Supervisor Meeting Minutes #5

Date/Time   27nd Mar 2018, 5.30pm to 6.30pm

Venue   Singapore Management University,
School of Information System Building,
Meeting Room 4.6
80 Stamford Rd, Singapore 178902

Attendees   Toh Ling Jing (Angie), Phang Shi Jia, Ryan Chia Cheng Yu

Agenda
1. Update supervisor on the project
2. Consulting on finding from control chart
3. Consulting on _____
4. Consulting on monte carlo sitmulation model

S/N	Notes/Task	Actor	Follow-up Action
1.	• Update supervisor on the model that we have built – Monte Carlo stimulation • Update supervisor on our refine control chart	All	-
2.	• Update supervisor of the change of min and max value in our control chart using $\pm 3\,sigma$. Values that is above the UCL and LCL will be consist as outliers that we should flag out. • Highlight various outliers that we spotted but not being able to find out what's the reason behind it. • Supervisor stated that finding out the reason behind the outliers are beyond our job scope, Instead, we should highlight our finding to our client. • For instance, significant outliers' patterns are spot for outlet in Yishun whereby there are a constant outlier between Nov 23 to Dec 20 across a few products. Client should monitor the outlets when such outliers is being spot from the control chart. • Upon bringing up our concern if we should remove the outliers out from our prediction model, supervisor suggest that we shouldn't remove it from our model. • Minor opinion from supervisor will be changing the display label of average to 2 decimal points • Supervisor suggest that we might want to look into running control chart via JMP.	All	Identify the outliers and present it to the client. Run control chart via JMP

3.	• Explain to supervisor the fitting model that we use to determine the significant of our variable. • Highlight to supervisor that the day of the week and holiday are not significant to our model. • To test the fitting of the model, use anova to do so. Low p value and high f value means to reject the hypothesis that mean is a good prediction • Scroll down the report to look at the estimator to see which variable is significant. To look so, look at the p value. Lowest than 0.005 • Look at those 47 outlets, highlight that not all are the same, most of them are the same, moving average is good indicators but some are affected by day of the week • Take the historical pattern and try to forecast what will be the next order	All	Test the fitting of the model. Check which variable is significant.
4.	• The dependent variable should not be our lag instead the actual time series demand, quantity • Remove the holiday and month • Update supervisor on the next step to do for our model which is running the time series analysis to cluster products with the same time series pattern together using the wrapping method. Upon clustering the products together, we will run our monte carlo simulation model. • Next, we will be testing the accuracy of the model by taking out one-week worth of data out to test the accuracy of the model. • Using by function to run model for all stores for a specific product	All	Run clustering analysis to cluster product with similar time series pattern together. Test the accuracy of the monte carlo simulation