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SAFETY REVIEW REPORT (SRR)

TITLE: FINAL RADIOLOGICAL SURVEY REPORT OF BUILDING 023

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CONTENTS

	Page
1.0 Introduction	8
2.0 Summary and Conclusions	9
3.0 Background	10
3.1 Location	10
3.2 Topography and Building Characteristics	10
3.3 Operating History	17
3.4 Decommissioning and Demolition Efforts	18
4.0 Survey Results	20
4.1 Overview	20
4.2 Scope of the Survey	20
4.3 Survey Methods	21
4.4 Technical Approach	23
4.5 Sample Lot Analyses and Results	28
Appendices	
A Building 023 Sample Lots 1 through 3 Final Survey Data	50
B Building 023 Sample Lots 1 through 3 Final Survey Results	64

FIGURES

	Page
1. Location of SSFL in Relation to Los Angeles and Vicinity	11
2. Map of Neighboring SSFL Communities	12
3. Santa Susana Field Laboratory (SSFL) Area IV	13
4. Building 023 Plan View	14
5. Detailed Drawing of the Radioactive Liquid Holdup Tank Location on Building East Side	15
6. Building 023 Sample Lot Identification	16
7. Typical Room or Area 3-Meter by 3-Meter Grid Markings	22
8. Example of Sample Lot Acceptance Where $TS (= \bar{x} + ks) \leq UL$	29
9. Example of Sample Lot Requiring Additional Measurements Where $TS (= \bar{x} + ks) > UL$ and $\bar{x} < UL$	29
10. Example of Sample Lot Rejection Where $TS (= \bar{x} + ks) > UL$ and $\bar{x} > UL$	30
11. Gamma Exposure Rate Measured in Building 038	32
12. T023 - Lot 1 Total Beta Activity	33
13. T023 - Lot 1 Removable Beta Activity	34
14. T023 - Lot 1 Removable Alpha Activity	35
15. T023 - Lot 1 Floors Ambient Gamma Exposure Rate	36
16. T023 - Lot 2 Total Beta Activity	39
17. T023 - Lot 2 Removable Beta Activity	40
18. T023 - Lot 2 Removable Alpha Activity	41
19. T023 - Lot 2 Floors Ambient Gamma Exposure Rate	42

FIGURES

	Page
20. T023 - Lot 3 Total Beta Activity	45
21. T023 Lot 3 Removable Beta Activity	46
22. T023 - Lot 3 Removable Alpha Activity	47
23. T023 - Floors Ambient Gamma Exposure Rate	48

TABLES

	Page
1. Sample Lots Surveyed	20
2. Building 023 Contamination Limit Criteria	25
3. Observed Detection Limits versus Established Limit Criteria	25
4. Sample Lot 1 Results	31
5. Sample Lot 2 Results	38
6. Sample Lot 3 Results	44

ABSTRACT

A comprehensive radiological survey of Building 023 and its surrounding area at the SSFL was performed in 1988. In accordance with that survey report's recommendation, remedial efforts were undertaken to remove residual radioactively contaminated components from the Building 023 structure and grounds. After the decontamination efforts were completed, a comprehensive final survey of the building interior was performed to demonstrate regulatory compliance for release without radiological restrictions.

Results of surveys demonstrate that Building 023 meets the requirements of DOE, NRC, and State of California for releasing Building 023 for use without radiological controls.

REFERENCES

1. 023-AT-0001, Radiological Assessment of Building 023, dated January 28, 1993, P. Waite
2. 023-DP-0001, Building 023 Decontamination, dated May 14, 1993, P. Waite
3. 023-AR-0002, Building 023 D&D Operations Final Report, dated September 21, 1993, P. Waite
4. 023-SP-0001, Building 023 Final Survey Procedure, dated 08/03/93, F. C. Dahl
5. ER-AN-0002, ETEC Environmental Restoration Program Management Plan, dated October 25, 1991
6. N0010P000033, Methods and Procedures for Radiological Monitoring
7. N0010P000028, Quality Control and General Operating Procedure for Gamma Spectroscopy Using Canberra Multichannel Analyzers
8. DOE Order 5400.5, Radiation Protection of the Public and the Environment, dated February 8, 1990
9. DECON-1, State of California for Decontaminating Facilities and Equipment Prior to Release for Unrestricted Use, dated June 1977
10. NRC Dismantling Order for the L-85 Reactor Decommissioning, NRC to M. E. Remley, dated March 1, 1983
11. DOE/CH/8901, A Manual for Implementing Residual Radioactive Material Guidelines, T. L. Gilbert, et al., June 1989
12. MIL-STD-414, Sampling Procedures and Tables for Inspection by Variables for Percent Defective, June 11, 1957
13. GEN-ZR-0005, Radiological Survey of the Source and Special Nuclear Material Storage Vault - Building T064, dated August 19, 1988, J. A. Chapman

1.0 INTRODUCTION

Decontamination and decommissioning (D&D) of a number of formerly used nuclear facilities and sites is underway at Rockwell International's Santa Susana Field Laboratory (SSFL). During D&D of these facilities, reasonable efforts are being made to eliminate or reduce residual radioactive contamination to levels that are as low as reasonably achievable (ALARA). Upon completion of D&D, radiological surveys are performed under established protocols to demonstrate that any remaining radioactivity does not exceed applicable regulatory limits. Findings from the surveys are also used to perform additional D&D or radiological investigations, as needed. The scope of the surveys includes both known and suspected areas of contamination in the Building 023 interior.

Decontamination of Building 023 was performed, based on an assessment report (Ref. 1) and a decontamination plan (Ref. 2), and the work has been described, in Reference 3. The final survey was conducted according to Reference 4.

This report is organized as follows: first, the summary of the results of the survey and the conclusions and recommendations; second, the background information concerning past radiological status, D&D efforts, and current radiological status; third, the survey results and the technical approach used in the data collection, analyses, and limit criteria; and fourth, the supporting documentation and calculations for historical records and report completeness.

2.0 SUMMARY AND CONCLUSIONS

Survey measurements were made for beta surface contamination on the interior walls, floors, and ceilings in Building 023, and for ambient gamma exposure rate at 1 meter above the interior floors. These measurements were tested statistically for compliance with acceptable contamination limits for activation products and mixed fission products and for ambient exposure rate.

All tests for surface contamination showed that the facility is suitable for release without radiological restrictions. Interpretation of the interior gamma exposure rate measurements (Sample Lots 1 and 2) are based on the average interior gamma exposure rate background value for a building (Bldg 038) of similar construction that has never been used for radioactive material ($8.10 \mu\text{R/hr}$). The probability distributions of these measurements shows no local contamination. The results indicate a background distribution for the building, with an average value of $8.44 \mu\text{R/hr}$. Interpretation of the exterior gamma exposure rate measurements are based on the average outdoor background gamma exposure rates for 90 locations in SSFL Area I ($15.27 \mu\text{R/hr}$) (Reference 13, page 83). The results for the exterior gamma measurements (Sample Lot 3) indicate a background distribution for the area with an average value of $14.97 \mu\text{R/hr}$.

If the corresponding interior and exterior building-specific values are used as a reference, the tests for the gamma exposure rate are satisfactory, at all locations and meet the requirements for $<5 \mu\text{R/hr}$ above background.

3.0 BACKGROUND

3.1 Location

Building 023 is located within Rockwell International's SSFL in the Simi Hills of southeastern Ventura County, California, adjacent to the Los Angeles County line and approximately 29 miles northwest of downtown Los Angeles, directly south of the City of Simi Valley. Location of the SSFL relative to Los Angeles and vicinities is shown in Figure 1. An enlarged map of neighboring SSFL communities is shown in Figure 2. Figure 3 is a plot plan of the western portion of SSFL known as Area IV, where Building 023 is located. A drawing (plan view) of Building 023 and its adjoining areas is shown in Figure 4. Building 023 is located on government-optioned land.

