

20.1

**Describe analytics models that could be used to help the company monetize their data:
How could the company use these data sets to generate value, and what analytics models might they need to do it?**

1)Using only one data set:

Given:

(from data set #3)

- a. list of products purchased in the past, with date of purchase and ship-to address
- b. which web pages the person looked at
- c. how long the person spent on each page

Use: clustering

To: group customers for different target marketing goals

2)Combining different data sets

(from data set #1 , #2 , #3)

1. Matching customers

Given:

- a. name(first, middle, last)
- b. year of birth
- c. year of graduation
- d. email domain
- e. current city

Use: classification

To: Identify same person in different data sets

2. Predicting financial statuses

(from data set #1 , #2)

Given:

- a) output from last model of being same person
- b) university attended
- c) major
- d) financial net worth
- e) payment records

Use: Logistic regression

To: predict situations of financial status of different alumni

3. Discover potential needs

(from data #1,#2,#3)

Given:

- a) output from last model
- b) list of purchase record
- c) which web pages viewed
- d) binary variables of interests

Use: regression

To: discover potential needs of purchasing products (currently not purchased)