FERMILAB Technical Division

QUALITY CONTROL REPORT

DATE=12/17/2008 TIME=2:57:34 PM

PART NAME : ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG

REV NUMBER :

SER NUMBER :

STATS COUNT : 1

'Inspected by ' : Robert Riley

'Cavity Number' : AES001 000 RUN 1

BEAM PIPE FLANGE NEAR

DIM LOC1= LOCATION OF PLANE PL-NEAR-END-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Y	0.000	0.000	0.000	0.200	0.200	0.000	----#----
V	0.001	-1.000	0.003				
FL	0.000	0.039	0.039	0.200	0.000	0.000	-#-------

DIM PARL1= PARALLELISM OF PLANE PL-NEAR-END-FLANGE,RFS TO WORKPLANE YMINUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.426	0.426	0.200	0.000	0.226	-------->

DIM ANGL1= 3D ANGLE (COMPLEMENT) FROM PLANE PL-NEAR-END-FLANGE TO YAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	0.000	0.203	0.203	0.100	0.100	0.103	-------->

DIM LOC2= LOCATION OF CIRCLE CR-NEAR-END -FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	0.150	0.149	0.200	0.200	0.000	-------#-
Z	0.000	0.484	0.484	0.200	0.200	0.284	-------->
D	140.000	140.020	0.020	0.300	0.300	0.000	----#----
RN	0.000	0.011	0.011	0.200	0.000	0.000	#--------

BEAM PIPE FLANGE FAR

DIM LOC3= LOCATION OF PLANE PL-FAR-END UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Y	1283.400	1283.647	0.247	3.000	3.000	0.000	----#----
V	-0.000	1.000	0.002				
FL	0.000	0.052	0.052	0.200	0.000	0.000	--#------

DIM PARL2= PARALLELISM OF PLANE PL-FAR-END,RFS TO WORKPLANE YMINUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.228	0.228	0.200	0.000	0.028	-------->

DIM ANGL2= 3D ANGLE (COMPLEMENT) FROM PLANE PL-FAR-END TO YAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	0.000	0.112	0.112	0.100	0.100	0.012	-------->

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DIM LOC4= LOCATION OF CIRCLE CR-FAR-END UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.001	-0.001	0.200	0.200	0.000	----#----
Z	0.000	0.059	0.059	0.200	0.200	0.000	-----#---
D	140.000	139.878	-0.122	0.300	0.300	0.000	--#------
RN	0.000	0.214	0.214	0.200	0.000	0.014	-------->

DATUM-1-PLANE

DIM LOC-DATUM-1-PLANE= LOCATION OF PLANE PLC-DAT-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Y	128.800	128.352	-0.448	0.200	0.200	0.248	<--------
V	0.006	-1.000	0.001				
FL	0.000	0.080	0.080	0.200	0.000	0.000	---#-----

DIM PARL5= PARALLELISM OF PLANE PLC-DAT-1,RFS TO WORKPLANE YMINUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.651	0.651	0.200	0.000	0.451	-------->

DIM ANGL7= 3D ANGLE (TRUE) FROM PLANE PLC-DAT-1 TO YAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	0.000	0.353	0.353	0.100	0.100	0.253	-------->

DATUM-2-PLANE

DIM LOC-DATUM-2-PLANE= LOCATION OF PLANE PLC-DAT-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Y	1190.000	1190.246	0.246	0.200	0.200	0.046	-------->
V	0.003	1.000	0.003				
FL	0.000	0.064	0.064	0.200	0.000	0.000	--#------

DIM PARL6= PARALLELISM OF PLANE PLC-DAT-2,RFS TO WORKPLANE YMINUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.485	0.485	0.200	0.000	0.285	-------->

DIM ANGL8= 3D ANGLE (TRUE) FROM PLANE PLC-DAT-2 TO YAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	0.000	0.265	0.265	0.100	0.100	0.165	-------->

PICKUP ANTENNA FLANGE NW8

DIM LOC5= LOCATION OF PLANE PL-NW8-ANTENNA-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-53.800	-54.056	-0.256	0.200	0.200	0.056	<--------
V	-1.000	-0.004	-0.001				
FL	0.000	0.002	0.002	0.200	0.000	0.000	#--------

DIM PARL3= PARALLELISM OF PLANE PL-NW8-ANTENNA-FLANGE,RFS TO WORKPLANE XMINUS UNITS =MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.101	0.101	0.200	0.000	0.000	----#----

DIM ANGL3= 3D ANGLE (TRUE) FROM PLANE PL-NW8-ANTENNA-FLANGE TO XAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL

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A	0.000	0.232	0.232	0.100	0.100	0.132	-------->

DIM LOC6= LOCATION OF CIRCLE CR-NW8-ANTENNA-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Y	96.600	96.411	-0.189	0.200	0.200	0.000	#--------
Z	0.000	0.354	0.354	0.200	0.200	0.154	-------->
D	33.800	33.798	-0.002	0.150	0.000	0.002	<--------
RN	0.000	0.013	0.013	0.150	0.000	0.000	#--------

MAIN COUPLER FLANGE NW40

DIM LOC7= LOCATION OF PLANE PL-NW-40-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	88.000	88.056	0.056	0.200	0.200	0.000	-----#---
V	1.000	0.001	0.001				
FL	0.000	0.028	0.028	0.200	0.000	0.000	-#-------

DIM PARL4= PARALLELISM OF PLANE PL-NW-40-FLANGE,RFS TO WORKPLANE XMINUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.120	0.120	0.200	0.000	0.000	-----#---

DIM ANGL4= 3D ANGLE (TRUE) FROM PLANE PL-NW-40-FLANGE TO XAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	0.000	0.102	0.102	0.100	0.100	0.002	-------->

DIM LOC8= LOCATION OF CIRCLE CR-NW-40-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Y	1222.800	1222.821	0.021	0.200	0.200	0.000	----#----
Z	0.000	0.451	0.451	0.200	0.200	0.251	-------->
D	76.000	76.025	0.025	0.200	0.000	0.000	-#-------
RN	0.000	0.008	0.008	0.200	0.000	0.000	#--------

DIM DIST1= 2D DISTANCE FROM CIRCLE CR-NW-40-FLANGE TO PLANE PL-FAR-END PAR TO YAXI
S, NO RADIUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	60.600	60.826	0.226	0.200	0.200	0.026	-------->

HOM-2 FLANGE NW12

DIM FLAT4= FLATNESS OF PLANE PL-NW12-HOM-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	0.000	0.004	0.004	0.200	0.000	0.000	#--------

DIM ANGL5= 2D ANGLE (COMPLEMENT) FROM PLANE PL-NW12-HOM-FLANGE TO ZAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	15.000	18.515	3.515	0.500	0.500	3.015	-------->

DIM ANGL6= 2D ANGLE (TRUE) FROM PLANE PL-NW12-HOM-FLANGE TO ZAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	35.000	34.926	-0.074	0.500	0.500	0.000	---#-----

