

# TKS-G21-CV05

## Reliability Prediction Report

### (MTBF)

Summary	Failure Rate: 15.835864 ppm MTBF: 63,148 Hours
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Issue date	Approval	Test Engineer
2012/02/24	Chihorng Liao	Jessica Chou

# Reliability Prediction (MTBF)

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**I . Model Name:** TF-TKS-G21-CV05-001-DX

**II . Prediction Date:** Feb. 24, 2012

**III . Prediction Site:** AAEON Q.E. Dept.

**IV . Predicted by:** Jessica Chou

**V . Equipment:** Relx Ver.7.3 Visual Reliability Software

## VI. Simulation Environment:

- Temperature: 25.1 degrees C
- Standard: Telcordia (Bellcore) Standard

## VII. Term and Definition:

- Unit : An assembly of device.
- Duty Cycle : Used to specify the percentage of time that the element is in an on state, and it is equal to the percentage of total time the item is in the active environment.
- Quantity : The quantity of the selected item.
- Failure Rate : Used to specify that the failure rate is to be calculated based the selected Calculation models. The multiplier is 1,000,000.
- MTBF : MTBF is always specified in hours.

**VIII. Prediction Result:**

TF-TKS-G21-CV05-001-DX:

- Failure Rate: 15.835864ppm
- MTBF: 63,148 Hours

### AAEON Reliability Prediction Report

**Part Number** System  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description** Top-level assembly  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Assembly Name	Part Number	Model	Method	Environment	Duty Cycle	Qty	Failure Rate	MTBF
TF-TKS-G21-CV05-001-DX	System	Telcordia Issue 1	Method I Case 3	GF, GU - Ground Fixed, Uncontrolled	100.00	1.00	15.84	63147.80
ASS'Y GENE-CV05-A10	9697CV050B-D	Telcordia Issue 1	Method I Case 3	GF, GU - Ground Fixed, Uncontrolled		1.00	15.84	63147.80

### AAEON Reliability Prediction Report

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10

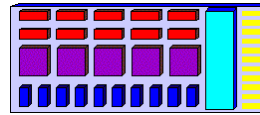


**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate, %	MTBF, Unit
1653924110	Connection	CFD1A	Telcordia Issue 1	Level I		1.00	0.001144	.0072	874201776.95
1214309008	Inductor	CH3,CH4,CH5,CH6	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
165320520G	Connection	CN7	Telcordia Issue 1	Level I		1.00	0.005720	.0361	174840355.39
1653212100	Connection	CN17	Telcordia Issue 1	Level I		1.00	0.006863	.0433	145700296.16
1174522180	Capacitor	CP1,CP10,CP11,CP12, CP13,CP2,CP3,CP4, CP5,CP6,CP7,CP8, CP9	Telcordia Issue 1	Level I		13.00	0.005469	.4490	182842274.63
11E9501091	Capacitor	C1,C109,C116,C118, C138,C140,C141, C188,C189,C197,C20, C211,C212,C213, C214,C215,C216, C217,C234,C246, C254,C258,C259, C265,C266,C267, C271,C272,C278, C280,C282,C29,C305, C308,C309,C311, C312,C320,C323, C326,C327,C328,	Telcordia Issue 1	Level I		63.00	0.004544	1.8079	220055560.52
11E9510050	Capacitor	C146,C147,C169, C170,C2,C23,C237, C243,C361,C362, C364,C368,C4,C407, C419,C447,C452, C454,C475,C57,C70	Telcordia Issue 1	Level I		21.00	0.004544	.6026	220055560.52
11C4401880	Capacitor	C3	Telcordia Issue 1	Level I		1.00	0.004544	.0287	220055560.52
1121501691	Capacitor	C101,C102,C104, C105,C106,C108,C11, C111,C112,C115, C119,C120,C121, C122,C123,C124, C125,C126,C127, C128,C129,C13,C130, C131,C132,C133, C134,C135,C136, C139,C14,C143,C144, C148,C149,C15,C150, C151,C152,C153, C154,C155,C156,	Telcordia Issue 1	Level I		213.00	0.004544	6.1123	220055560.52
11E2522060	Capacitor	C270,C6	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
11E1510050	Capacitor	C177,C226,C235,C27, C9	Telcordia Issue 1	Level I		5.00	0.004544	.1435	220055560.52

