

```

options notes nosource;
proc datasets lib=work nolist memtype=data kill; quit;
* macro to save output and log to appropriate areas ;
%_mprintto;
%put NOTE:
=====;
%put NOTE: Covance Study Number : 000000106324;
%put NOTE: Client Protocol ID : ZRHR-REXC-03-EU;
%put NOTE: Program Name : d_2ADCO.sas;
%put NOTE: Purpose : create ADCO dataset;
%put NOTE: ;
%put NOTE: Input Data : STDLIB.ADCO SDTM.CO ADAM.ADSL SDTM.QS
SDTM.LB SDTM.VS SDTM.PE;
%put NOTE: Output : ADAM.ADCO;
%put NOTE: Macros Called : _MPRINTTO;
%put NOTE: ;
%put NOTE: Programmed by : cvn_smulholl;
%put NOTE: Creation Date : 2013-09-26;
%put NOTE: SAS Version : 9.3;
%put NOTE: ;
%put NOTE: == Latest Run
=====;
%put NOTE: Run by : &sysuserid;
%put NOTE: Date/Time :
%sysfunc(putn(%sysfunc(date()),e8601da.))T%sysfunc(putn(%sysfunc(time()),
e86011z.));
%put NOTE: ;
%put NOTE: == Modification History
=====;
%put NOTE: Date Initials No. Reason;
%put NOTE: 29Apr2014 KB 1) Added ADOMAIN;
%put NOTE: 29Apr2014 KB 2) Added AVALC1;
%put NOTE: 29Apr2014 KB 3) Amended sorting by key variables;
%put NOTE: 29Apr2014 KB 4) Removed COREF from keep statement;
%put NOTE: 13May2014 KB 5) Added EPOCH to keep statements;
%put NOTE: 13May2014 KB 6) Removed PREGNANCY records;
%put NOTE: 04Jun2014 KB 7) Removed reference to COVAL1, VISIT,
VISITNUM and CODTC as not required in the SDTM;
%put NOTE: 27Jul2014 KB 8) Added EXNOTRFL;
%put NOTE: 12Sep2014 KB 9) Added FASFL & PPROTFL to ADSL keep;
%put NOTE: ;
%put NOTE:
=====;
options notes source source2 nofullstimer validvarname=upcase missing='
';
ods _all_ close;
ods listing;

*=====;
* START OF PROGRAM CODE ;
*=====;
*****;
* bring in ADSL ;
*****;

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```

data adsl;
    set adam.adsl;
    keep studyid usubjid subjid: siteid age sex: race height weightb1
bmi ucpdgr1 ucpdgrln nicogr1 nicogrln targr1 targrln cobl
    enrfl scrfl exfl EXNOTRFL enfl complfl fupfl saffl randfl
trt: tr01: dthfl FASFL PPROTFL; /* 8) KB 27Jul2014 */ /* 9) KB 12Sep2014
*/
run;

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*****;
* bring in CO ;
*****;

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data co;
    set sdtm.co;
    format /*adtm datetime13. adt date9. avisit $40.*/ aseq /*avisitn*/
8. avalc /*AVALC1*/ $200. /*rdomain*/ADOMAIN $2.; /* 1) KB 29Apr2014 */
/* 2) KB 29Apr2014 */ /* 7) KB 04Jun2014 */
    avalc = trim(coval);
/* AVALC1=STRIP(COVAL1);*/ /* 2) KB 29Apr2014 */ /* 7) KB 04Jun2014
*/
/* rdomain = trim(domain);*/
ADOMAIN=STRIP(RDOMAIN); /* 1) KB 29Apr2014 */
/* 7) START KB 04Jun2014 */
/*if length(codtc) gt 10 then do;
    adtm = input(codtc,e8601dt.);
    adt = datepart(adtm);
end;*/
/* else if length(codtc) = 10 then adt = input(codtc,yyymmdd10.);*/
/* avisitn = visitnum;*/
/* avisit = propcase(visit);*/
/* 7) END KB 04Jun2014 */
    aseq = coseq;
    keep usubjid /*rdomain*/ADOMAIN avalc /*AVALC1*/ aseq /*coref*/
/*codtc adtm adt visit visitnum avisit: EPOCH*/ ; /* 1) KB 29Apr2014 */
/* 2) KB 29Apr2014 */ /* 4) KB 29Apr2014 */ /* 5) KB 13May2014 */ /* 7)
KB 04Jun2014 */
run;

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*****;
* bring in VS ;
*****;

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data vs;
    set sdtm.vs(where = (not missing(vsreasnd)));
    format adtm datetime13. adt date9. avisit $40. avisitn aseq 8.