DIM LOC9= LOCATION OF CIRCLE CR-NW12-HOM-FLANGE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-71.676	-71.676	100.000	100.000	0.000	-#-------
Y	0.000	1226.526	1226.526	2000.000	2000.000	0.000	-------#-
Z	0.000	-9.715	-9.715	100.000	100.000	0.000	----#----
D	33.800	33.811	0.011	0.150	0.000	0.000	#--------
RN	0.000	0.024	0.024	0.150	0.000	0.000	-#-------

HOM 1 LOCATION

DIM LOC-HOM1= LOCATION OF CYLINDER CY-HOM-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	69.167	69.167	100.000	100.000	0.000	-------#-
Y	96.600	96.495	-0.105	0.200	0.200	0.000	--#------
Z	0.000	-40.208	-40.208	100.000	100.000	0.000	--#------
D	44.000	43.808	-0.192	0.000	0.100	0.092	<--------
RN	0.000	0.107	0.107	0.100	0.000	0.007	-------->
V	-0.862	-0.001	0.506				

DIM ANGL9= 3D ANGLE (COMPLEMENT) FROM CYLINDER CY-HOM-1 TO XAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	30.000	30.423	0.423	0.500	0.500	0.000	--------#

DIM ANGL10= 3D ANGLE (TRUE) FROM CYLINDER CY-HOM-1 TO YAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	90.000	89.962	-0.038	0.500	0.500	0.000	----#----

DIM ANGL11= 3D ANGLE (TRUE) FROM CYLINDER CY-HOM-1 TO ZAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	60.000	59.577	-0.423	0.500	0.500	0.000	#--------

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DIM LOC-HOM3= LOCATION OF POINT PT-RT-HOM-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
PR	116.000	116.235	0.235	0.200	0.200	0.035	-------->

INTERSECTION OF HOM1 & YZ PLANE

DIM LOC-HOM1 X PLANE= LOCATION OF POINT PTC-HOM1 X YZ PLANE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	0.000	0.000	0.200	0.200	0.000	----#----
Y	96.600	96.442	-0.158	0.200	0.200	0.000	#--------
Z	0.000	0.410	0.410	0.200	0.200	0.210	-------->

HOM 2 LOCATION

DIM LOC-HOM2= LOCATION OF CYLINDER CY-HOM-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-64.471	-64.471	100.000	100.000	0.000	-#-------
Y	1222.800	1223.095	0.295	3.000	3.000	0.000	----#----
Z	0.000	-45.606	-45.606	100.000	100.000	0.000	--#------
D	44.000	43.805	-0.195	0.000	0.100	0.095	<--------
RN	0.000	0.145	0.145	0.100	0.000	0.045	-------->
V	-0.818	0.002	-0.575				

DIM DIST2= 2D DISTANCE FROM POINT PT-HOM-2 TO PLANE PL-FAR-END PAR TO YAXIS, NO_RA
DIUS UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
M	60.600	59.505	-1.095	0.200	0.200	0.895	<--------

DIM ANGL12= 3D ANGLE (TRUE) FROM CYLINDER CY-HOM-2 TO XAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	35.000	35.108	0.108	0.500	0.500	0.000	-----#---

DIM ANGL13= 3D ANGLE (COMPLEMENT) FROM CYLINDER CY-HOM-2 TO YAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	90.000	90.092	0.092	0.500	0.500	0.000	-----#---

DIM ANGL14= 3D ANGLE (TRUE) FROM CYLINDER CY-HOM-2 TO ZAXIS

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
A	55.000	54.893	-0.107	0.500	0.500	0.000	---#-----

DIM LOC-HOM4= LOCATION OF POINT PT-HOM-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
PR	116.000	116.297	0.297	0.200	0.200	0.097	-------->

INTERSECTION OF HOM2 & YZ PLANE

DIM LOC-HOM2 X PLANE= LOCATION OF POINT PTC-HOM2 X YZ PLANE UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	0.000	0.000	0.200	0.200	0.000	----#----
Y	1222.800	1222.969	0.169	3.000	3.000	0.000	----#----
Z	0.000	-0.282	-0.282	0.200	0.200	0.082	<--------

LOCATIONS OF CONSTRUCTED CIRCLES
ON 18 HALF CELLS & 2 DATUM SURFACES & 2 VACUUM SURFACES

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DIM LOC-CC1= LOCATION OF CIRCLE CRC-DAT-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	0.000	0.000	0.200	0.200	0.000	----#----
Y	0.000	130.183	130.183	2000.000	2000.000	0.000	----#----
Z	0.000	0.000	0.000	0.200	0.200	0.000	----#----
D	111.000	110.724	-0.276	0.200	0.200	0.076	<--------
RN	0.000	0.053	0.053	0.200	0.000	0.000	--#------

DIM LOC-CC2= LOCATION OF CIRCLE CRC-VAC-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.186	-0.186	0.200	0.200	0.000	#--------
Y	0.000	158.440	158.440	2000.000	2000.000	0.000	----#----
Z	0.000	-0.017	-0.017	0.200	0.200	0.000	----#----
D	191.200	191.252	0.052	0.200	0.200	0.000	-----#---
RN	0.000	0.047	0.047	0.200	0.000	0.000	--#------

DIM LOC-CC3= LOCATION OF CIRCLE CRC-CAV-1-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.355	-0.355	0.200	0.200	0.155	<--------
Y	0.000	193.537	193.537	2000.000	2000.000	0.000	----#----
Z	0.000	-0.133	-0.133	0.200	0.200	0.000	-#-------
D	210.300	211.057	0.756	0.200	0.200	0.556	-------->
RN	0.000	0.167	0.167	0.200	0.000	0.000	-------#-

DIM LOC-CC4= LOCATION OF CIRCLE CRC-CAV-1-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.418	-0.418	0.200	0.200	0.218	<--------
Y	0.000	202.323	202.323	2000.000	2000.000	0.000	----#----
Z	0.000	-0.149	-0.150	0.200	0.200	0.000	-#-------
D	210.300	211.032	0.731	0.200	0.200	0.531	-------->
RN	0.000	0.125	0.125	0.200	0.000	0.000	-----#---

DIM LOC-CC5= LOCATION OF CIRCLE CRC-CAV-2-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.669	-0.669	0.200	0.200	0.469	<--------
Y	0.000	309.444	309.444	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.510	-0.510	0.200	0.200	0.310	<--------
D	210.300	211.051	0.751	0.200	0.200	0.551	-------->
RN	0.000	0.270	0.270	0.200	0.000	0.070	-------->

DIM LOC-CC6= LOCATION OF CIRCLE CRC-CAV-2-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.655	-0.655	0.200	0.200	0.455	<--------
Y	0.000	318.669	318.669	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.476	-0.476	0.200	0.200	0.276	<--------
D	210.300	210.996	0.696	0.200	0.200	0.496	-------->
RN	0.000	0.219	0.219	0.200	0.000	0.019	-------->