**AAEON Reliability Prediction Report**

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate, %	MTBF, Unit
1122701680	Capacitor	C10	Telcordia Issue 1	Level I		1.00	0.004544	.0287	220055560.52
11C2510480	Capacitor	C12,C22,C244,C248, C256,C262	Telcordia Issue 1	Level I		6.00	0.004544	.1722	220055560.52
1124468090	Capacitor	C16,C39	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
1129622690	Capacitor	C103,C17,C299,C353, C43,C44,C77,C80, C81,C84	Telcordia Issue 1	Level I		10.00	0.004544	.2870	220055560.52
11C4522190	Capacitor	C166,C18,C49	Telcordia Issue 1	Level I		3.00	0.004544	.0861	220055560.52
11E1522680	Capacitor	C252,C32	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
1124427091	Capacitor	C167,C168,C190, C192,C193,C194, C387,C40,C42,C463, C464	Telcordia Issue 1	Level I		11.00	0.004544	.3157	220055560.52
11E9610080	Capacitor	C157,C219,C249, C261,C279,C281, C293,C295,C300, C333,C336,C352, C356,C366,C369, C375,C376,C397, C399,C400,C434, C443,C45,C457,C460, C481,C54,C67,C68, C76,C78,C83,C88, C90	Telcordia Issue 1	Level I		34.00	0.004544	.9757	220055560.52
1129701791	Capacitor	C110,C114,C163, C184,C185,C198, C200,C232,C238, C239,C241,C242,C52, C58,C59,C60,C61	Telcordia Issue 1	Level I		17.00	0.004544	.4878	220055560.52
1124418090	Capacitor	C92,C97	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
11E9622050	Capacitor	C315,C319,C322, C325,C346,C401, C403,C416,C420, C468,C94	Telcordia Issue 1	Level I		11.00	0.004544	.3157	220055560.52
11C2501790	Capacitor	C137,C98	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
11C4547290	Capacitor	C100,C142	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
11E9647680	Capacitor	C107,C307,C318, C358,C405,C406	Telcordia Issue 1	Level I		6.00	0.004544	.1722	220055560.52
1124410191	Capacitor	C113,C225,C472, C473,C482,C483, C484	Telcordia Issue 1	Level I		7.00	0.004544	.2009	220055560.52
11C2539290	Capacitor	C117	Telcordia Issue 1	Level I		1.00	0.004544	.0287	220055560.52
1129710391	Capacitor	C159,C182,C209, C453,C474	Telcordia Issue 1	Level I		5.00	0.004544	.1435	220055560.52
1124547190	Capacitor	C171,C172,C174, C201,C202,C203, C204,C205,C206, C274,C321,C448, C458	Telcordia Issue 1	Level I		13.00	0.004544	.3731	220055560.52

