Sample Information File C:\AAUSER\SAMPINFO\011802TI.SIF

DATE ANALYZED 1/31/02
TIME ANALYZED 11:00
ANALYST INITIALS MW
REVIEWED BY

Description : Ti Pot ~~1/10/01~~ 1/31/02
Batch ID :
Volume Units :
Weight Units :
Analyst :
Sample Volume : 0.00

AS Loc	Sample ID	Sample Weight	Sample Units	User Dilution	Remarks
1	qcs				
2	ipc				
3	cb				
4	lfb				
5	lrb				
6	27768				
7	27768dup				
8	27769				
9	27770				
10	27771				
11	27772				
12	27773				
13	27774				
14	27775				
15	27817				
16	27818				
17	27819				
18	27823				
19	27826				
20	27828				
21	27831				
22	27872				
23	27873				
24	27874				
25	27951				
26	27952				
27	27952dup				
28	27953				
29	27954				
30	27955				
31	27956				
32	27957				
33	27984				
34	27985				
35	27986				
36	28043				
37	28044				
38	28045				
39	28046				
40	28047				
41	28048				
42	28049				
43	28104				
44	28105				
45	28106				
46	28164				
47	28165				
48	28165dup				

49 28166
50 28167
51 28168
52 28169
53 28170
54 28171
55 28172
86 Zero Calibrator

Method Name: TiHGA
Method Description: Tihga SM3113 B
Element: Ti

Date: 01/31/2002
Technique:Furnace
Calibration Type:
Ti, Calc. Intercept : Linear
Wavelength: 364.3 nm
Energy: 100
Slit Width: 0.2
Lamp Current: 40 mA
Sample Info Name: 011802TI.SIF Results Data Set Name:

Element: Ti Seq. No.: 1 AS Loc.: 86 Date: 01/31/2002
Sample ID: Calib Blank
µL dispensed: 10 from 86, 20 from 86

Repl #	SampleConc	StndConc	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1			0.0073	0.0073	0.0030	0.0031	0.0035	11:09:58	No

Auto-zero performed.

Element: Ti Seq. No.: 2 AS Loc.: 88 Date: 01/31/2002
Sample ID: S25
µL dispensed: 25 from 86, 5 from 88

Repl #	SampleConc	StndConc	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1			0.0213	0.0285	0.0189	0.0045	0.0045	11:13:42	No

[Ti] Standard number 1 applied. [25.0]
Correlation Coefficient: 1.00000 Slope: 0.00085
Intercept : 0.00000

Element: Ti Seq. No.: 3 AS Loc.: 88 Date: 01/31/2002
Sample ID: S50
µL dispensed: 20 from 86, 10 from 88

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1			0.0448	0.0520	0.0356	0.0051	0.0047	11:17:27	No

[Ti] Standard number 2 applied. [50.0]
Correlation Coefficient: 0.99957 Slope: 0.00090
Intercept : -0.00038

Element: Ti Seq. No.: 4 AS Loc.: 88 Date: 01/31/2002
Sample ID: S75
µL dispensed: 15 from 86, 15 from 88

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1			0.0677	0.0750	0.0525	0.0061	0.0061	11:21:12	No

[Ti] Standard number 3 applied. [75.0]
Correlation Coefficient: 0.99978 Slope: 0.00091
Intercept : -0.00057

Element: Ti Seq. No.: 5 AS Loc.: 88 Date: 01/31/2002
Sample ID: S100
µL dispensed: 10 from 86, 20 from 88