DIM LOC-CC7= LOCATION OF CIRCLE CRC-CAV-3-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.809	-0.809	0.200	0.200	0.609	<--------
Y	0.000	424.699	424.699	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.749	-0.749	0.200	0.200	0.549	<--------
D	210.300	211.054	0.753	0.200	0.200	0.553	-------->
RN	0.000	0.285	0.285	0.200	0.000	0.085	-------->

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DIM LOC-CC8= LOCATION OF CIRCLE CRC-CAV-3-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.797	-0.798	0.200	0.200	0.598	<--------
Y	0.000	433.869	433.869	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.783	-0.783	0.200	0.200	0.583	<--------
D	210.300	211.001	0.701	0.200	0.200	0.501	-------->
RN	0.000	0.197	0.197	0.200	0.000	0.000	--------#

DIM LOC-CC9= LOCATION OF CIRCLE CRC-CAV-4-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.813	-0.814	0.200	0.200	0.614	<--------
Y	0.000	540.413	540.413	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.954	-0.954	0.200	0.200	0.754	<--------
D	210.300	211.111	0.811	0.200	0.200	0.611	-------->
RN	0.000	0.246	0.246	0.200	0.000	0.046	-------->

DIM LOC-CC10= LOCATION OF CIRCLE CRC-CAV-4-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.805	-0.805	0.200	0.200	0.605	<--------
Y	0.000	549.315	549.315	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.944	-0.945	0.200	0.200	0.745	<--------
D	210.300	211.022	0.722	0.200	0.200	0.522	-------->
RN	0.000	0.210	0.210	0.200	0.000	0.010	-------->

DIM LOC-CC11= LOCATION OF CIRCLE CRC-CAV-5-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.823	-0.824	0.200	0.200	0.624	<--------
Y	0.000	654.944	654.944	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.996	-0.996	0.200	0.200	0.796	<--------
D	210.300	211.252	0.951	0.200	0.200	0.751	-------->
RN	0.000	0.105	0.105	0.200	0.000	0.000	----#----

DIM LOC-CC12= LOCATION OF CIRCLE CRC-CAV-5-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.800	-0.800	0.200	0.200	0.600	<--------
Y	0.000	663.940	663.940	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.984	-0.984	0.200	0.200	0.784	<--------
D	210.300	211.174	0.873	0.200	0.200	0.673	-------->
RN	0.000	0.349	0.349	0.200	0.000	0.149	-------->

DIM LOC-CC13= LOCATION OF CIRCLE CRC-CAV-6-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.748	-0.748	0.200	0.200	0.548	<--------
Y	0.000	770.987	770.987	2000.000	2000.000	0.000	------#--
Z	0.000	-0.929	-0.929	0.200	0.200	0.729	<--------
D	210.300	211.104	0.803	0.200	0.200	0.603	-------->
RN	0.000	0.108	0.108	0.200	0.000	0.000	----#----

DIM LOC-CC14= LOCATION OF CIRCLE CRC-CAV-6-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.740	-0.740	0.200	0.200	0.540	<--------
Y	0.000	779.375	779.375	2000.000	2000.000	0.000	------#--
Z	0.000	-0.923	-0.923	0.200	0.200	0.723	<--------
D	210.300	211.029	0.729	0.200	0.200	0.529	-------->
RN	0.000	0.335	0.335	0.200	0.000	0.135	-------->

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DIM LOC-CC15= LOCATION OF CIRCLE CRC-CAV-7-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.626	-0.626	0.200	0.200	0.426	<--------
Y	0.000	886.231	886.231	2000.000	2000.000	0.000	------#--
Z	0.000	-0.815	-0.815	0.200	0.200	0.615	<--------
D	210.300	211.067	0.766	0.200	0.200	0.566	-------->
RN	0.000	0.183	0.183	0.200	0.000	0.000	--------#

DIM LOC-CC16= LOCATION OF CIRCLE CRC-CAV-7-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.647	-0.647	0.200	0.200	0.447	<--------
Y	0.000	895.295	895.295	2000.000	2000.000	0.000	------#--
Z	0.000	-0.802	-0.802	0.200	0.200	0.602	<--------
D	210.300	211.052	0.752	0.200	0.200	0.552	-------->
RN	0.000	0.224	0.224	0.200	0.000	0.024	-------->

DIM LOC-CC17= LOCATION OF CIRCLE CRC-CAV-8-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.492	-0.492	0.200	0.200	0.292	<--------
Y	0.000	1002.048	1002.048	2000.000	2000.000	0.000	------#--
Z	0.000	-0.504	-0.504	0.200	0.200	0.304	<--------
D	210.300	211.060	0.760	0.200	0.200	0.560	-------->
RN	0.000	0.243	0.243	0.200	0.000	0.043	-------->

DIM LOC-CC18= LOCATION OF CIRCLE CRC-CAV-8-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.436	-0.436	0.200	0.200	0.236	<--------
Y	0.000	1011.008	1011.008	2000.000	2000.000	0.000	------#--
Z	0.000	-0.432	-0.432	0.200	0.200	0.232	<--------
D	210.300	211.003	0.703	0.200	0.200	0.503	-------->
RN	0.000	0.194	0.194	0.200	0.000	0.000	--------#

DIM LOC-CC19= LOCATION OF CIRCLE CRC-CAV-9-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.304	-0.304	0.200	0.200	0.104	<--------
Y	0.000	1117.389	1117.389	2000.000	2000.000	0.000	-------#-
Z	0.000	-0.103	-0.103	0.200	0.200	0.000	--#------
D	210.300	211.087	0.787	0.200	0.200	0.587	-------->
RN	0.000	0.237	0.237	0.200	0.000	0.037	-------->

DIM LOC-CC20= LOCATION OF CIRCLE CRC-CAV-9-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.315	-0.315	0.200	0.200	0.115	<--------
Y	0.000	1126.441	1126.441	2000.000	2000.000	0.000	-------#-
Z	0.000	-0.182	-0.182	0.200	0.200	0.000	#--------
D	210.300	210.900	0.599	0.200	0.200	0.399	-------->
RN	0.000	0.202	0.202	0.200	0.000	0.002	-------->

DIM LOC-CC21= LOCATION OF CIRCLE CRC-VAC-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.106	-0.106	0.200	0.200	0.000	--#------
Y	0.000	1157.485	1157.485	2000.000	2000.000	0.000	-------#-
Z	0.000	-0.111	-0.111	0.200	0.200	0.000	--#------
D	200.000	200.102	0.101	0.200	0.200	0.000	------#--
RN	0.000	0.085	0.085	0.200	0.000	0.000	---#-----

