

```
/* CREATE A TABLE */
```

```
data mylib.first_data;  
input employee $6. salary;  
datalines;  
sammer 1232  
rohan 2343  
raka 5634  
raj 2343  
james 2536  
;  
run;
```

```
/* HOW TO IMPORT EXCEL FILE IN SAS */
```

```
PROC IMPORT DATAFILE="/home/u63730693/my_sas/D_1.xlsx"  
out=catt  
dbms=xlsx replace;  
sheet="Sheet1";  
  
run;
```

```
/* HOW TO READ FROM LIBRARY DATSET */
```

```
data test;  
set mylib.first_data;  
run;
```

```
PROC IMPORT DATAFILE = "/home/u63730693/my_sas/D_1.xlsx"  
OUT=ORD_DTA  
DBMS=xlsx replace;  
sheet= "Sheet2";  
  
run;
```

```
/* HOW TO CREATE A VARIABLE */
```

```
data test;  
set work.ord_dta;  
  
price = qant*5;  
run;
```

```
/* HOW TO RENAME A VARIABLE */
```

```
DATA TEST;  
SET WORK.ORD_DTA;  
RENAME QANT=QTY;  
RUN;
```

```
/* HOW TO DROP A VARIABLE */
```

```
DATA TEXT;  
SET WORK.ORD_DTA;  
DROP PRODUCT_ID;  
RUN;
```

```
/* ----- */
```

```
/* HOW TO FILTER DATA: */
```

```
DATA TEST;  
SET WORK.CATT;  
WHERE SALARY>5000;  
RUN;
```

```
PROC IMPORT DATAFILE = "/home/u63730693/my_sas/D_1.xlsx"  
OUT=CUST  
DBMS=xlsx replace;  
sheet= "Sheet3";
```

```
/* IF THEN ELSE CONDITION : */
```

```
/* A. IF THEN: */
```

```
DATA TEST;  
SET WORK.CUST;  
  
IF SALARY < 2500 THEN CATEGORY="BELOW AVG";  
ELSE CATEGORY="ABOVE AVG";
```

```
RUN;
```

```
/* B. IF THEN ELSE IF THEN ELSE */
```

```
DATA TEST;  
SET WORK.CUST;  
  
IF SALARY < 2500 THEN CATEG="BELOW AVG";  
ELSE IF SALARY >= 2500 AND SALARY < 5000 THEN CATEG="PREMIUM";  
ELSE CATEG="ELITE";
```

```
RUN;
```

```
/* DATA SET OPTIONS: */
```

```
/* KEEPS: */
```

```
/* BELOW CODE GIVE ALL THE OBSERVATIONS WITH ALL THE VARIABLES. */
```

```
DATA KEEPS;  
SET SASHELP.CARS;  
RUN;
```

```
/* IT ONLY GIVE ALL THE OBSERVATIONS WITH SPECIFIC VARIABLES THAT YOU WOULD LIKE TO GET. */
```

```
DATA KEEPS(KEEP=MODEL TYPE MSRP);  
SET SASHELP.CARS;  
RUN;
```

```
/* OTHER WAY TO DO THIS. */
```

```
DATA KEEPS;  
SET SASHELP.CARS (KEEP=MODEL TYPE MSRP);  
RUN;
```

```
/* DROP: */
```

```
/* DROP THE VARIABLES THAT YOU HAVE GIVEN. */
```

```
DATA DROPS(DROP= MSRP TYPE MODEL);  
SET SASHELP.CARS;  
RUN;
```

```
/* OUTPUT: */
```

```
/* IF THE MSRP< 19000 THEN CREATE PRICE TABLE WITH SPECIFIC VARIABLES */  
/* ELSE CREATE ANOTHER TABLE FEATURES WITHOUT HAVING THE VARIABLE IN PRICE TABLE. */
```

```
DATA PRICE(KEEP=MODEL TYPE MSRP) FEATURES(DROP= MODEL TYPE MSRP);  
SET SASHELP.CARS;
```

```
IF MSRP<19000 THEN OUTPUT PRICE;  
ELSE OUTPUT FEATURES;
```

```
RUN;
```

```
/* _N_: */
```

```
/* IT GIVE THE OBSERVATIONS WITH THE HELP OF LINE NUMBER OF THE OBSERVATION. */
```

```
/* HERE WE SPECIFY WHICH LINE NUMBER TO WHICH LINE NUMBER OBSERVATIONS WE WOULD LIKE TO GET. */
```

```
DATA LINENUMBER;  
SET PRICE;
```

```
IF _N_ >=10 AND _N_<20;  
RUN;