3.2 Topography and Building Characteristics

Building 023 is situated on B Street near 12th Street, among several adjacent buildings on paved ground. It is approximately 20 feet below the general grade of 12th Street.

Building 023 was constructed in two phases: the first section (circa 1962), "023" has been used for the storage and for operation of the small sodium loop for studies of radioactive contamination transport. The loop was located in a small partitioned area, see Figure 6. The second section (circa 1976), "023A" consists of a storage and setup room and a well-equipped analytical chemistry laboratory. During the contamination transport studies, two fume hoods, with filtered exhaust, and a sink, connected to a radioactive liquid holdup tank (Figures 5 and 6), were used for handling the radioactive samples located on the east side of Room 106.

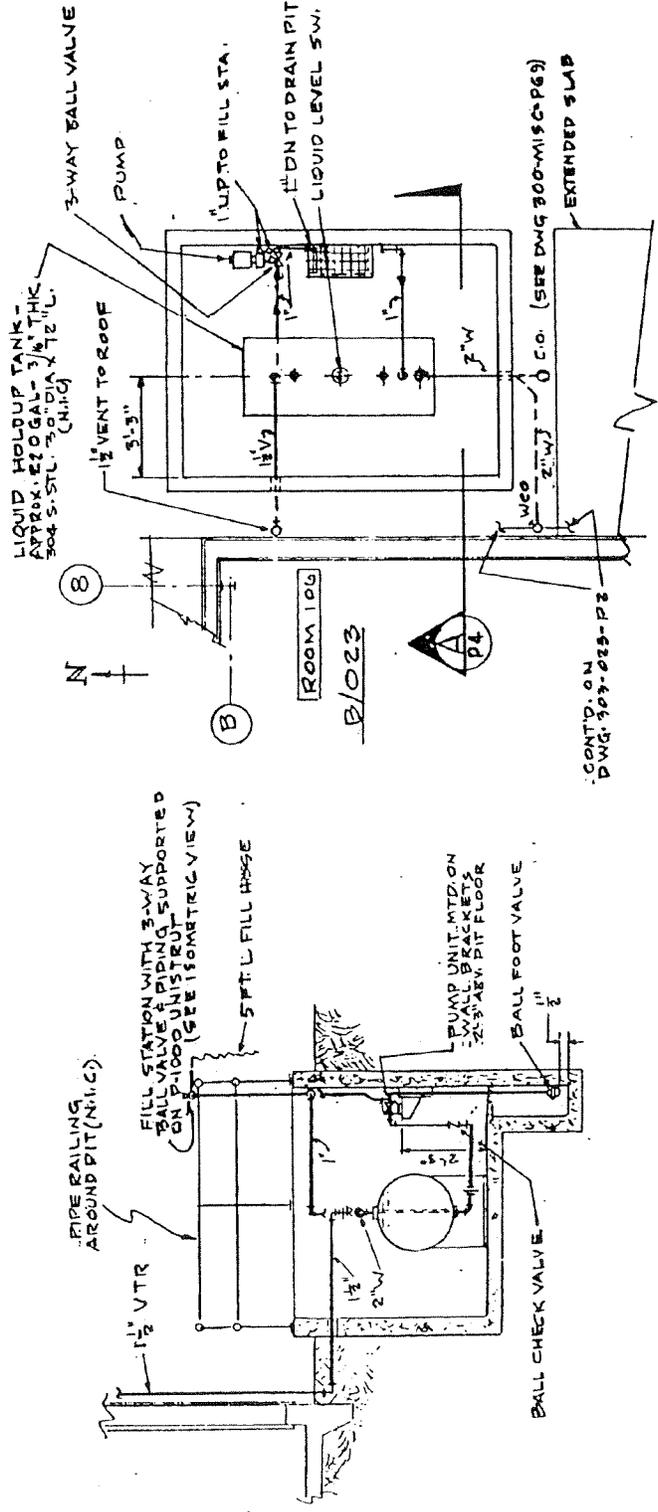
The building consists of galvanized steel walls and roof, on a concrete slab floor, with various types of internal walls and partitions. It is a single-floor structure.



Figure 1. Location of SSFL in relation to Los Angeles and Vicinity



Figure 2. Map of Neighboring SSFL Communities



SECTION A
 1/4" = 1'-0"

DETAIL C
 1/4" = 1'-0"

FACILITIES ENGINEERING	Rockwell International Corporation Atoms International Division		
PIPING SECTIONS & DETAILS			
LAB TEST AREA BLDG. 023			
SANTA SUSANA FACILITY, VENTURA CTY., CA.			
DESIGNED BY L. BENEDICT	RELEASE DATE 11-15-76	REL. NO. PEWR 75194	
DRAWN BY L. BENEDICT	DRAWING NO. 303-023-P4		
APPROVED BY			REV. NO.

Figure 5. Detailed Drawing of the Radioactive Liquid Hold-up Tank located on Bldg 023 Eastside