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DIM LOC-CC22= LOCATION OF CIRCLE CRC-DAT-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	0.000	0.000	0.200	0.200	0.000	----#----
Y	0.000	1188.230	1188.230	2000.000	2000.000	0.000	-------#-
Z	0.000	0.000	0.000	0.200	0.200	0.000	----#----
D	111.000	110.807	-0.193	0.200	0.200	0.000	#--------
RN	0.000	0.052	0.052	0.200	0.000	0.000	--#------

TRUE POSITIONS OF CONSTRUCTED CIRCLES
ON 18 HALF CELLS & 2 DATUM SURFACES & 2 VACUUM SURFACES

DIM LOC-TP-CC1= TRUE POSITION OF CIRCLE CRC-DAT-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	0.000	0.000					
Z	0.000	0.000	0.000					
TP	RFS		0.000	0.200		0.000	0.000	#--- -----

DIM LOC-TP-CC2= TRUE POSITION OF CIRCLE CRC-VAC-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.186	-0.186					
Z	0.000	-0.017	-0.017					
TP	RFS		0.374	0.200		0.000	0.174	---- ---->

DIM LOC-TP-CC3= TRUE POSITION OF CIRCLE CRC-CAV-1-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.355	-0.355					
Z	0.000	-0.133	-0.133					
TP	RFS		0.759	0.200		0.000	0.559	---- ---->

DIM LOC-TP-CC4= TRUE POSITION OF CIRCLE CRC-CAV-1-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.418	-0.418					
Z	0.000	-0.149	-0.150					
TP	RFS		0.888	0.200		0.000	0.688	---- ---->

DIM LOC-TP-CC5= TRUE POSITION OF CIRCLE CRC-CAV-2-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.669	-0.669					
Z	0.000	-0.510	-0.510					
TP	RFS		1.683	0.200		0.000	1.483	---- ---->

DIM LOC-TP-CC6= TRUE POSITION OF CIRCLE CRC-CAV-2-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.655	-0.655					
Z	0.000	-0.476	-0.476					
TP	RFS		1.620	0.200		0.000	1.420	---- ---->

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DIM LOC-TP-CC7= TRUE POSITION OF CIRCLE CRC-CAV-3-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.809	-0.809					
Z	0.000	-0.749	-0.749					
TP	RFS		2.205	0.200		0.000	2.005	---->

DIM LOC-TP-CC8= TRUE POSITION OF CIRCLE CRC-CAV-3-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.797	-0.798					
Z	0.000	-0.783	-0.783					
TP	RFS		2.235	0.200		0.000	2.035	---->

DIM LOC-TP-CC9= TRUE POSITION OF CIRCLE CRC-CAV-4-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.813	-0.814					
Z	0.000	-0.954	-0.954					
TP	RFS		2.507	0.200		0.000	2.307	---->

DIM LOC-TP-CC10= TRUE POSITION OF CIRCLE CRC-CAV-4-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.805	-0.805					
Z	0.000	-0.944	-0.945					
TP	RFS		2.483	0.200		0.000	2.283	---->

DIM LOC-TP-CC11= TRUE POSITION OF CIRCLE CRC-CAV-5-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.823	-0.824					
Z	0.000	-0.996	-0.996					
TP	RFS		2.585	0.200		0.000	2.385	---->

DIM LOC-TP-CC12= TRUE POSITION OF CIRCLE CRC-CAV-5-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.800	-0.800					
Z	0.000	-0.984	-0.984					
TP	RFS		2.536	0.200		0.000	2.336	---->

DIM LOC-TP-CC13= TRUE POSITION OF CIRCLE CRC-CAV-6-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.748	-0.748					
Z	0.000	-0.929	-0.929					
TP	RFS		2.386	0.200		0.000	2.186	---->

DIM LOC-TP-CC14= TRUE POSITION OF CIRCLE CRC-CAV-6-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.740	-0.740					
Z	0.000	-0.923	-0.923					
TP	RFS		2.367	0.200		0.000	2.167	---->

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DIM LOC-TP-CC15= TRUE POSITION OF CIRCLE CRC-CAV-7-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.626	-0.626					
Z	0.000	-0.815	-0.815					
TP	RFS		2.056	0.200		0.000	1.856	---->

DIM LOC-TP-CC16= TRUE POSITION OF CIRCLE CRC-CAV-7-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.647	-0.647					
Z	0.000	-0.802	-0.802					
TP	RFS		2.061	0.200		0.000	1.861	---->

DIM LOC-TP-CC17= TRUE POSITION OF CIRCLE CRC-CAV-8-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.492	-0.492					
Z	0.000	-0.504	-0.504					
TP	RFS		1.408	0.200		0.000	1.208	---->

DIM LOC-TP-CC18= TRUE POSITION OF CIRCLE CRC-CAV-8-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.436	-0.436					
Z	0.000	-0.432	-0.432					
TP	RFS		1.228	0.200		0.000	1.028	---->

DIM LOC-TP-CC19= TRUE POSITION OF CIRCLE CRC-CAV-9-1 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.304	-0.304					
Z	0.000	-0.103	-0.103					
TP	RFS		0.642	0.200		0.000	0.442	---->

DIM LOC-TP-CC20= TRUE POSITION OF CIRCLE CRC-CAV-9-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.315	-0.315					
Z	0.000	-0.182	-0.182					
TP	RFS		0.727	0.200		0.000	0.527	---->

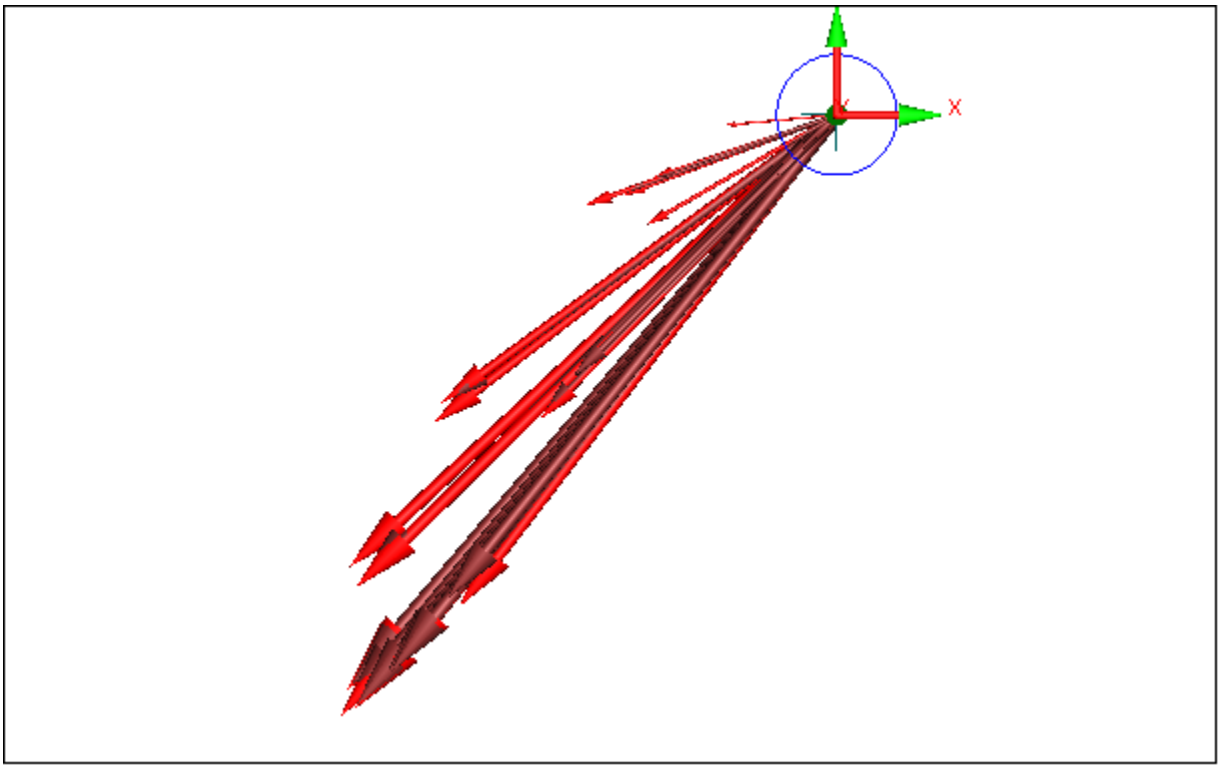
DIM LOC-TP-CC21= TRUE POSITION OF CIRCLE CRC-VAC-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	-0.106	-0.106					
Z	0.000	-0.111	-0.111					
TP	RFS		0.306	0.200		0.000	0.106	---->