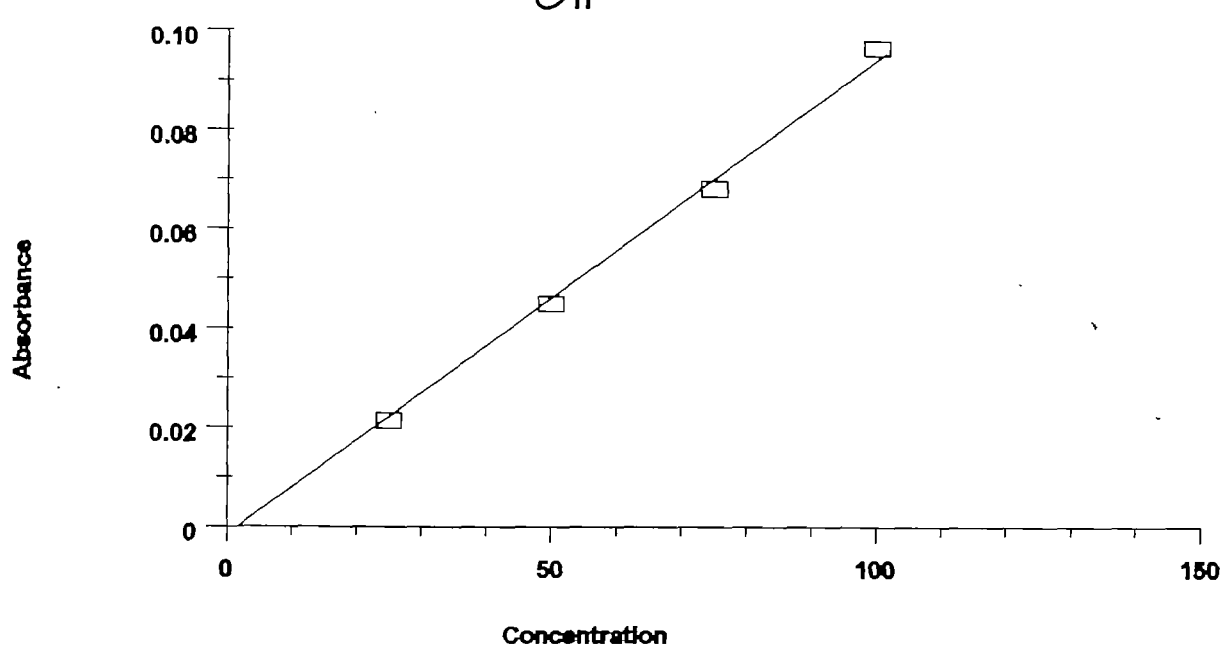
Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1			0.0960	0.1033	0.0734	0.0064	0.0064	11:24:58	No

[Ti] Standard number 4 applied. [100.]
Correlation Coefficient: 0.99868 Slope: 0.00095
Intercept : -0.00175

Calibration data for Ti

Standard ID	Mean Signal (Pk Area)	Entered Concentration (µg/L)	Calculated Concentration (µg/L)	Standard Deviation	%RSD
Calib Blank	0.0073	--	----	----	----
S25	0.0213	25.00	24.1	----	-1.00
S50	0.0448	50.00	48.8	----	-1.00
S75	0.0677	75.00	72.8	----	-1.00
S100	0.0960	100.00	102.	----	-1.00

Correlation Coefficient: 0.99868 Slope: 0.00095 Intercept: -0.0017



Element: Ti Seq. No.: 6 AS Loc.: 1 Date: 01/31/2002
Sample ID: QCS
µL dispensed: 10 from 86, 20 from 1

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	51.3	51.3	0.0472	0.0544	0.0364	0.0055	0.0049	11:43:47	No

QC value within specified limits.

Element: Ti Seq. No.: 7 AS Loc.: 2 Date: 01/31/2002
Sample ID: IPC
µL dispensed: 10 from 86, 20 from 2

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	45.8	45.8	0.0420	0.0492	0.0338	0.0055	0.0052	11:47:31	No

QC value within specified limits.

Element: Ti Seq. No.: 8 AS Loc.: 3 Date: 01/31/2002
Sample ID: CB
µL dispensed: 10 from 86, 20 from 3

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	1.38	1.38	-0.0004	0.0068	0.0027	0.0033	0.0037	11:51:15	No

QC value within specified limits.

Element: Ti Seq. No.: 9 AS Loc.: 4 Date: 01/31/2002
Sample ID: LFB
µL dispensed: 10 from 86, 20 from 4

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	97.1	97.1	0.0909	0.0982	0.0714	0.0069	0.0062	11:54:58	No

QC value within specified limits.

Element: Ti Seq. No.: 10 AS Loc.: 5 Date: 01/31/2002
Sample ID: LRB
µL dispensed: 10 from 86, 20 from 5

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	1.90	1.90	0.0001	0.0073	0.0031	0.0041	0.0046	11:58:43	No

QC value within specified limits.

Method Name: TiHGA
Method Description: Tihga SM3113 B
Element: Ti

Date: 01/31/2002
Technique:Furnace
Calibration Type:
Ti, Calc. Intercept : Linear
Wavelength: 364.3 nm
Energy: 100
Slit Width: 0.2
Lamp Current: 40 mA
Sample Info Name: 011802TI.SIF Results Data Set Name:

Element: Ti Seq. No.: 11 AS Loc.: 6 Date: 01/31/2002
Sample ID: 27768
µL dispensed: 10 from 86, 20 from 6

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-0.39	-0.39	-0.0021	0.0052	0.0023	0.0058	0.0116	12:03:32	No

Element: Ti Seq. No.: 12 AS Loc.: 6 Date: 01/31/2002
Sample ID: 27768
µL dispensed: 5 from 86, 5 from 88, 20 from 6

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	16.1	16.1	0.0136	0.0209	0.0132	0.0050	0.0054	12:07:22	No

Recovery for Ti = 64.3 %, less than lower limit of 85 %

Element: Ti Seq. No.: 13 AS Loc.: 6 Date: 01/31/2002
Sample ID: 27768
µL dispensed: 25 from 86, 5 from 6