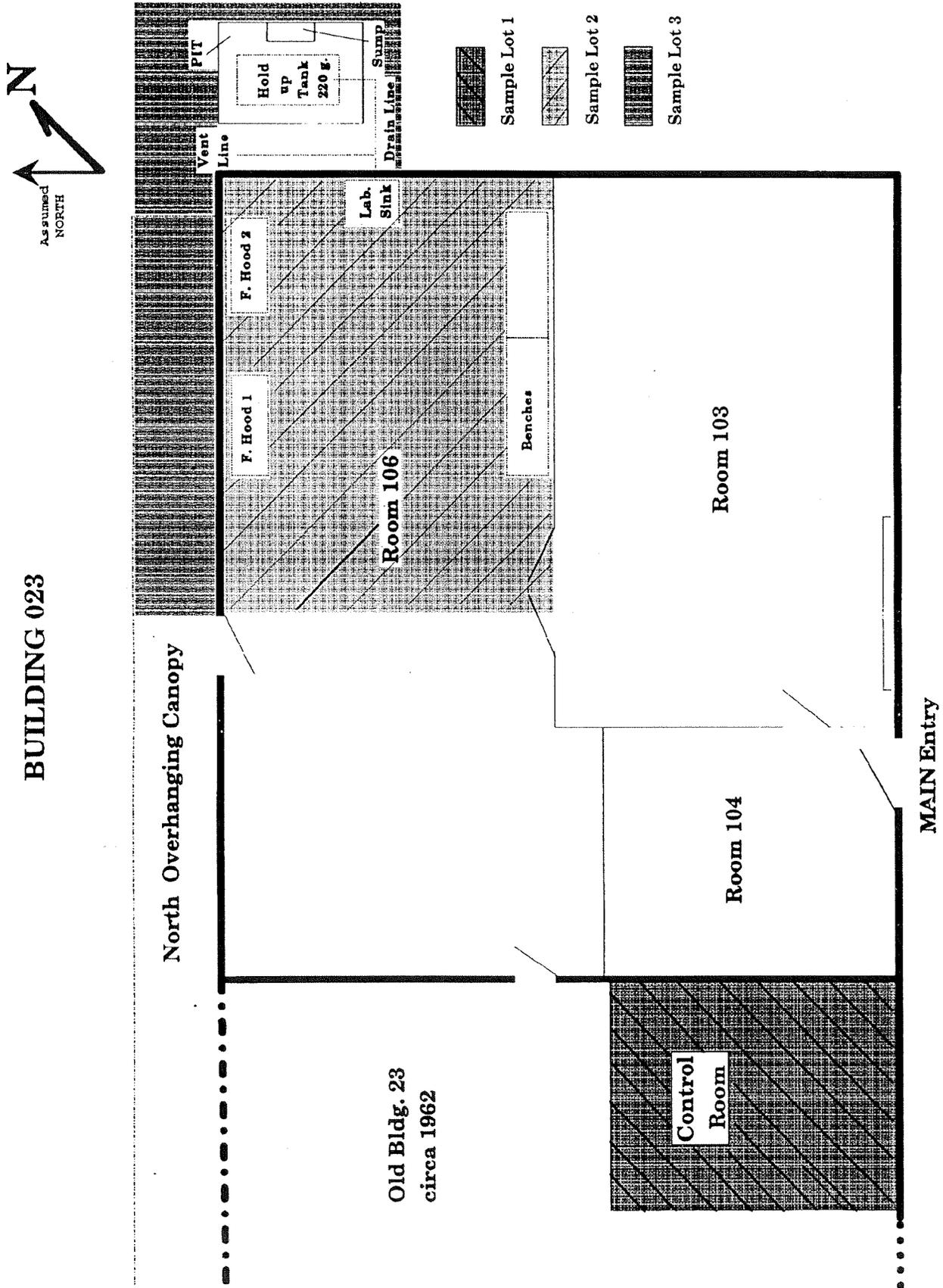


Figure 6. Building 023 Sample Lot Identification

3.3 Operating History

The first Radiological User Permit for Building 023, Authorization, No. 105, was issued in November 1976. This permit authorized the use of a small section (or sections) of activated stainless steel EBR fuel cladding to be used in a small sodium test loop. The purpose of this test was to gather data on the transport of radiological contamination in sodium loops. The sodium loop tests were halted in 1982 and the loop was dismantled in 1986. In 1982, an Alnor Dew-Point Meter containing a 6.25 μCi Ra-226 source was brought to the facility to be disassembled. The disassembly of this meter was never authorized or attempted and the meter was removed intact from Building 023 in 1986. A 10 μCi sealed source of Mn-54 used to calibrate a Canberra multichannel analyzer was stored at the facility from 1983 until 1986.

Building 023 had its own radioactive liquid waste holdup system consisting of above and below grade drain lines and a below grade storage tank located in an uncovered concrete vault outside the building. This system serviced two sinks and a fume hood. The fume hood was also connected to a HEPA filtered exhaust system consisting of ducting, a filter plenum, blower, and stack.

Two radiological incidents are on file as having occurred in Building 023. Both involved the small sodium test loop in old Building 023 (see Sample Lot 1 in Figure 6). The first incident on December 18, 1980, involved a sodium fire and Mn-54 with maximum contamination levels of 1000 dpm/100 cm^2 . The second incident April 28, 1981, also involved a sodium fire with Cs-137, Mn-54, Co-60 as the principal radioactive isotopes. The sodium fire was extinguished with calcium carbonate, and smears of the loop and floor showed no contamination.

During 1992-1993, an analytical ICP (ion-coupled plasma) instrument was used to analyze small amounts of radioactively contaminated solution from the Molten Salt Oxidation (MSO) project for trace metals. This work was completed without incident just prior to performance of the final survey reported here. The remainder of the radioactive solutions and containers were transferred to the RMDF soon after completion of the survey. To provide assurance that no radioactive contamination had resulted from this final handling, a 100% survey was performed of the areas involved, with spot checks in the surrounding areas. Instrument

surveys were performed for both total alpha and beta activity, and smears were analyzed for removable alpha and beta activity. No detectable activity was found. Survey results are maintained with the Building 023 final survey file in Building 100.

3.4 Decommissioning and Demolition Efforts

1. Phase I and II

During removal of the sodium test loop in 1986, the two sinks in Room 106 were disconnected, their respective connections to the liquid waste holdup system were sealed and the sinks removed and dispositioned. In 1990, the HEPA filtered ventilation exhaust system was removed. The fume hoods in Room 106 were disconnected from the liquid waste holdup system and the HEPA exhaust system, and was relocated for storage within the facility. The ducting from the fume hood to the filter plenum was removed and disposed of as low level RA waste. The remaining components of the HEPA filtered ventilation exhaust system, filter plenum, blower and exhaust stack were removed and shipped to the University of Missouri for use on the TRUMP-S Project (Refs. 6 and 7).

2. Phase III

The third phase of the D&D of the facility involved the decontamination of the fume hoods, removal and disposal of the liquid waste holdup system, including the drain and vent lines, the liquid waste storage tank and the floor area where the sodium loop had been located.

A radiological survey of the fume hood revealed that contamination was present only in the drain basin. The basin was cut out, inspected, and found to be free of hazardous material, and disposed of as low level radioactive waste. After removal of the basin, an equipment release radiological survey was performed on the fume hood. No detectable activity (NDA) above natural background was found and the fume hoods were released for use without radiological restrictions.

The liquid waste holdup system consisted of approximately 80 feet of 3-in. cast iron drain line, 40 feet of 2 1/2-in. galvanized pipe vent lines, and a 220 gal. stainless steel holdup tank. The holdup tank was located in a 7 1/2 ft wide by 10 ft long by 6 ft deep open top concrete vault outside the east

end of the building. All of the drain lines ran along the outside of the building to a double fixture fitting near the holdup tank vault. The drain line then ran underground approximately 6 feet, through the vault wall and into the tank. The two sinks shared a common drain vent which attached to the outside of the building. The fume hood drain had an individual vent attached to the outside of the building.

The aboveground drain and vent lines were, disassembled at joints or connections, then cut into waste box lengths (Fig. 1). After the installation of the liquid waste system, a concrete pad had been poured to accommodate an air conditioning unit. Therefore, a portion of the pad had to be cut and removed to gain access to the buried section of drain line (Fig. 2). Once all of the drain and vent lines had been removed (Fig. 3), the tank was removed from the vault and transported to the RMDF for size reduction.

Prior to size reduction and disposal, the tank was inspected for hazardous or potentially hazardous materials. This inspection, which was witnessed by a representative of the Rocketdyne Environmental Protection Department, revealed only rust from the cast iron drain lines and slight moisture in the form of condensation on the inner tank walls. The tank was cut/size reduced into waste box size segments using a plasma torch and packaged for radioactive waste disposal.

During the final survey of the facility, fixed contamination (Cs-137) was found on the concrete floor in the old control room where the sodium loop had been installed. Attempts to remove the contamination with aggressive wiping techniques were unsuccessful. Therefore, the area was decontaminated by scabbling of the concrete surface and vacuuming. In accordance with the facility final survey procedure (Ref. 11) the areas immediately surrounding the decontaminated area were thoroughly surveyed and the boundaries of the final survey were expanded. The survey of these areas found no surface contamination above release limits, and the data used in this survey is after the decontamination of this area.

4.0 SURVEY RESULTS

4.1 Overview

Upon D&D of radioactive constituents, releasing a facility or area for unrestricted use requires a formal radiation survey to demonstrate that the applicable regulatory limits for such a release are met. The survey is performed under an established plan, and a statistical interpretation of the resulting data is made to determine if the regulatory release criteria have been met. This document provides the necessary framework to demonstrate that Building 023 meets DOE, NRC, and State of California criteria for release of the facility for unrestricted use. All original survey and user authorization documentation (Ref. 4) is maintained in the Building 023 final survey file in Building 100.

4.2 Scope of the Survey

For the final radiological survey of Building 023, the interior rooms were separated into sample lots. These sample lots are graphically shown in Figure 6. Sample lots were treated separately for the purposes of statistical data analyses. Distinguishable properties for selecting the sample lots were areas or rooms which contained contaminated components that were recently decontaminated. The chosen sample lots or areas are shown in Table 1 with the corresponding type of survey performed.