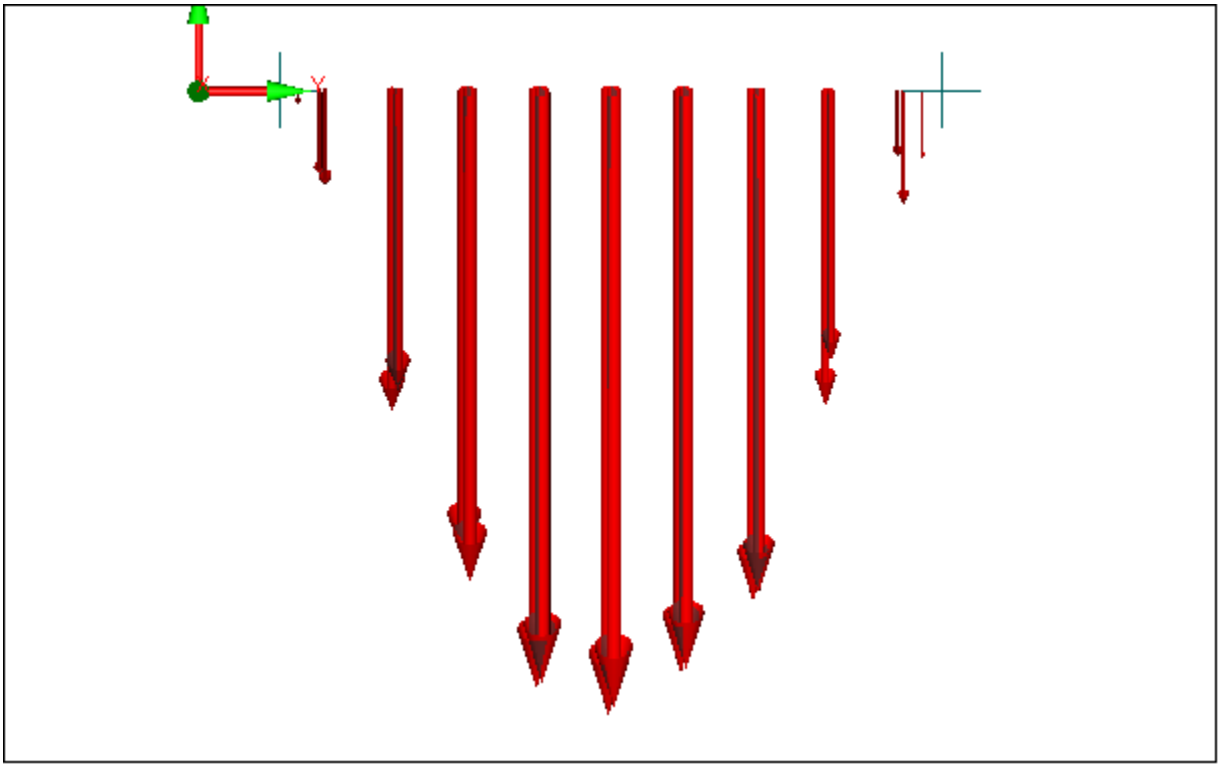
DIM LOC-TP-CC22= TRUE POSITION OF CIRCLE CRC-DAT-2 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	BONUS	OUTTOL	
X	0.000	0.000	0.000					
Z	0.000	0.000	0.000					
TP	RFS		0.000	0.200		0.000	0.000	#-----