### AAEON Reliability Prediction Report

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate, %	MTBF, Unit
11C1547890	Capacitor	C175,C183	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
1122522890	Capacitor	C191,C410,C411, C427	Telcordia Issue 1	Level I		4.00	0.004544	.1148	220055560.52
1129522790	Capacitor	C218,C221,C222	Telcordia Issue 1	Level I		3.00	0.004544	.0861	220055560.52
11C4547760	Capacitor	C231	Telcordia Issue 1	Level I		1.00	0.004544	.0287	220055560.52
1124510280	Capacitor	C247,C269	Telcordia Issue 1	Level I		2.00	0.004544	.0574	220055560.52
11C9501050	Capacitor	C257	Telcordia Issue 1	Level I		1.00	0.004544	.0287	220055560.52
1129710091	Capacitor	C276,C277,C445, C465,C466,C467	Telcordia Issue 1	Level I		6.00	0.004544	.1722	220055560.52
11E9722090	Capacitor	C424,C438,C469, C470,C471	Telcordia Issue 1	Level I		5.00	0.004544	.1435	220055560.52
16515A099S	Connection	DI1MM1	Telcordia Issue 1	Level I		1.00	0.001144	.0072	874201776.95
1301005444	Semiconductor	D1,D16,D4,D5	Telcordia Issue 1	Level I		4.00	0.023950	.6049	41754194.40
1304101340	Semiconductor	D2	Telcordia Issue 1	Level I		1.00	0.004921	.0311	203197151.95
1304001340	Semiconductor	D3	Telcordia Issue 1	Level I		1.00	0.004921	.0311	203197151.95
1304300140	Semiconductor	D7	Telcordia Issue 1	Level I		1.00	0.004921	.0311	203197151.95
1301005442	Semiconductor	D18,D28,D8	Telcordia Issue 1	Level I		3.00	0.023950	.4537	41754194.40
1305080040	Semiconductor	D13,D17,D19,D20, D21,D22,D23,D24, D25,D26,D27,D29, D30,D31,D32,D33, D34,D37,D38,D39, D44,D49,D50,D51, D52,D53,D54,D55	Telcordia Issue 1	Level I		28.00	0.023950	4.2346	41754194.40
1301053040	Semiconductor	D14	Telcordia Issue 1	Level I		1.00	0.023950	.1512	41754194.40
1305099140	Semiconductor	D35,D36	Telcordia Issue 1	Level I		2.00	0.079832	1.0082	12526258.32
1301005441	Semiconductor	D41	Telcordia Issue 1	Level I		1.00	0.027266	.1722	36675926.75
1301005443	Semiconductor	D48	Telcordia Issue 1	Level I		1.00	0.027266	.1722	36675926.75
1212306030	Resistor	FB1,FB10,FB12,FB13, FB14,FB15,FB16, FB17,FB18,FB19,FB2, FB20,FB21,FB22, FB23,FB29,FB3,FB30, FB4,FB6,FB9	Telcordia Issue 1	Level I		21.00	0.011439	1.5169	87420177.69
1212306031	Inductor	FB5	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1212306035	Inductor	FB11,FB25,FB26, FB27,FB28,FB31, FB32,FB33,FB34, FB35,FB37,FB38, FB39,FB7,FB8	Telcordia Issue 1	Level I		15.00	0.002272	.2152	440111121.05
1212308054	Resistor	FB24,FB36	Telcordia Issue 1	Level I		2.00	0.011439	.1445	87420177.69
1752001601	Miscellaneous	FS3	Telcordia Issue 1	Level I		1.00	0.003000	.0189	33333333.33
1752000501	Miscellaneous	FS2	Telcordia Issue 1	Level I		1.00	0.003000	.0189	33333333.33