Table 1. Sample Lots Surveyed

Sample Lot No.	Room or Area	Type of Survey Performed ^(1,3)			
		Total	Removable		Ambient Gamma ⁽²⁾
		Beta	Alpha ⁽⁴⁾	Beta	
1	Rooms 110 & 104	x	x	x	x
2	Room 114	x	x	x	x
3	Rooms 116, 120, & rest rooms	x	x	x	x

- (1) The type of survey performed for each sample lot was dependent on the type of surface being measured (e.g., concrete floor, walls, asphalt, gravel roof, tile floors, etc.) and the type of isotope (in this case, beta-gamma emitters)
- (2) Ambient gamma readings are performed only on the horizontal walking surfaces at 1 meter.
- (3) 20% of all structural surfaces were surveyed in each sample lot for total beta, removable alpha, and removable beta.
- (4) Removable alpha activity measurements were also analyzed for since the NMC Tennelec counter can measure both for alpha and beta emitters simultaneously.

4.3 Survey Methods

1. Sampling Method

The method and type of survey measurements depended on the type of surfaces involved. For each sample lot, a 3-meter by 3-meter grid was superimposed on the floors, walls, and ceilings of the entire sample lot area (see Figure 7). A 100% direct frisk of each 3-m by 3-m grid was then performed using a G-M pancake probe. Due to the small size of the sample lots, each 1-meter by 1-meter area was then selected from each 3-m by 3-m area which did not contain immovable fixtures.

Each 1-m by 1-m grid location was then surveyed for contamination based on the type of surface involved. This method satisfies the State of California guidelines in DECON-1 (Ref. 8) for a minimum of 10% of an area shall be surveyed, and is shown graphically in Figure 7. Walls, floors, and ceilings were surveyed for total beta activity, removable alpha and beta activity and maximum beta activity, if a "hot spot" was detected when the total beta measurements were made. Additionally, the floors were surveyed for ambient gamma readings in $\mu\text{R/hr}$ at 1 meter. Twenty percent of all structural surfaces (pipes, conduit, light fixtures, etc.) were surveyed for total and removable beta activity and removable alpha activity. Concrete slabs and pads were surveyed in the same manner as the interior floors. Asphalt paving outside the building was not surveyed since the scope of the survey was interior rooms.

2. Instrument Calibrations and Checks

Measurements of the total and maximum beta surface activities were made with a thin-window pancake Geiger-Mueller tube. The detectors were calibrated with a Tc-99 beta source standard, traceable to NIST. A 5-min integrated count time was used.

Measurements of removable surface activity (alpha and beta) were made by wiping approximately 100 cm² of surface area using standard smear disks. The activity on the disks were measured using a gas-flow proportional counter. The counters were calibrated using Th-230 and Tc-99 standard sources, traceable to NIST. A 1-min integrated count time was used.

The ambient exposure rates at 1 m from surfaces were measured using a 1-in. NaI scintillation detector. These instruments were calibrated against a Reuter-Stokes high-pressure ionization chamber, and daily checks were made using a Ra-226 source, traceable to NIST, placed 1-m from the detector. A 1-min integrated count time was used.

All portable survey instruments were serviced and calibrated with NIST traceable standards on a quarterly basis. In addition, daily (when used) checks and calibrations were performed on all instrumentation to determine acceptable performance and establish a background value for the instrument on that day. Reference 5 provides further methods and procedures for environmental surveys.

Soil analyses were performed using a high purity Ge detector gamma-spectroscopy system calibrated with a NIST traceable standard. Reference 6 contains additional information concerning the method by which soil analyses are validated.

4.4 Technical Approach

1. Criteria and Their Implementation

Acceptable contamination limits and gamma exposure rates for releasing a facility for unrestricted use are prescribed in DOE, NRC, and State of California guidelines (Ref. 8, 9, 10). The lowest (most conservative) limits were chosen from these guidelines and incorporated into the final survey criteria for Building 023. Two specific criteria were chosen from the guidelines.

- a) The surface contamination limits for alpha and beta were excerpted from DOE Order 5400.5 (Ref. 8 and State of California guidelines (Ref. 9);

- b) The ambient gamma exposure rate limits at 1 m were excerpted from NRC Dismantling Order for the L-85 reactor decommissioning (Ref. 9) for conservatism and consistency with past decommissioning efforts. Although DOE Order 5400.5 recommends a value of 20 $\mu\text{R/hr}$ above background, the value of 5 $\mu\text{R/hr}$ from the NRC Dismantling Order was used for consistency, conservatism, and in keeping with ALARA principles;

Table 2 provides a summary of the contamination limit criteria. Table 3 demonstrates that the detection limits (SSAs) for the instruments and method are well below the established limit criteria (from regulatory requirements) shown in Table 2.

2. Data Analyses and Statistical Criteria

A statistical procedure was used to validate the applicability of the raw survey data for selected sample lots or areas. The statistical method known as "sampling inspection by variables" (Ref. 11) was used. This method has been widely applied in industry and the military and is essential where the lot size is impractically large. In the case of determining residual contamination in Building 023, it would be unacceptably time consuming and not cost effective to measure and document 100% of the building. However, by applying sampling inspection by variables methods, acceptable confidence in the conclusion made about the level of contamination can be achieved.

Table 2. Building 023 Contamination Limit Criteria

Parameter	Limit				Reference
	Radionuclides ⁽²⁾	Average ^(3,4)	Maximum ^(4,5)	Removable ^(4,6)	
Allowable Total					
Residual surface contamination for alpha and beta (dpm/100-cm ²) ⁽¹⁾	U-natural, U-235, U-238, & associated decay product, alpha emitters	≤5,000	≤15,000	≤1,000	8,9
Surface contamination for gamma exposure rate	≤5 μR/hr above background at 1 m interior and exterior				10

- ¹ As used in this table, dpm (disintegrations per minute) means the rate of emission by radioactive material as determined by correcting the counts per minute measured by an appropriate detector for background, efficiency, and geometric factors associated with the instrumentation.
- ² Where surface contamination by both alpha- and beta-gamma-emitting radionuclides exists, the limits established for alpha- and beta-gamma-emitting radionuclides should apply independently.
- ³ Measurements of average contamination should not be averaged over an area of more than 1 m². For objects of less surface area, the average should be derived for each such object.
- ⁴ The average and maximum dose rates associated with surface contamination resulting from beta-gamma emitters should not exceed 0.2 mrad/h and 1.0 mrad/h, respectively, at 1 cm.
- ⁵ The maximum contamination level applies to an area of not more than 100 cm².
- ⁶ The amount of removable material per 100 cm² of surface area should be determined by wiping an area of that size with dry filter or soft absorbent paper, applying moderate pressure, and measuring the amount of radioactive material on the wiping with an appropriate instrument of known efficiency. When removable contamination on objects of surface area less than 100 cm² is determined, the activity per unit area should be based on the actual area and the entire surface should be wiped. It is not necessary to use wiping techniques to measure removable contamination levels if direct scan surveys indicate that the total residual surface contamination levels are within the limits for removable contamination.

Table 3. Observed Detection Limits versus Established Limit Criteria

	Removable Alpha (dpm/100 cm ²)	Total Beta (dpm/100 cm ²)	Removable Beta (dpm/100 cm ²)	Ambient Gamma Exposure Rate (μR/hr)
Limit criteria	1000	5000	1000	<5.0 above background
Average obs. detection limit (SSA*)	4	316	12	0.60
Obs. detection limit range	2-9	252-373	6-23	0.49-0.66
Ave-obs. detection limit to established limit criteria	0.39%	6.32%	1.17%	12.02%

$$*SSA = 1.645 \times \left[\frac{\text{SQRT}(2 \times \text{counts})}{\text{background}} \right] \times \text{area factor} \times \text{efficiency factor} / \text{minutes} = \text{dpm}/100 \text{ cm}^2$$

In sampling inspection by variables, the number of data points on which measurements are obtained is first chosen to be large so that the parameters of the distribution are likely to have a normal distribution (i.e., Gaussian). The mean of the distribution, \bar{x} , and its standard deviation, s , are then related to a "test statistic," TS, as follows:

$$TS = \bar{x} + ks$$

where \bar{x} = average (arithmetic mean of measured values)

s = observed sample standard deviation

k = tolerance factor calculated from the number of samples to achieve the desired sensitivity for the test

U = acceptance limit

TS and \bar{x} are then compared with an acceptance limit, U (such as those shown in Table 2), to determine acceptance or other plans of action, including rejection of the area as contaminated and requiring further remediation.

