

```
PROC IMPORT DATAFILE="/home/u63581499/gbcs.csv"
    OUT=gbcs
    DBMS=CSV
    REPLACE;
    GETNAMES=YES;
RUN;

/* log rank test */
PROC LIFETEST DATA=gbcs PLOTS=SURVIVAL;
    TIME survtime * censdead(0);
    STRATA hormone;
RUN;

/*Cox hazard*/
proc phreg data=gbcs;
    model survtime*censdead(0) = hormone;
run;

/*check effect of hormone changes over time*/
data gbcs_2;
    set gbcs;
    hormone_time = hormone * survtime;
run;

proc phreg data=gbcs_2;
    model survtime*censdead(0) = hormone hormone_time;
run;

/*Cox adjusted model*/
proc phreg data=gbcs;
    model survtime*censdead(0) = age menopause hormone size grade nodes prog_recp estrg_recp;
run;

/*sig covariates*/
proc phreg data=gbcs;
    model survtime*censdead(0) = hormone size grade nodes prog_recp;
run;
```