### AAEON Reliability Prediction Report

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate,%	MTBF, Unit
121110156K	Inductor	L1,L3,L4,L5	Telcordia Issue 1	Level I		4.00	0.086342	2.1809	11581871.61
121110336Y	Inductor	L2	Telcordia Issue 1	Level I		1.00	0.086342	.5452	11581871.61
121110226K	Inductor	L6	Telcordia Issue 1	Level I		1.00	0.086342	.5452	11581871.61
121110106M	Inductor	L7	Telcordia Issue 1	Level I		1.00	0.086342	.5452	11581871.61
1211100113	Inductor	L10,L12,L8	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
1211100160	Inductor	L14	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
121110476Q	Inductor	L15,L16	Telcordia Issue 1	Level I		2.00	0.086342	1.0905	11581871.61
1654226303	Connection	PCIE1A	Telcordia Issue 1	Level I		1.00	0.001144	.0072	874201776.95
1654926900	Connection	PCIE1B	Telcordia Issue 1	Level I		1.00	0.029741	.1878	33623145.27
1315700216	Semiconductor	Q1,Q10,Q11,Q14,Q15, Q22,Q23,Q25,Q30, Q31,Q32,Q33,Q35, Q37,Q39,Q4,Q40,Q41, Q42,Q44,Q45,Q48,Q5, Q6,Q8	Telcordia Issue 1	Level I		25.00	0.079832	12.6031	12526258.32
1315030110	Semiconductor	Q3,Q7	Telcordia Issue 1	Level I		2.00	0.000000	.0000	.00
1315762010	Semiconductor	Q12,Q9	Telcordia Issue 1	Level I		2.00	0.000000	.0000	.00
1315230410	Semiconductor	Q13	Telcordia Issue 1	Level I		1.00	0.159665	1.0082	6263129.16
1311390612	Semiconductor	Q16,Q21,Q43	Telcordia Issue 1	Level I		3.00	0.023950	.4537	41754194.40
1310390413	Semiconductor	Q17,Q18,Q19,Q20, Q34,Q36,Q38,Q46	Telcordia Issue 1	Level I		8.00	0.023950	1.2099	41754194.40
1315013810	Semiconductor	Q24,Q26	Telcordia Issue 1	Level I		2.00	0.079832	1.0082	12526258.32
1315700212	Semiconductor	Q27,Q28,Q29	Telcordia Issue 1	Level I		3.00	0.079832	1.5124	12526258.32
1540710280	Resistor	RP1,RP2	Telcordia Issue 1	Level I		2.00	0.006275	.0792	159372657.61
1540782282	Resistor	RP3	Telcordia Issue 1	Level I		1.00	0.012549	.0792	79686328.81
1540733085	Resistor	RP4,RP5,RP6	Telcordia Issue 1	Level I		3.00	0.006275	.1189	159372657.61
106B501032	Resistor	RT2,RT3,RT4,RT5	Telcordia Issue 1	Level I		4.00	0.011439	.2889	87420177.69
105A733009	Resistor	R1,R198,R2,R298,R3, R4	Telcordia Issue 1	Level I		6.00	0.002272	.0861	440111121.05
105A704729	Resistor	R16,R178,R195,R203, R247,R282,R288, R299,R300,R312,R33, R357,R394,R397, R414,R421,R442, R448,R5,R50,R503, R520,R523,R566, R589,R593,R594, R600,R605,R611, R631,R9,R97	Telcordia Issue 1	Level I		33.00	0.002272	.4735	440111121.05







**AAEON Reliability Prediction Report**

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate,%	MTBF, Unit
105A705139	Resistor	R121,R28,R401,R402, R403,R464,R465, R466,R479,R482,R49, R504,R505,R511, R512,R517,R518, R519,R522,R569	Telcordia Issue 1	Level I		20.00	0.002272	.2870	440111121.05
1050702734	Resistor	R30	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A560423	Resistor	R32	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A502039	Resistor	R34,R362,R393	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
1050504764	Resistor	R108,R36	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
1050547004	Resistor	R331,R333,R37,R540, R543	Telcordia Issue 1	Level I		5.00	0.002272	.0717	440111121.05
105A561933	Resistor	R39	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A739039	Resistor	R40	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A708229	Resistor	R106,R117,R177, R179,R327,R429, R430,R431,R432, R433,R434,R435, R440,R458,R467,R52, R55,R56,R57,R58, R59,R60,R61,R62, R63,R64,R65,R66, R67,R68	Telcordia Issue 1	Level I		30.00	0.002272	.4304	440111121.05
105A512039	Resistor	R69	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A704739	Resistor	R72	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A500239	Resistor	R73	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050513034	Resistor	R124,R444,R77	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
105A500139	Resistor	R173,R182,R234, R237,R398,R422,R87, R95	Telcordia Issue 1	Level I		8.00	0.002272	.1148	440111121.05
1050524904	Resistor	R201,R89	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A522669	Resistor	R101,R205	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A703329	Resistor	R102,R549	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
1050561934	Resistor	R107	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050590964	Resistor	R111,R118,R172, R174	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
105A704763	Resistor	R115,R439	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A551119	Resistor	R122	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A501529	Resistor	R125	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A505629	Resistor	R135,R21,R416,R438, R463	Telcordia Issue 1	Level I		5.00	0.002272	.0717	440111121.05
105A505109	Resistor	R142,R163,R167, R171,R181,R186	Telcordia Issue 1	Level I		6.00	0.002272	.0861	440111121.05
105A561924	Resistor	R156	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05

