

Team Tenacity Meeting Minutes 7

Date:	Friday 28 December 2012
Time:	1400 – 1630 Hours
Venue:	School of Information Systems, Level 3, Rlab
Attendees:	Chua Eng Chang Gabriel Lok Sundaram S/O K. VALLIAPPAN Bryan Lim
Agenda:	1. Discuss algorithm for order management and pricing analytics

No.	Discussion Item																														
1.	<p>Discuss algorithm for order management and pricing analytics</p> <ul style="list-style-type: none"> • Divide the parts of a model according to the percentage they contribute to the total cost of the car • Take the fraction of the part to be sold in association with the rest of the parts belonging to the particular car and calculate the cost of the selling price of the part by multiplying it with the total cost of the parts left from the car • Do the same for the same part but with all similar cars • Take the average of the selling prices obtained • Parts in the warehouse can be added and removed at any time • The cost of a particular part should correspond to the number of parts available in the warehouse • Although the parts may be the same, their cost price might be different due to the different purchasing prices of the cars • The goal is to find the minimum price at which a part should be no matter what the purchase costs was • The number of same-type parts are taken into account • The selling price of the part should even out the losses made through the sales of one part by a profit of another • The constraint is that the selling price should be at the minimum and the total profits + losses accrued from the previous sales of the parts + the selling price of the part should equate to 0 • FIFO treatment of inventory • If minimum price is negative, items can technically be sold at 0 dollar <p>Example:</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: center;">Left Door</th> <th style="text-align: center;">Purchase cost</th> <th style="text-align: center;">Scenario</th> <th style="text-align: center;">Min. selling price per item</th> <th style="text-align: center;">Total cost</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">A</td> <td style="text-align: center;">10</td> <td style="text-align: center;">None sold, ABCD in inventory</td> <td style="text-align: center;">$(10+20+30+40)/4 = 25$</td> <td style="text-align: center;">100</td> </tr> <tr> <td style="text-align: center;">B</td> <td style="text-align: center;">20</td> <td style="text-align: center;">New Door, E bought @ 50</td> <td style="text-align: center;">$(100+50)/5 = 30$</td> <td style="text-align: center;">150</td> </tr> <tr> <td style="text-align: center;">C</td> <td style="text-align: center;">30</td> <td style="text-align: center;">Sold A @ 20</td> <td style="text-align: center;">$130/4 = 32.5$</td> <td style="text-align: center;">130</td> </tr> <tr> <td style="text-align: center;">D</td> <td style="text-align: center;">40</td> <td style="text-align: center;">Sold B @ 50</td> <td style="text-align: center;">$80/3 = 26.67$</td> <td style="text-align: center;">80</td> </tr> <tr> <td style="text-align: center;">E</td> <td style="text-align: center;">50</td> <td style="text-align: center;">Sold C @ 100</td> <td style="text-align: center;">0</td> <td style="text-align: center;">-60</td> </tr> </tbody> </table>	Left Door	Purchase cost	Scenario	Min. selling price per item	Total cost	A	10	None sold, ABCD in inventory	$(10+20+30+40)/4 = 25$	100	B	20	New Door, E bought @ 50	$(100+50)/5 = 30$	150	C	30	Sold A @ 20	$130/4 = 32.5$	130	D	40	Sold B @ 50	$80/3 = 26.67$	80	E	50	Sold C @ 100	0	-60
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Prepared by,
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