8 to 5.8. These upgrades will not take effect until December 18, 2016. The age at revision will be 1.8 years which is excellent. Baldwin's main error was not upgrading the Baker product during the earlier rounds.

Baldwin's Bid product in the high end segment is not competitive. Baldwin really got slammed in this segment. Bid sold only 201,000 units with a 5% market share in the high end segment. There is inventory of 295,000 units for the Bid product. In the high end segment the ideal position at 43% is the most important buying criteria. Performance of 11.8 and size of 8.7 are optimal at the end of round three. Performance is increased by 0.9 and size is decreased by 0.9 for optimal positioning at the end of round four. The computer simulation company Ferris has two products in the high end segment. Ferris dominates the market with the Fist product at 27% market share and the Fox product at 25% market share. Ferris has 52% of this market.

Baldwin again failed to upgrade the high end product Bid in earlier rounds. Baldwin's Bid product has performance at 8.5 and size at 12.0. This product should be moved into the traditional segment where it will be very competitive over rounds four, five and six. The optimal position in the traditional segment at the end of round four will be performance 8.0 and size 12.5. Baldwin should not upgrade the Bid product this round. Thus Bid moves into the traditional segment circle. Baldwin will have to lower the Bid product's price from \$37.25 to \$26.00 to be competitive in the traditional segment. The age of Bid is 2.61 years at the end of round three.

There will be nine products in the traditional segment during round four. Baldwin should sell production capacity in the Baker product. If Baldwin sells 200 units of traditional capacity they will receive \$4,940,000 from the sale. This will help pay back some of the current debt.

Industry unit sales in the traditional segment for round three are 9,461,000 units. There is segment growth of 9.6% for the next year. Thus 10,369,256 units will be sold in round four. If we divide by the nine products competing in the segment we have an average of 1,152,000 units sold for each product in the traditional segment. Baldwin can make a sales forecast of 1,100,000 units for Baker and 700,000 units for Bid.

Baldwin needs to save money this round. They have to pay back a debt of over seventeen million dollars. By not upgrading the high end product Bid, Baldwin will save more than an million dollars. Baldwin should cut promotional and sales budgets by five hundred thousand to one million dollars across the board. With these strategic changes Baldwin will remain competitive for the future rounds.