### AAEON Reliability Prediction Report

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate, %	MTBF, Unit
1050502204	Resistor	R158,R161	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A560469	Resistor	R162,R190	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A533269	Resistor	R193	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A527403	Resistor	R199	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A507509	Resistor	R206,R386,R387, R388	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
1050507524	Resistor	R214,R276	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A568103	Resistor	R216	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A515009	Resistor	R220,R223,R226, R635,R636,R637	Telcordia Issue 1	Level I		6.00	0.002272	.0861	440111121.05
1050501004	Resistor	R221,R415,R436, R548	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
105A523713	Resistor	R230	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A703363	Resistor	R236	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A528723	Resistor	R238	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1059700001	Resistor	R241,R318,R325	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
1050507530	Resistor	R244,R267	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A706829	Resistor	R245,R248,R252, R281,R285,R531, R601,R606,R612	Telcordia Issue 1	Level I		9.00	0.002272	.1291	440111121.05
1050512104	Resistor	R254	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050505124	Resistor	R259,R360,R446	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
105A573223	Resistor	R273	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A501233	Resistor	R278,R575	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A501539	Resistor	R294,R296,R585	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
1050514034	Resistor	R328,R613,R614, R624	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
105A524919	Resistor	R345,R346	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A722009	Resistor	R350,R351,R366, R367	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
105A540213	Resistor	R355	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A505163	Resistor	R356	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A702263	Resistor	R373,R449,R483	Telcordia Issue 1	Level I		3.00	0.002272	.0430	440111121.05
105A703909	Resistor	R382,R383	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A561909	Resistor	R405	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A571523	Resistor	R406	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1059710003	Resistor	R418,R419	Telcordia Issue 1	Level I		2.00	0.002272	.0287	440111121.05
105A501413	Resistor	R423	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050505633	Resistor	R424	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050501834	Resistor	R443	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050522114	Resistor	R453	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05

### AAEON Reliability Prediction Report

**Part Number** 9697CV050B-D  
**Reference Des**  
**Date** 02. 24, 2012  
**Environment** GF, GU - Ground Fixed, Uncontrolled  
**Temp. (°C)** 25.10



**Description**  
**File Name** TF-TKS-G21-CV05-001-DX.RPJ  
**Time** 10:37  
**Failure Rate** 15.835864  
**MTBF** 63,148