The sample mean, standard deviation, and acceptance limit are easily calculable quantities; the value of k , the tolerance factor, bears further discussion. Of the various criteria for selecting plans for acceptance sampling by variables, the most appropriate is the method of Lot Tolerance Percent Defective (LTPD), also referred to as the Rejectable Quality Level (RQL). The LTPD is defined as the poorest quality that should be accepted in an individual lot. Associated with the LTPD is a parameter referred to as consumer's risk (β), the risk of accepting a lot of quality equal to the LTPD. USNRC Regulatory Guide 6.6 ("Acceptance Sampling Procedures for Exempted and Generally Licensed Items Containing By-Product Material") states that the value for the consumer's risk should be 0.10. Conventionally, the value assigned to the LTPD has been 10%.

The State of California has stated that the consumer's risk of acceptance (β) at 10% defective (LTPD) must be 0.1. For those choices of β and LTPD, $K_\beta = K_2 = 1.282$. The number of samples is n . Values of k for each sample size are calculated in accordance with the following equations:

$$K = \frac{K_2 + \sqrt{K_2^2 - ab}}{a}; a = 1 - \frac{K_\beta^2}{2(n-1)}; b = K_2^2 - \frac{K_\beta^2}{n} \quad (\text{Eq. 1})$$

where k = tolerance factor

K_2 = the normal deviate exceeded with probability of β , 0.10 (from tables, $K = 1.282$)

K_β = the normal deviate exceeded with probability equal to the LTPD, 10% (from tables, $K = 1.282$)¹

n = number of samples

The statistical criteria for acceptance of the Building 023 interior final survey are presented below.

- a) Acceptance: If the test statistic ($\bar{x} + ks$) is less than or equal to the limit (U), accept the region as clean. (If any single measured value exceeds 80% of the limit, decontaminate that location to as near background as is possible, but do not change the value in the analysis.) See Figure 8 for an example of the sample lot acceptance by the test.
- b) Collect additional measurements: If the test statistic ($\bar{x} + ks$) is greater than the limit (U), but \bar{x} itself is less than U , independently resample and combine all measured values to determine if $\bar{x} + ks \leq U$ for the combined set; if so, accept the region as clean. If not, the region is contaminated and must be remediated. See Figure 9 for an example of additional measurements that must be taken in the sample lot to accept or reject it.
- c) Rejection: If the test statistic ($\bar{x} + ks$) is greater than the limit (U) and \bar{x} (l_{ex}) $\geq U$, the region is contaminated and must be remediated. See

¹The values chosen for these coefficients for the survey correspond to assuring, with 90% confidence, that 90% of the area has residual contamination below 100% of the applicable limit (a 90/90/100 test). The choice of values for the two coefficients is consistent with industrial sampling practices and State of California guidelines (Ref. 9).

Figure 10 for an example of sample lot rejection by the test.

Thus, based on sampling inspection, we are willing to accept the hypothesis that the probability of accepting a lot as not being contaminated which is, in fact, 10% defective is 0.10. Or in other words, the Building 023 final survey corresponds to assuring with 90% confidence that 90% of the area has residual contamination below 100% (a 90/90/100 test) of the applicable limits described in Table 2.

4.5 Sample Lot Analyses and Results

1. Sample Lot 1

a) Description

Sample Lot 1, located in the southeast room of old building 023, contained the small sodium loop used for testing. The floor of the room (designated as the control room in Figure 6) contain fixed CS-137 contamination and was decontaminated. Every 1 m² area was surveyed after the decontamination efforts and the analyses below use this post-decontamination data.

b) Analyses of Sample Lot 1 Data

Raw data measurements for Sample Lot 1 were taken, subtracted for daily instrument background (except for ambient gamma exposure rates) and plotted on a cumulative probability graph as explained previously. For statistical comparisons (using the "sampling inspection by variables" method), similar areas within Sample Lot 1 were combined together and then analyzed for the specific type of radiation measurement made on the surface. Individual raw measurement data and instrument backgrounds are provided in Appendix A.

Sample lot 1 results are tabulated in Table 4 for comparing the test statistic ($TS = \bar{x} + ks$) with applicable, established contamination criteria or acceptance limit (U) from Table 2. The corresponding figures for the graphs of each calculated cumulative probability plot are also provided. Individual calculated sample results used as graph data for Sample Lot 1 are provided in Appendix B.

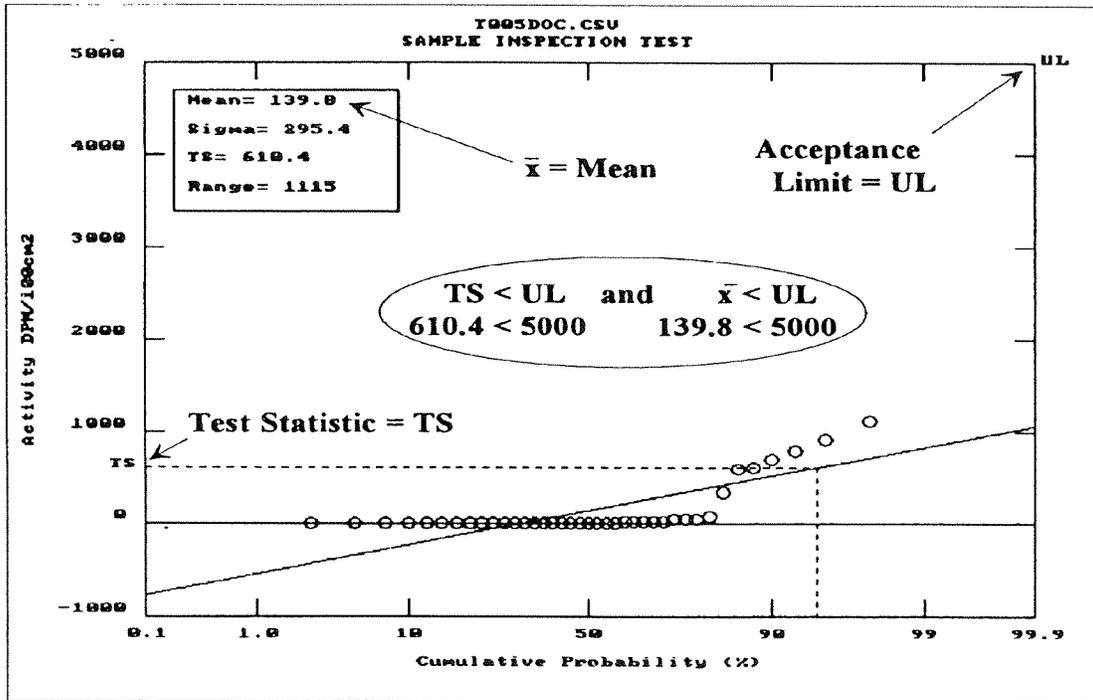


Figure 8. Example of Sample Lot Acceptance, where $TS(=\bar{x}+ks) \leq UL$ and $\bar{x} \leq UL$