/*rdomain*/ADOMAIN $2. avalc $200.; /* 1) KB 29Apr2014 */
/*rdomain*/ADOMAIN = trim(domain); /* 1) KB 29Apr2014 */
    avalc = vsreasnd;
    aseq = vsseq;
    if length(vsdtc) gt 10 then do;
        adtm =
input(scan(vsdtc,1,'T'),yyymmdd10.)*86400+input(scan(vsdtc,2,'T'),time5.);

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        adt = datepart(adtm);
    end;
    else if length(vsdtc) = 10 then adt = input(vsdtc, yymmdd10.);
    avisitn = visitnum;
    avisit = propcase(visit);
    keep usubjid avalc aseq /*rdomain*/ADOMAIN adtm adt visit visitnum
avisit: EPOCH; /* 1) KB 29Apr2014 */ /* 5) KB 13May2014 */
run;

*****;
* bring in QS ;
*****;

data qs;
    set sdtm.qs(where = (not missing(qsreasnd)));
    format adtm datetime13. adt date9. avisit $40. avisitn aseq 8.
/*rdomain*/ADOMAIN $2. avalc $200.; /* 1) KB 29Apr2014 */
/*rdomain*/ADOMAIN = trim(domain); /* 1) KB 29Apr2014 */
    avalc = qsreasnd;
    aseq = qsseq;
    if length(qsdtc) gt 10 then do;
        adtm =
input(scan(qsdtc,1,'T'), yymmdd10.)*86400+input(scan(qsdtc,2,'T'),time5.);
        adt = datepart(adtm);
    end;
    else if length(qsdtc) = 10 then adt = input(qsdtc, yymmdd10.);
    avisitn = visitnum;
    avisit = propcase(visit);
    keep usubjid avalc aseq /*rdomain*/ADOMAIN adtm adt visit visitnum
avisit: EPOCH; /* 1) KB 29Apr2014 */ /* 5) KB 13May2014 */
run;

*****;
* bring in PE ;
*****;

data pe;
    set sdtm.pe(where = (not missing(pereasnd)));
    format adtm datetime13. adt date9. avisit $40. avisitn aseq 8.
/*rdomain*/ADOMAIN $2. avalc $200.; /* 1) KB 29Apr2014 */
/*rdomain*/ADOMAIN = trim(domain); /* 1) KB 29Apr2014 */
    avalc = pereasnd;
    aseq = peseq;
    if length(pedtc) gt 10 then do;
        adtm = input(pedtc, e8601dt.);
        adt = datepart(adtm);
    end;
    else if length(pedtc) = 10 then adt = input(pedtc, yymmdd10.);
    avisitn = visitnum;
    avisit = propcase(visit);
    keep usubjid avalc aseq /*rdomain*/ADOMAIN adtm adt visit visitnum
avisit: EPOCH; /* 1) KB 29Apr2014 */ /* 5) KB 13May2014 */
run;

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*****;
* bring in LB ;
*****;

data lb;
    set sdtm.lb(where = (not missing(lbreasnd) AND LBCAT NE
'PREGNANCY'))); /* 6) KB 13May2014 */
    format adtm datetime13. adt date9. avisit $40. avisitn aseq 8.
/*rdomain*/ADOMAIN $2. avalc $200.; /* 1) KB 29Apr2014 */
    /*rdomain*/ADOMAIN = trim(domain); /* 1) KB 29Apr2014 */
    avalc = lbreasnd;
    aseq = lbseq;
    if length(lbdtc) gt 10 then do;
        adtm =
input(scan(lbdtc,1,'T'),yymmdd10.)*86400+input(scan(lbdtc,2,'T'),time5.);
        adt = datepart(adtm);
    end;
    else if length(lbdtc) = 10 then adt = input(lbdtc,yymmdd10.);
    avisitn = visitnum;
    avisit = propcase(visit);
    keep usubjid avalc aseq /*rdomain*/ADOMAIN adtm adt visit visitnum
avisit: EPOCH; /* 1) KB 29Apr2014 */ /* 5) KB 13May2014 */
run;

*****;
* Combine comment data *;
*****;

data co2;
    length epoch $23. visit $40.;
    set co qs vs pe lb;
run;

proc sort data=co2;
    by usubjid /*rdomain*/ADOMAIN; /* 1) KB 29Apr2014 */
run;
*****;
* Combine ADSL and data *;
*****;

/* macro to allocate period and actual treatment information from ADSL */
%_mtotper;

data slco(drop = trt01: tr01: visit:);
    merge adsl co2(in = a);
    by usubjid;
    if a; * only include subjects with DE data ;
    format aperiod trtan trtpn aday 8. trta trtp $40. aperiodc $10.;
    aday = adt - trtsdt + 1;
    * declare full and partial dates for deriving period;
    %_mperall(dvar1 = adtm, dvar2 = adt);

    aperiodc = 'Period ' || put(aperiod,1.);

```

```

run;

*****;
* create output dataset ;
*****;

options replace;

data adco;
    set stdlib.adco slco;
    label aperiodc = 'Period (C)';
run;

proc sort data = adco out = adam.adco(label= 'Comments Analysis
Dataset');
/*    by usubjid rdomain avisitn;*/
    BY USUBJID ADOMAIN AVISITN ASEQ; /* 3) KB 29Apr2014 */
run;

options noreplace;
proc printto; run;
*=====;
* END OF PROGRAM CODE                               ;
*=====;

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