Part Number	Category	Location	Calculation Model	Quality	Tem. Rise	Quantity	Failure Rate, Unit	Failure Rate, %	MTBF, Unit
1050703334	Resistor	R460	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A747039	Resistor	R492	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
105A701069	Resistor	R499	Telcordia Issue 1	Level I		1.00	0.013633	.0861	73351853.51
105A549969	Resistor	R196,R207,R509, R510	Telcordia Issue 1	Level I		4.00	0.002272	.0574	440111121.05
105A503039	Resistor	R527	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1050700002	Resistor	R592	Telcordia Issue 1	Level I		1.00	0.002272	.0143	440111121.05
1189633193	Capacitor	TC1,TC11,TC3,TC6, TC8	Telcordia Issue 1	Level I		5.00	0.004544	.1435	220055560.52
1189633160	Capacitor	TC17,TC2,TC4,TC5	Telcordia Issue 1	Level I		4.00	0.004544	.1148	220055560.52
1189615151	Capacitor	TC15,TC18,TC19,TC7	Telcordia Issue 1	Level I		4.00	0.004544	.1148	220055560.52
1189627150	Capacitor	TC10,TC14,TC16,TC9	Telcordia Issue 1	Level I		4.00	0.004544	.1148	220055560.52
1182622080	Capacitor	TC13	Telcordia Issue 1	Level I		1.00	0.004544	.0287	220055560.52
14S5A00821	Integrated Circuit	U1,U46,U50,U6	Telcordia Issue 1	Level I		4.00	0.026337	.6652	37969565.62
14S4021301	Integrated Circuit	U11,U14,U18,U2,U23, U71	Telcordia Issue 1	Level I		6.00	0.059802	2.2658	16721916.86
1315667910	Semiconductor	U3	Telcordia Issue 1	Level I		1.00	0.159665	1.0082	6263129.16
1315970211	Semiconductor	U15,U64	Telcordia Issue 1	Level I		2.00	0.159665	2.0165	6263129.16
14S4001000	Integrated Circuit	U7	Telcordia Issue 1	Level I	41.10	1.00	0.219838	1.3882	4548802.01
1315482110	Semiconductor	U36,U8,U9	Telcordia Issue 1	Level I		3.00	0.079832	1.5124	12526258.32
14S2321900	Semiconductor	U10	Telcordia Issue 1	Level I		1.00	0.000000	.0000	.00
14S5A73200	Integrated Circuit	U12	Telcordia Issue 1	Level I		1.00	0.026337	.1663	37969565.62
14S3050100	Integrated Circuit	U13	Telcordia Issue 1	Level I	50.80	1.00	1.428127	9.0183	700218.04
14S4213000	Integrated Circuit	U17	Telcordia Issue 1	Level I	26.10	1.00	0.107858	.6811	9271469.28
1315446310	Semiconductor	U19,U43,U47,U48	Telcordia Issue 1	Level I		4.00	0.079832	2.0165	12526258.32
14S2362400	Integrated Circuit	U20	Telcordia Issue 1	Level I		1.00	0.059802	.3776	16721916.86
14S4878300	Integrated Circuit	U21	Telcordia Issue 1	Level I		1.00	0.026337	.1663	37969565.62
14S3112400	Integrated Circuit	U22	Telcordia Issue 1	Level I		1.00	0.059802	.3776	16721916.86
14S5A00601	Integrated Circuit	U24	Telcordia Issue 1	Level I		1.00	0.026337	.1663	37969565.62
14S5A12506	Integrated Circuit	U26	Telcordia Issue 1	Level I		1.00	0.026337	.1663	37969565.62
14S5A12503	Integrated Circuit	U27	Telcordia Issue 1	Level I		1.00	0.059802	.3776	16721916.86
1315422410	Semiconductor	U28,U55,U60	Telcordia Issue 1	Level I		3.00	0.079832	1.5124	12526258.32
14S4811102	Integrated Circuit	U32,U33	Telcordia Issue 1	Level I		2.00	0.026337	.3326	37969565.62
1315482410	Semiconductor	U39	Telcordia Issue 1	Level I		1.00	0.079832	.5041	12526258.32
14S3111600	Integrated Circuit	U40	Telcordia Issue 1	Level I		1.00	0.032235	.2036	31022419.16
14S2200900	Integrated Circuit	U41	Telcordia Issue 1	Level I		1.00	0.059802	.3776	16721916.86
14S3066200	Integrated Circuit	U42	Telcordia Issue 1	Level I	31.40	1.00	0.477148	3.0131	2095785.07
14S4751100	Integrated Circuit	U44	Telcordia Issue 1	Level I		1.00	0.026337	.1663	37969565.62
14S4081110	Integrated Circuit	U49	Telcordia Issue 1	Level I		1.00	0.059802	.3776	16721916.86