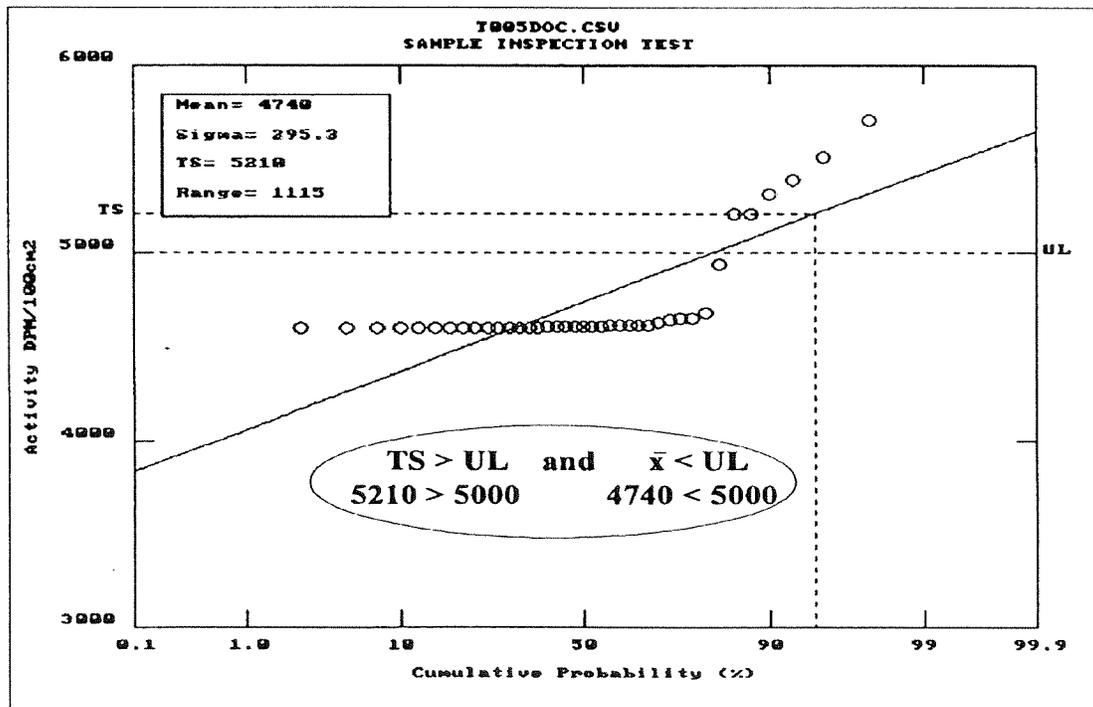


Figure 9. Example of Sample Lot Requiring Additional Measurements, where $TS(=\bar{x}+ks) > UL$ and $\bar{x} < UL$

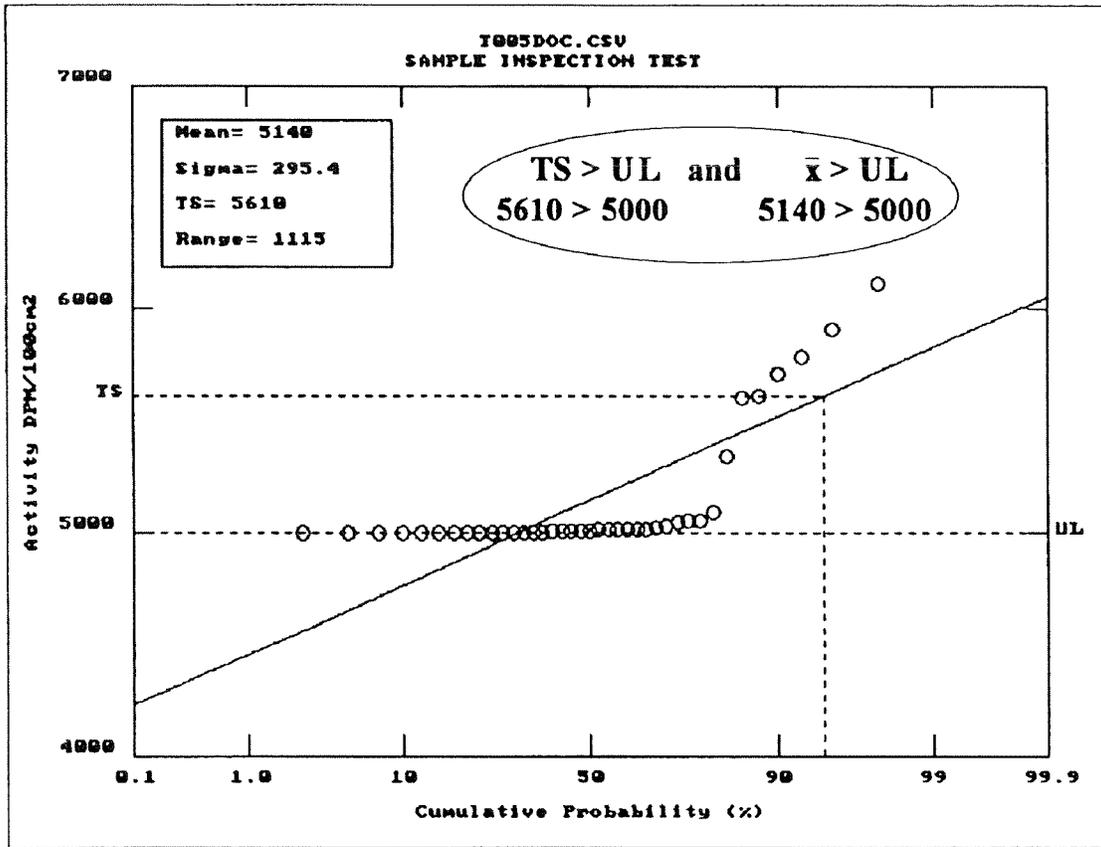


Figure 10. Example of Sample Lot Rejection, where $TS(\bar{x}+ks) > UL$ and $\bar{x} > UL$

Table 4. Sample Lot 1 Results

	Calculated Test Statistic (TS = \bar{x} + ks)			
	Total	Removable		Ambient Gamma Exposure Rate
	Beta (dpm/100 cm ²)	Alpha (dpm/100 cm ²)	Beta (dpm/100 cm ²)	
Acceptance Limit (UL)	5000	1000	1000	13.10**
Floors only				9.25 (15)*
Entire area - floors, walls, ceiling, & structure	1244.0 (12)*	2.74 (14)*	28.06 (13)*	

* Numbers in parenthesis refer to figure numbers.

** The acceptance limit for ambient gamma exposure rate in $\mu\text{R/hr}$ was determined by calculating the average ambient indoor background (8.10 $\mu\text{R/hr}$, see Figure 11 for the normal distribution.) from 30 locations inside a known uncontaminated building (Bldg. 038) and adding the acceptance criteria from Table 2 (<5 $\mu\text{R/hr}$ above background) to achieve a final indoor ambient gamma exposure rate limit of 13.10 $\mu\text{R/hr}$. All values, excluding the ambient gamma exposure rate, in this table are subtracted for daily instrument background.