True Position plots from 3 views
x1000



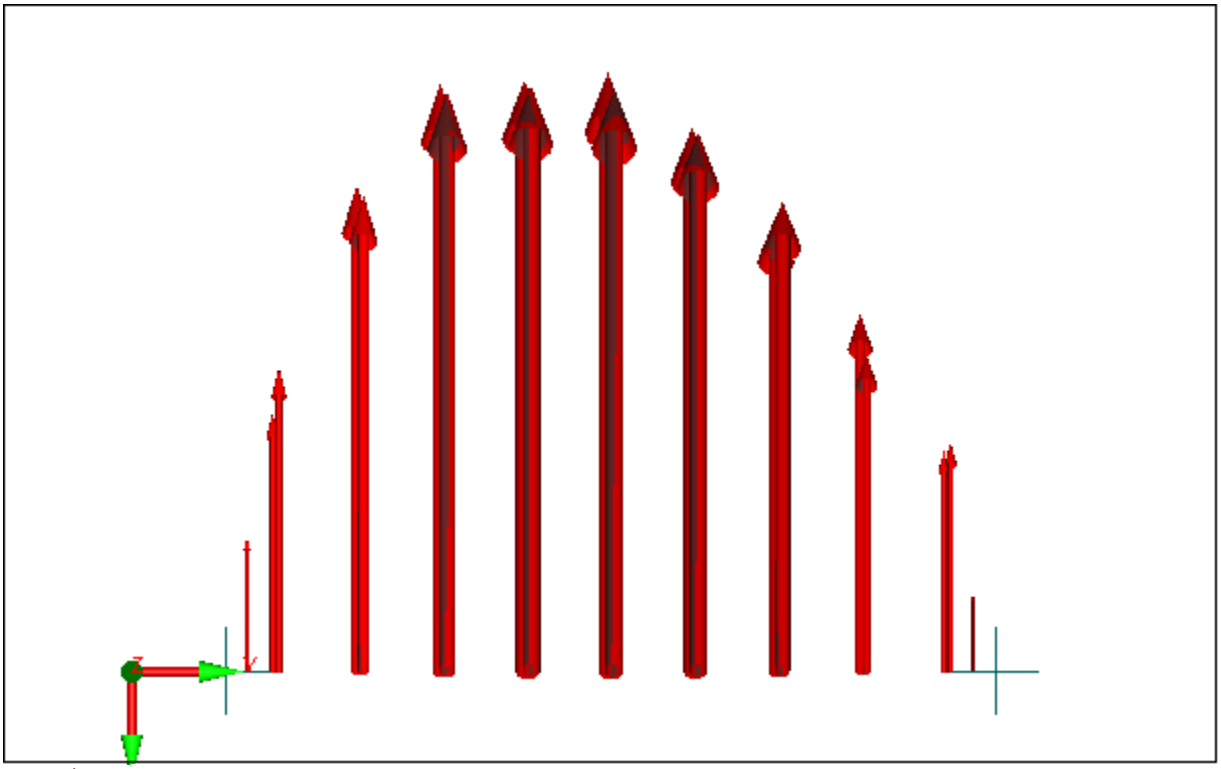
-Y View
x1000



PART NUMBER=ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG DATE=12/17/2008 TIME=2

+X View

x1000



+Z View

x1000

DIM LOC-BEST FIT CONSTRUCTED LINE= LOCATION OF LINE LNC-BEST-FIT UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.525	-0.525	0.200	0.200	0.325	<--------
Y	0.000	659.739	659.739	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.523	-0.523	0.200	0.200	0.323	<--------
ST	0.000	1.329	1.329	0.200	0.000	1.129	-------->

SUPPORT RING CIRCLE LOCATIONS

DIM LOC-SUPPORT RING-1= LOCATION OF CIRCLE CR-SUPPORT-RING-T12 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.833	-0.834	0.200	0.200	0.634	<--------
Y	0.000	255.704	255.704	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.370	-0.371	0.200	0.200	0.171	<--------
R	56.500	56.481	-0.019	0.200	0.200	0.000	----#----
RN	0.000	0.090	0.090	0.200	0.000	0.000	----#----

DIM LOC-SUPPORT RING-2= LOCATION OF CIRCLE CR-SUPPORT-RING-T23 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-1.421	-1.421	0.200	0.200	1.221	<--------
Y	0.000	371.035	371.035	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.628	-0.628	0.200	0.200	0.428	<--------
R	56.500	56.226	-0.274	0.200	0.200	0.074	<--------
RN	0.000	0.187	0.187	0.200	0.000	0.000	--------#

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DIM LOC-SUPPORT RING-3= LOCATION OF CIRCLE CR-SUPPORT-RING-T34 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.195	-0.195	0.200	0.200	0.000	#--------
Y	0.000	486.365	486.365	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.911	-0.911	0.200	0.200	0.711	<--------
R	56.500	57.228	0.728	0.200	0.200	0.528	-------->
RN	0.000	0.007	0.007	0.200	0.000	0.000	#--------

DIM LOC-SUPPORT RING-4= LOCATION OF CIRCLE CR-SUPPORT-RING-T45 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.977	-0.978	0.200	0.200	0.778	<--------
Y	0.000	601.697	601.697	2000.000	2000.000	0.000	-----#---
Z	0.000	-0.978	-0.978	0.200	0.200	0.778	<--------
R	56.500	56.539	0.039	0.200	0.200	0.000	-----#---
RN	0.000	0.019	0.019	0.200	0.000	0.000	#--------

DIM LOC-SUPPORT RING-5= LOCATION OF CIRCLE CR-SUPPORT-RING-T56 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.452	-0.452	0.200	0.200	0.252	<--------
Y	0.000	716.804	716.804	2000.000	2000.000	0.000	------#--
Z	0.000	-1.057	-1.057	0.200	0.200	0.857	<--------
R	56.500	56.917	0.417	0.200	0.200	0.217	-------->
RN	0.000	0.012	0.012	0.200	0.000	0.000	#--------

DIM LOC-SUPPORT RING-6= LOCATION OF CIRCLE CR-SUPPORT-RING-T67 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-0.726	-0.726	0.200	0.200	0.526	<--------
Y	0.000	832.004	832.004	2000.000	2000.000	0.000	------#--
Z	0.000	-0.938	-0.938	0.200	0.200	0.738	<--------
R	56.500	56.601	0.101	0.200	0.200	0.000	------#--
RN	0.000	0.028	0.028	0.200	0.000	0.000	-#-------

DIM LOC-SUPPORT RING-7= LOCATION OF CIRCLE CR-SUPPORT-RING-T78 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	-1.245	-1.246	0.200	0.200	1.046	<--------
Y	0.000	947.405	947.405	2000.000	2000.000	0.000	------#--
Z	0.000	-0.640	-0.640	0.200	0.200	0.440	<--------
R	56.500	56.404	-0.096	0.200	0.200	0.000	--#------
RN	0.000	0.144	0.144	0.200	0.000	0.000	------#--

DIM LOC-SUPPORT RING-8= LOCATION OF CIRCLE CR-SUPPORT-RING-T89 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	0.000	0.274	0.273	0.200	0.200	0.073	-------->
Y	0.000	1062.701	1062.701	2000.000	2000.000	0.000	------#--
Z	0.000	-0.588	-0.588	0.200	0.200	0.388	<--------
R	56.500	57.096	0.596	0.200	0.200	0.396	-------->
RN	0.000	0.031	0.031	0.200	0.000	0.000	-#-------

SUPPORT RING POINT LOCATIONS

PART NUMBER=ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG DATE=12/17/2008 TIME=2

DIM LOC-SUPPORT RING-PT1= LOCATION OF POINT PT-SUPPORT-RING-T12 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.320	-0.820	0.200	0.200	0.620	<--------
Y	0.000	249.001	249.001	2000.000	2000.000	0.000	-----#---
Z	0.000	0.023	0.023	0.200	0.200	0.000	-----#---

DIM LOC-SUPPORT RING-PT2= LOCATION OF POINT PT-SUPPORT-RING-T23 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.811	-1.311	0.200	0.200	1.111	<--------
Y	0.000	363.202	363.202	2000.000	2000.000	0.000	-----#---
Z	0.000	0.021	0.021	0.200	0.200	0.000	----#----

DIM LOC-SUPPORT RING-PT3= LOCATION OF POINT PT-SUPPORT-RING-T34 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.600	-1.100	0.200	0.200	0.900	<--------
Y	0.000	477.622	477.622	2000.000	2000.000	0.000	-----#---
Z	0.000	0.020	0.020	0.200	0.200	0.000	----#----