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.18	-0.55	-0.0023	0.0050	0.0022	0.0031	0.0041	12:11:05	No

Element: Ti Seq. No.: 14 AS Loc.: 6 Date: 01/31/2002
Sample ID: 27768
µL dispensed: 20 from 86, 5 from 88, 5 from 6

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	59.3	14.8	0.0124	0.0197	0.0126	0.0043	0.0047	12:14:54	No

Recovery for Ti = 59.3 %, less than lower limit of 85 %

Element: Ti Seq. No.: 15 AS Loc.: 7 Date: 01/31/2002
Sample ID: 27768dup
µL dispensed: 10 from 86, 20 from 7

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-0.88	-0.88	-0.0026	0.0047	0.0024	0.0042	0.0046	12:18:37	No

Element: Ti Seq. No.: 16 AS Loc.: 7 Date: 01/31/2002
Sample ID: 27768dup
µL dispensed: 5 from 86, 5 from 88, 20 from 7

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	13.7	13.7	0.0113	0.0186	0.0117	0.0044	0.0050	12:22:27	No

Recovery for Ti = 54.9 %, less than lower limit of 85 %

Element: Ti Seq. No.: 17 AS Loc.: 7 Date: 01/31/2002
Sample ID: 27768dup
µL dispensed: 25 from 86, 5 from 7

Repl	SampleConc	StndConc	BlnkCorr	Peak	Peak	Bkgnd	Bkgnd	Time	Peak

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-7.15	-1.79	-0.0035	0.0038	0.0020	0.0037	0.0048	12:26:09	No

Element: Ti Seq. No.: 18 AS Loc.: 7 Date: 01/31/2002
Sample ID: 27768dup
µL dispensed: 20 from 86, 5 from 88, 5 from 7

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	53.3	13.3	0.0110	0.0182	0.0120	0.0045	0.0053	12:29:58	No

Recovery for Ti = 53.3 %, less than lower limit of 85 %

Element: Ti Seq. No.: 19 AS Loc.: 8 Date: 01/31/2002
Sample ID: 27769
µL dispensed: 10 from 86, 20 from 8

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-0.97	-0.97	-0.0027	0.0046	0.0021	0.0052	0.0056	12:33:42	No

Element: Ti Seq. No.: 20 AS Loc.: 9 Date: 01/31/2002
Sample ID: 27770
µL dispensed: 10 from 86, 20 from 9

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-1.65	-1.65	-0.0033	0.0040	0.0020	0.0040	0.0045	12:37:24	No

Element: Ti Seq. No.: 21 AS Loc.: 10 Date: 01/31/2002
Sample ID: 27771
µL dispensed: 10 from 86, 20 from 10

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-0.77	-0.77	-0.0025	0.0048	0.0022	0.0046	0.0054	12:41:08	No

Element: Ti Seq. No.: 22 AS Loc.: 11 Date: 01/31/2002
Sample ID: 27772
µL dispensed: 10 from 86, 20 from 11

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.23	-2.23	-0.0039	0.0034	0.0021	0.0043	0.0047	12:44:52	No

Element: Ti Seq. No.: 23 AS Loc.: 12 Date: 01/31/2002
Sample ID: 27773
µL dispensed: 10 from 86, 20 from 12

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.31	-2.31	-0.0040	0.0033	0.0017	0.0033	0.0047	12:48:34	No

Method Name: TiHGA
Method Description: Tihga SM3113 B
Element: Ti

Date: 01/31/2002

Technique:Furnace
Calibration Type:
Ti, Calc. Intercept : Linear
Wavelength: 364.3 nm
Energy: 100
Slit Width: 0.2
Lamp Current: 40 mA
Sample Info Name: 011802TI.SIF Results Data Set Name:

Element: Ti Seq. No.: 24 AS Loc.: 2 Date: 01/31/2002
Sample ID: IPC
µL dispensed: 10 from 86, 20 from 2

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	38.8	38.8	0.0353	0.0426	0.0308	0.0048	0.0050	12:54:29	No

QC failed, value less than lower limit for Ti.

Element: Ti Seq. No.: 25 AS Loc.: 2 Date: 01/31/2002
Sample ID: IPC
µL dispensed: 10 from 86, 20 from 2

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	45.1	45.1	0.0413	0.0485	0.0352	0.0052	0.0054	12:58:12	No

QC value within specified limits.

Element: Ti Seq. No.: 26 AS Loc.: 3 Date: 01/31/2002
Sample ID: CB
µL dispensed: 10 from 86, 20 from 3

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-1.66	-1.66	-0.0033	0.0039	0.0020	0.0039	0.0048	01:01:55	No

QC value within specified limits.

