

Ch.1. Introduction to Business Statistics

Statistics - statō : state
 \ statōta

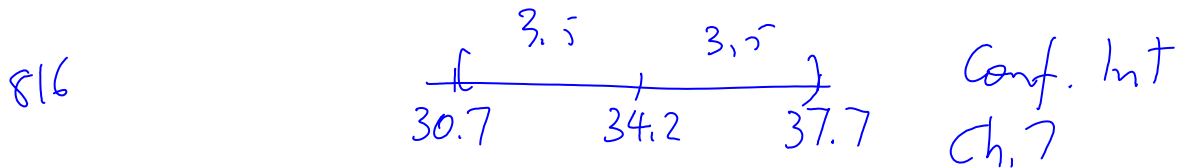


Chs. 1-5
Descriptive

Chs. 6 \rightarrow
Inferential

Who uses stats?

<http://www.cbc.ca/news/politics/story/2013/06/27/pol-nanos-poll-june-numbers-liberal-lead-undecided-voters.html>



Business Finance
 Market's
 Operations

a) Populations & Samples

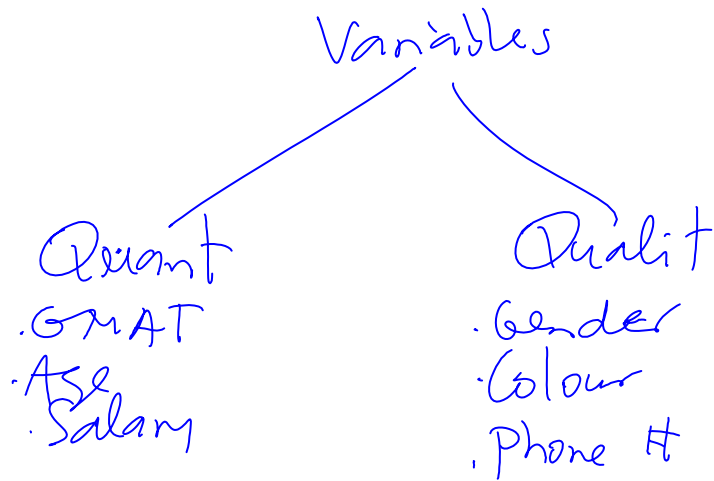
Population : Set of all existing units

Ex. 1st yr MBA

Ex. Honda CRV's 2010

Variables : Characteristics of a pop'n

Ex. GMAT scores
Ex. Fuel efficiency



b) Sampling

Ex. Bad Sample (Truman vs. Dewey)

<http://blogs4brownback.files.wordpress.com/2007/12/dewey-defeats-truman.jpg>

→ Dewey won among households that had phones

(Simple) Random Sample: On each selection from the pop'n, every unit remaining on that selection should have the same chance of being selected

Ex. Revenue Canada audit

100 physicians 00, 01, ..., 99

Pick 10% randomly

①  Bucket

② 1 million random digits

11/05/07

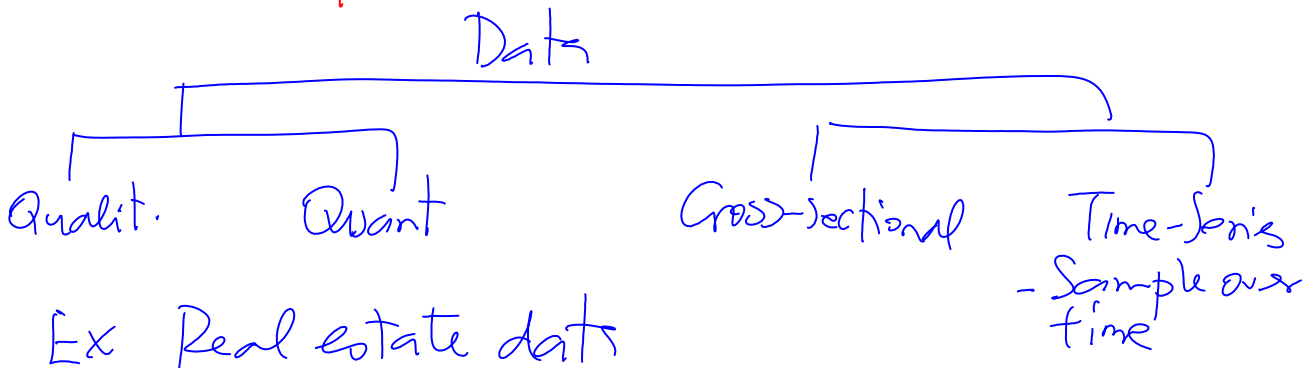
37542
68422

3) Megastat

Uniform
0.70555
0.53342
0.57952
0.28956
0.30195
0.77474
0.01402
0.76072
0.81449
0.70904
0.04535
0.41403
0.86262
0.79048
0.37354
0.96195
0.87145

Pasted from <file:///C:/DOCUME~1/parlar/LOCALS~1/Temp/RandomNumbers.xls>

c) Data Types



<http://profs.degroote.mcmaster.ca/ads/parlar/courses/q600/ChapterComments/documents/RealEstateData.xls>

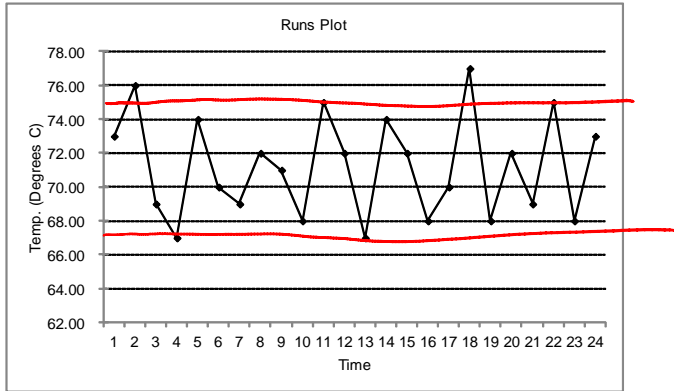
d) Sampling a process

EX. Coffee Temp Case

1994 → Liebec vs. McDonald's
Stella ← \$640,000

Temp 85°C → 70

<http://profs.degroote.mcmaster.ca/ads/parlar/courses/q600/ChapterComments/documents/CoffeeTemp.xls>



- ① In statistical control (reasonable variⁿ)
- ② Capable

Ex. BP