DIM LOC-SUPPORT RING-PT4= LOCATION OF POINT PT-SUPPORT-RING-T45 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.749	-1.249	0.200	0.200	1.049	<--------
Y	0.000	592.908	592.908	2000.000	2000.000	0.000	-----#---
Z	0.000	0.018	0.018	0.200	0.200	0.000	----#----

DIM LOC-SUPPORT RING-PT5= LOCATION OF POINT PT-SUPPORT-RING-T56 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.378	-0.878	0.200	0.200	0.678	<--------
Y	0.000	707.882	707.882	2000.000	2000.000	0.000	------#--
Z	0.000	0.016	0.016	0.200	0.200	0.000	----#----

DIM LOC-SUPPORT RING-PT6= LOCATION OF POINT PT-SUPPORT-RING-T67 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.598	-1.098	0.200	0.200	0.898	<--------
Y	0.000	823.209	823.209	2000.000	2000.000	0.000	------#--
Z	0.000	0.015	0.015	0.200	0.200	0.000	----#----

DIM LOC-SUPPORT RING-PT7= LOCATION OF POINT PT-SUPPORT-RING-T78 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.798	-1.298	0.200	0.200	1.098	<--------
Y	0.000	938.488	938.488	2000.000	2000.000	0.000	------#--
Z	0.000	0.013	0.013	0.200	0.200	0.000	----#----

DIM LOC-SUPPORT RING-PT8= LOCATION OF POINT PT-SUPPORT-RING-T89 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.065	-0.565	0.200	0.200	0.365	<--------
Y	0.000	1053.921	1053.921	2000.000	2000.000	0.000	------#--
Z	0.000	0.011	0.011	0.200	0.200	0.000	----#----

SUPPORT RING CIRCLES IN Z

DIM LOC Z SUPPORT RING CIRCLES 1= LOCATION OF CIRCLE CR-SUPPORT-RING-T12 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.370	-0.371	0.200	0.200	0.171	<--------

PART NUMBER=ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG DATE=12/17/2008 TIME=2

DIM LOC Z SUPPORT RING CIRCLES 2= LOCATION OF CIRCLE CR-SUPPORT-RING-T23 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.628	-0.628	0.200	0.200	0.428	<--------

DIM LOC Z SUPPORT RING CIRCLES 3= LOCATION OF CIRCLE CR-SUPPORT-RING-T34 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.911	-0.911	0.200	0.200	0.711	<--------

DIM LOC Z SUPPORT RING CIRCLES 4= LOCATION OF CIRCLE CR-SUPPORT-RING-T45 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.978	-0.978	0.200	0.200	0.778	<--------

DIM LOC Z SUPPORT RING CIRCLES 5= LOCATION OF CIRCLE CR-SUPPORT-RING-T56 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-1.057	-1.057	0.200	0.200	0.857	<--------

DIM LOC Z SUPPORT RING CIRCLES 6= LOCATION OF CIRCLE CR-SUPPORT-RING-T67 UNITS=MM

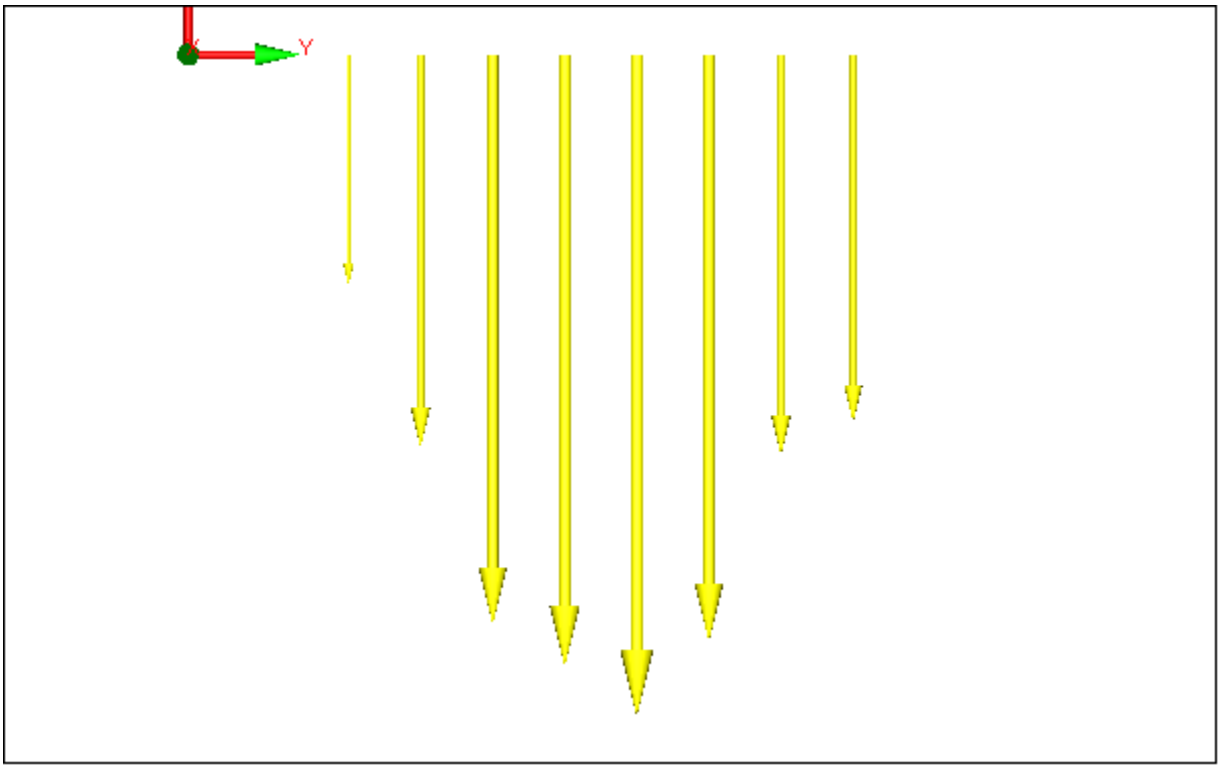
AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.938	-0.938	0.200	0.200	0.738	<--------

DIM LOC Z SUPPORT RING CIRCLES 7= LOCATION OF CIRCLE CR-SUPPORT-RING-T78 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.640	-0.640	0.200	0.200	0.440	<--------

DIM LOC Z SUPPORT RING CIRCLES 8= LOCATION OF CIRCLE CR-SUPPORT-RING-T89 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
Z	0.000	-0.588	-0.588	0.200	0.200	0.388	<--------



PART NUMBER=ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG DATE=12/17/2008 TIME=2
SUPPORT RING CIRCLES IN Z
x1000

SUPPORT RING POINTS IN X

DIM LOC Z SUPPORT RING POINTS 1= LOCATION OF POINT PT-SUPPORT-RING-T12 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.320	-0.820	0.200	0.200	0.620	<--------

DIM LOC Z SUPPORT RING POINTS 2= LOCATION OF POINT PT-SUPPORT-RING-T23 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.811	-1.312	0.200	0.200	1.112	<--------