Element: Ti Seq. No.: 27 AS Loc.: 13 Date: 01/31/2002
Sample ID: 27774
µL dispensed: 10 from 86, 20 from 13

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-1.85	-1.85	-0.0035	0.0038	0.0022	0.0043	0.0047	01:05:37	No

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Element: Ti Seq. No.: 28 AS Loc.: 14 Date: 01/31/2002
Sample ID: 27775
µL dispensed: 10 from 86, 20 from 14

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-1.78	-1.78	-0.0034	0.0038	0.0018	0.0050	0.0062	01:09:20	No

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Element: Ti Seq. No.: 29 AS Loc.: 15 Date: 01/31/2002
Sample ID: 27817
µL dispensed: 10 from 86, 20 from 15

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.41	-2.41	-0.0041	0.0032	0.0017	0.0037	0.0057	01:13:03	No

Element: Ti Seq. No.: 30 AS Loc.: 16 Date: 01/31/2002
Sample ID: 27818
µL dispensed: 10 from 86, 20 from 16

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.46	-2.46	-0.0041	0.0032	0.0017	0.0032	0.0044	01:16:46	No

Element: Ti Seq. No.: 31 AS Loc.: 16 Date: 01/31/2002
Sample ID: 27818
µL dispensed: 10 from 88, 20 from 16

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	20.3	20.3	0.0176	0.0249	0.0172	0.0039	0.0058	01:20:30	No

Recovery for Ti = 40.6 %, less than lower limit of 85 %

Element: Ti Seq. No.: 32 AS Loc.: 16 Date: 01/31/2002
Sample ID: 27818
µL dispensed: 25 from 86, 5 from 16

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-9.10	-2.28	-0.0039	0.0034	0.0018	0.0033	0.0041	01:24:12	No

Element: Ti Seq. No.: 33 AS Loc.: 16 Date: 01/31/2002
Sample ID: 27818
µL dispensed: 15 from 86, 10 from 88, 5 from 16

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	85.9	21.5	0.0187	0.0260	0.0188	0.0052	0.0052	01:28:04	No

Recovery for Ti = 43.0 %, less than lower limit of 85 %

Element: Ti Seq. No.: 34 AS Loc.: 17 Date: 01/31/2002
Sample ID: 27819
µL dispensed: 10 from 86, 20 from 17

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.04	-2.04	-0.0037	0.0036	0.0017	0.0027	0.0054	01:31:49	No

Element: Ti Seq. No.: 35 AS Loc.: 18 Date: 01/31/2002
Sample ID: 27823
µL dispensed: 10 from 86, 20 from 18

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-3.00	-3.00	-0.0046	0.0027	0.0015	0.0030	0.0064	01:35:32	No

Element: Ti Seq. No.: 36 AS Loc.: 19 Date: 01/31/2002
Sample ID: 27826

µL dispensed: 10 from 86, 20 from 19

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.47	-2.47	-0.0041	0.0032	0.0016	0.0037	0.0064	01:39:16	No

Element: Ti Seq. No.: 37 AS Loc.: 20 Date: 01/31/2002
Sample ID: 27828
µL dispensed: 10 from 86, 20 from 20

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-3.32	-3.32	-0.0049	0.0024	0.0016	0.0040	0.0057	01:43:01	No

Element: Ti Seq. No.: 38 AS Loc.: 21 Date: 01/31/2002
Sample ID: 27831
µL dispensed: 10 from 86, 20 from 21

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-3.18	-3.18	-0.0048	0.0025	0.0021	0.0032	0.0051	01:46:44	No

Element: Ti Seq. No.: 39 AS Loc.: 22 Date: 01/31/2002
Sample ID: 27872
µL dispensed: 10 from 86, 20 from 22

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-3.39	-3.39	-0.0050	0.0023	0.0018	0.0036	0.0047	01:50:27	No

Element: Ti Seq. No.: 40 AS Loc.: 2 Date: 01/31/2002
Sample ID: IPC
µL dispensed: 10 from 86, 20 from 2

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	37.8	37.8	0.0343	0.0415	0.0304	0.0050	0.0050	01:54:11	No

QC failed, value less than lower limit for Ti.

Element: Ti Seq. No.: 41 AS Loc.: 2 Date: 01/31/2002
Sample ID: IPC
µL dispensed: 10 from 86, 20 from 2

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	39.4	39.4	0.0358	0.0431	0.0313	0.0049	0.0053	01:57:54	No

QC failed, value less than lower limit for Ti.
Current analysis method being continued.

Element: Ti Seq. No.: 42 AS Loc.: 3 Date: 01/31/2002
Sample ID: CB
µL dispensed: 10 from 86, 20 from 3

Repl #	SampleConc µg/L	StndConc µg/L	BlnkCorr Signal	Peak Area	Peak Height	Bkgnd Area	Bkgnd Height	Time	Peak Stored
1	-2.22	-2.22	-0.0039	0.0034	0.0020	0.0039	0.0058	02:01:37	No

QC value within specified limits.