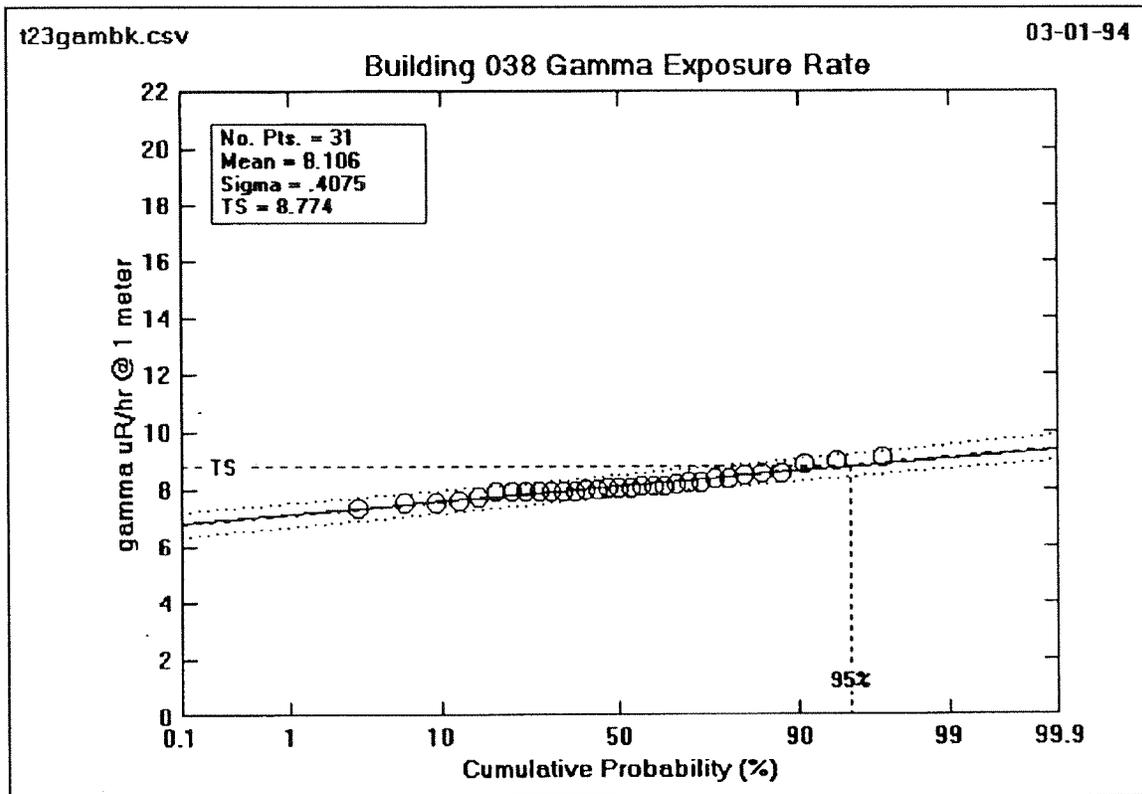
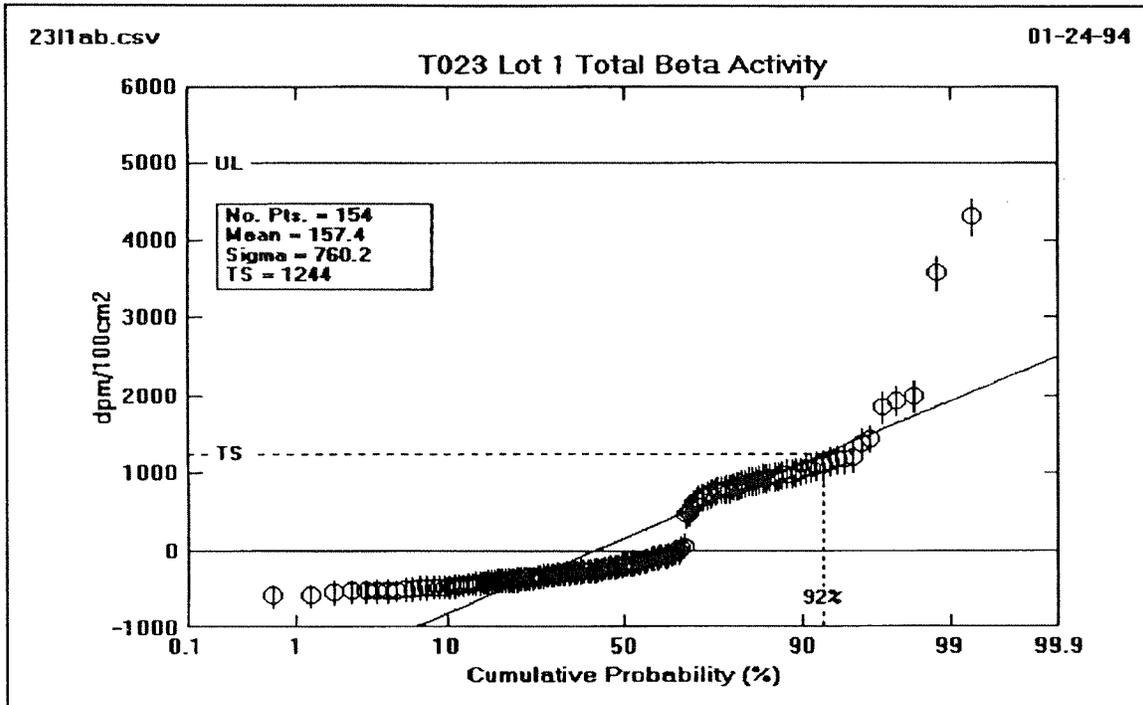
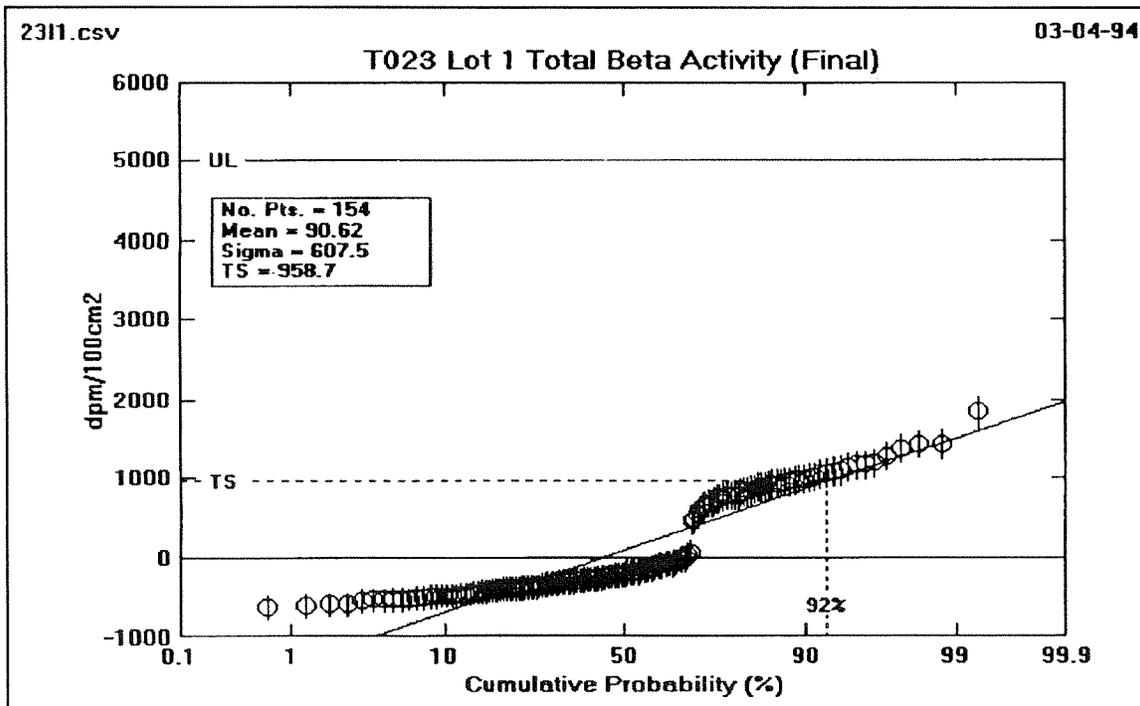


Figure 11. Gamma exposure rate measured in Bldg. 038. Tilt-up wall aluminum-siding building (Bldg. 038) has construction similar to that of T023 and no radiological history. Confidence bounds (95%) on least-squares fit of data are close to the derived Gaussian line. See Appendix B for data measurements.