```

```
/* OBS: */
```

```
/* IT STANDS FOR OBSERVATION. */
```

```
/* HERE IT GIVE FIRST OBSERVATION TO 15TH OBSERAVTIONS. */
```

```
DATA OBSS;  
SET PRICE(OBS=15);
```

```
RUN;
```

```
/* FIRSTOBS: */
```

```
/* IT STANDS FOR FIRST OBSERVATIONS. */
```

```
/* HERE IT GIVE OBSERVATIONS FROM A GIVEN RANGE. */
```

```
/* NUMBER OF OBSERAVTION YOU WANT, STARTING OBSERAVATION.--- SYNTAX */
```

```
DATA FOBS;  
SET PRICE(OBS=15 FIRSTOBS=7);
```

```
RUN;
```

```
/* ----- */
```

```
/* PROC SORT: */
```

```
/* IT ORDERS THE OBSERVATIONS IN DATA/TABLE IN */  
/* INCREASING/DECREASING ORDER BY */  
/* ONE OR MORE CHARACTER/NUMERIC VARIABLES/COLUMNS. */
```

```
PROC SORT DATA=WORK.CUST;  
BY COUNTRY;  
RUN;
```

```
PROC SORT DATA=WORK.CUST;  
BY COUNTRY;  
BY SALARY;  
RUN;
```

```
/* OTHER WAY */
```

```
PROC SORT DATA=WORK.CUST;  
BY COUNTRY SALARY;  
  
RUN;
```

```
/* OPTIONS: */
```

```
/* OUT: */
```

```
PROC SORT DATA=WORK.CUST OUT=SORTED;  
BY COUNTRY SALARY;  
  
RUN;
```

```
/* DESCENDING: */
```

```
PROC SORT DATA=WORK.CUST OUT=SORTED;  
BY DESCENDING COUNTRY SALARY;  
  
RUN;
```

```
/* NODUPKEY: */
```

```
/* REMOVE THE DUPLICATES BASICS OF ONE COLUMN. */
```

```
PROC SORT DATA=WORK.CUST NODUPKEY OUT=SORTED;  
BY COUNTRY;  
  
RUN;
```

```
/* NODUP: */
```

```
/* DELETE OBSERVATIONS WITH COMMON VALUES IN ALL THE VARIABLES. */
```

```
PROC SORT DATA=WORK.CUST NODUP OUT=SORTED;  
BY COUNTRY;  
  
RUN;
```

```
/* OTHER CRITERIA: */
```

```
PROC SORT DATA=WORK.CUST NODUP OUT=SORTED ;  
BY _ALL_;  
  
RUN;
```

```
/* DUPOUT: */
```

```
PROC SORT DATA=WORK.CUST NODUP OUT=SORTED DUPOUT=DUP ;  
BY _ALL_;  
  
RUN;
```

```
/* PROC FREQUENCY: */
```

```
/* COUNT THE FREQUENCY. */
```

```
PROC FREQ DATA=WORK.CUST;  
TABLES COUNTRY;  
RUN;
```

```
/* IF YOU WANT FREQUENCY VARIABLE ONLY. */
```

```
PROC FREQ DATA=WORK.CUST;  
TABLES COUNTRY/NOPERCENT NOCUM;  
RUN;
```

```
PROC IMPORT DATAFILE = "/home/u63730693/my_sas/D_1.xlsx"  
OUT=CUSTt  
DBMS=xlsx replace;  
sheet= "Sheet3";
```

```
/* TWO DIMENSIONAL FREQUENCY REPORT: */
```

```
PROC FREQ DATA=WORK.CUSTt;  
TABLES CITY * COUNTRY/NOPERCENT NOROW NOCOL;  
RUN;
```

```
/* CONDITIONAL FREQUENCY: */
```

```
PROC FREQ DATA=WORK.CUSTt;  
TABLES CITY * COUNTRY/NOPERCENT NOROW NOCOL;  
WHERE SALARY >=2000;  
RUN;
```

```
/* PROC TRANSPOSE: */
```

```
/* IT TRANSFORMATION FROM OBSERVATIONS TO VARIABLES AND VICE VERSA. */
```

```
/* THE DATASET SHOULD BE UNIQUE.  
SO FIRST REMOVE THE DUPLICATE DATA. */
```

```
/* FIRST SORT THE TABLE: */
```

```
PROC SORT DATA=WORK.CUSTT NODUPKEY OUT=TRANSP;
```

```
BY CITY COUNTRY;
```

```
RUN;
```

```
/* THEN DO THIS BELOW STEP: */
```

```
PROC TRANSPOSE DATA=TRANSP PREFIX=TRANS_ OUT=TRANS(DROP=_:);  
BY CITY;  
ID COUNTRY;  
VAR SALARY;  
RUN;
```