DIM LOC Z SUPPORT RING POINTS 3= LOCATION OF POINT PT-SUPPORT-RING-T34 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.600	-1.100	0.200	0.200	0.900	<--------

DIM LOC Z SUPPORT RING POINTS 4= LOCATION OF POINT PT-SUPPORT-RING-T45 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.749	-1.249	0.200	0.200	1.049	<--------

DIM LOC Z SUPPORT RING POINTS 5= LOCATION OF POINT PT-SUPPORT-RING-T56 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.378	-0.878	0.200	0.200	0.678	<--------

DIM LOC Z SUPPORT RING POINTS 6= LOCATION OF POINT PT-SUPPORT-RING-T67 UNITS=MM

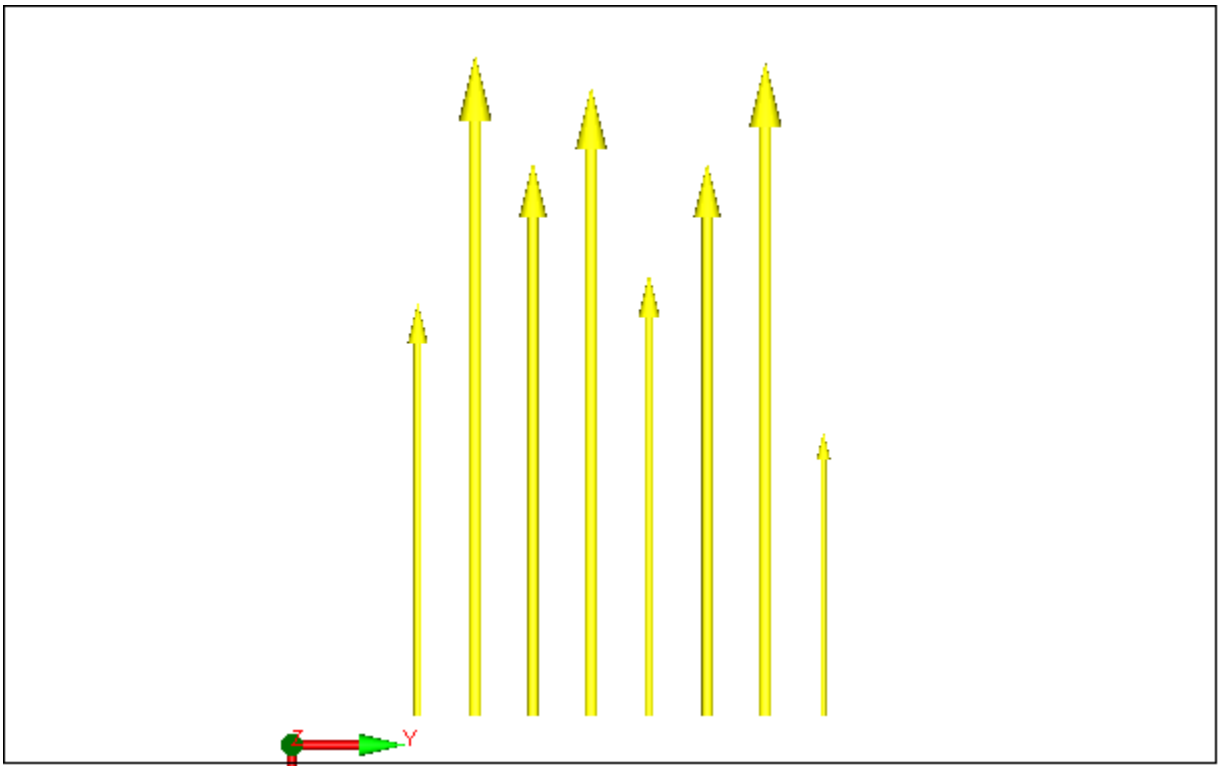
AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.598	-1.098	0.200	0.200	0.898	<--------

DIM LOC Z SUPPORT RING POINTS 7= LOCATION OF POINT PT-SUPPORT-RING-T78 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.798	-1.298	0.200	0.200	1.098	<--------

DIM LOC Z SUPPORT RING POINTS 8= LOCATION OF POINT PT-SUPPORT-RING-T89 UNITS=MM

AX	NOMINAL	MEAS	DEV	+TOL	-TOL	OUTTOL	
X	-56.500	-57.065	-0.566	0.200	0.200	0.366	<--------



SUPPORT RING POINTS IN X
x1000

```
DIM ANGL15= 2D ANGLE (TRUE) FROM LINE LNC-FOR 180 OFFSET TO   ZAXIS
AX   NOMINAL     MEAS        DEV       +TOL       -TOL      OUTTOL
A      15.000     15.015      0.015      0.500      0.500      0.000 ----#----

POINTDATA  HIT#   MEAS X      Y        Z      VEC I      J        K    DEVIATION
LNC-FOR 180 OFFSET
              0    0.150   -0.001    0.484    0.259    0.000    0.966     0.507
AX            0    0.000    0.000    0.000    0.000    0.000    1.000     0.000

(4)  ANGLE I:  0.2593126  -  15.02927818
     ANGLE K:  0.9657934
(9)  ANGLE I:  0.2631146  -  15.25495207
     ANGLE K:  0.9647646
(7)  ANGLE I:  0.2588121  -  14.99958804
     ANGLE K:  0.9659277
(6)  ANGLE I:  0.2439225  -  14.11816578
     ANGLE K:  0.9697947
```

4 distances between vacuum flanges
Starting with Top (+Z), Left (-X), Bottom (-Z), Right (+X)

```
DIM DIST_VAC1= 2D DISTANCE FROM POINT PT_VAC_1_T TO POINT PT_VAC_2_T PAR TO   YAXIS,
             NO_RADIUS  UNITS=MM
AX    MEAS
M     995.237 ----#----
```

```
PART NUMBER=ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG    DATE=12/17/2008     TIME=2
DIM DIST_VAC2= 2D DISTANCE FROM POINT PT_VAC_1_L TO POINT PT_VAC_2_L PAR TO   YAXIS,
            NO RADIUS  UNITS=MM
AX    MEAS
M     996.495 -----#---

DIM DIST VAC3= 2D DISTANCE FROM POINT PT VAC 1 B TO POINT PT VAC 2 B PAR TO   YAXIS,
            NO_RADIUS  UNITS=MM
AX    MEAS
M     996.315 ----#----

DIM DIST_VAC4= 2D DISTANCE FROM POINT PT_VAC_1_R TO POINT PT_VAC_2_R PAR TO   YAXIS,
            NO_RADIUS  UNITS=MM
AX    MEAS
M     994.650 -----#---

                          END OF MEASUREMENT FOR
      PN=ILC AES 1.3GHZ RF CAVITY ASSEMBLY-AES001-000-IR.PRG            DWG=
                   SN=
    TOTAL # OF MEAS =0     # OUT OF TOL =0
```