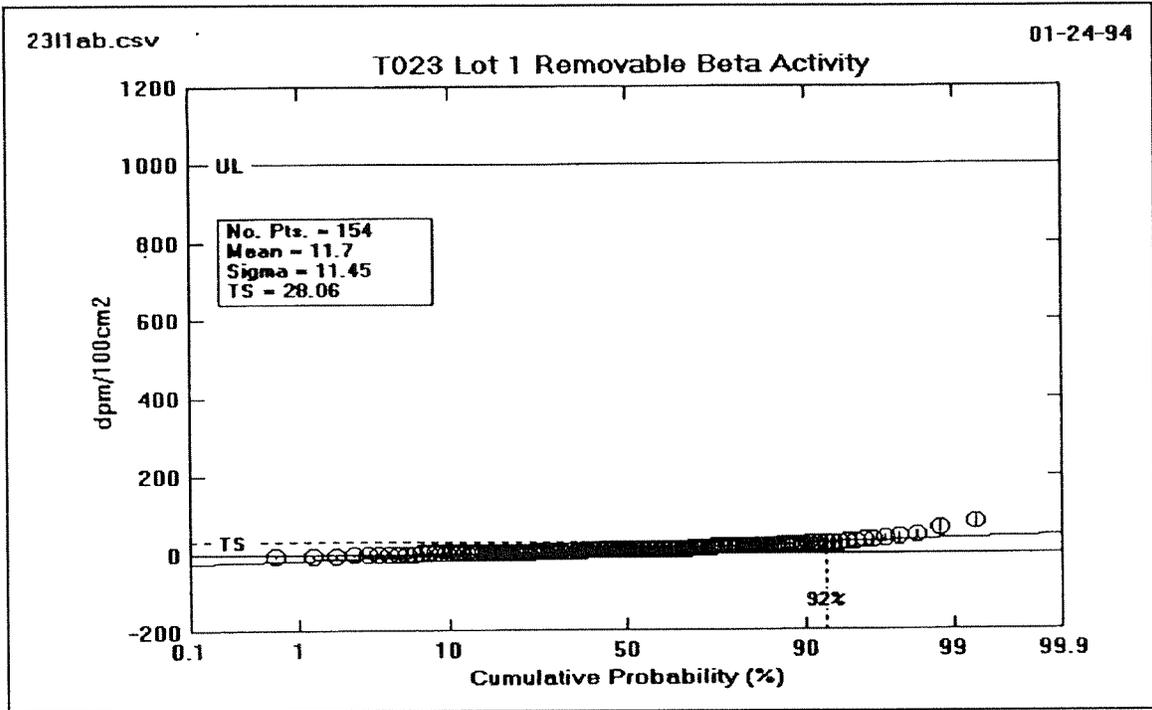


12a.) Pre-Decon with scale including Acceptance Limit (UL)

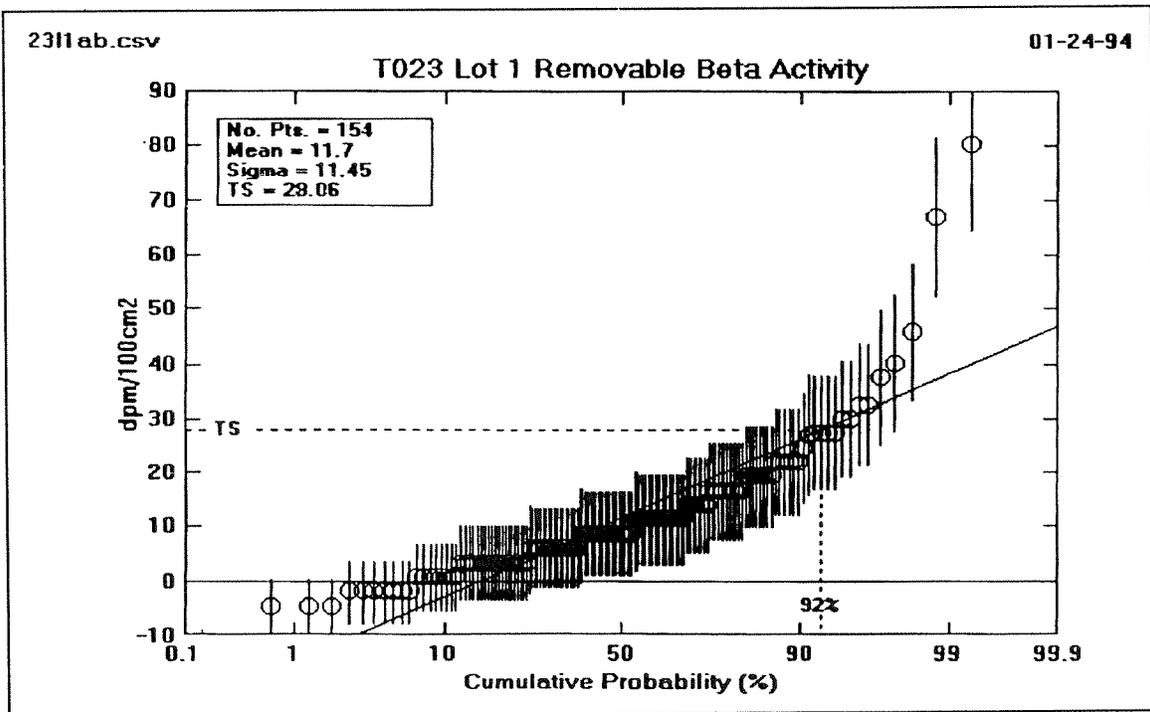


12b.) Post-Decon with scale including Acceptance Limit (UL)
100% of the Area was surveyed for Total Beta Activity

Figure 12: T023 - LOT 1 Total Beta Activity

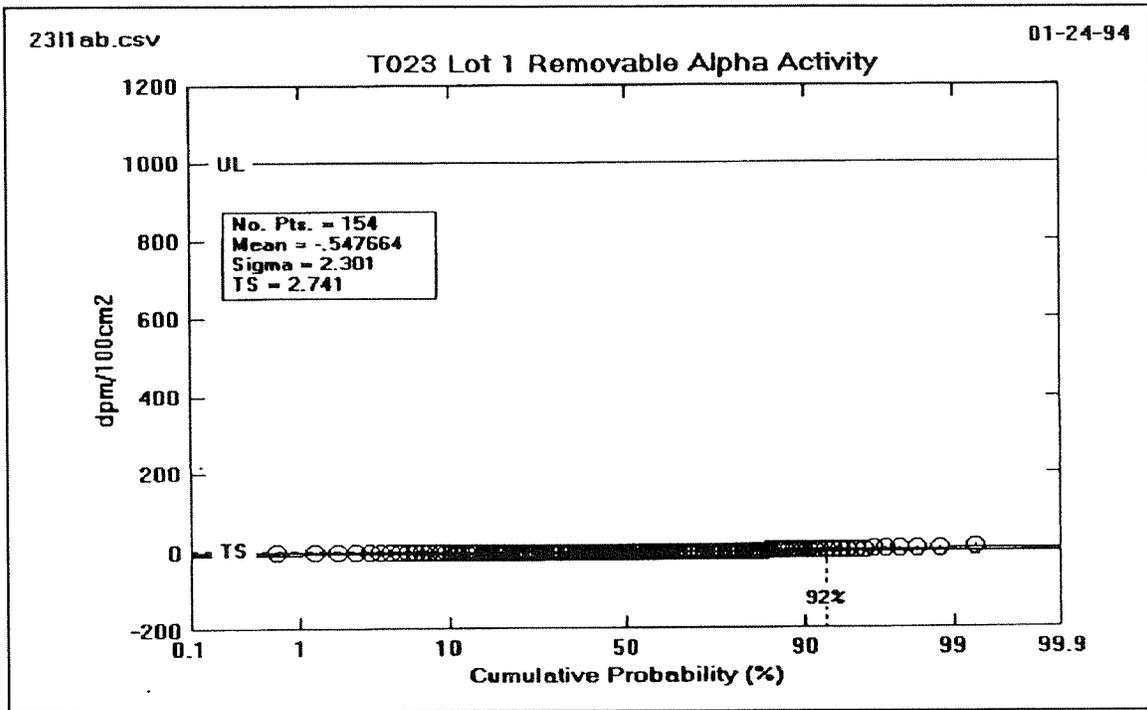


13a.) Scale including Acceptance Limit (UL)

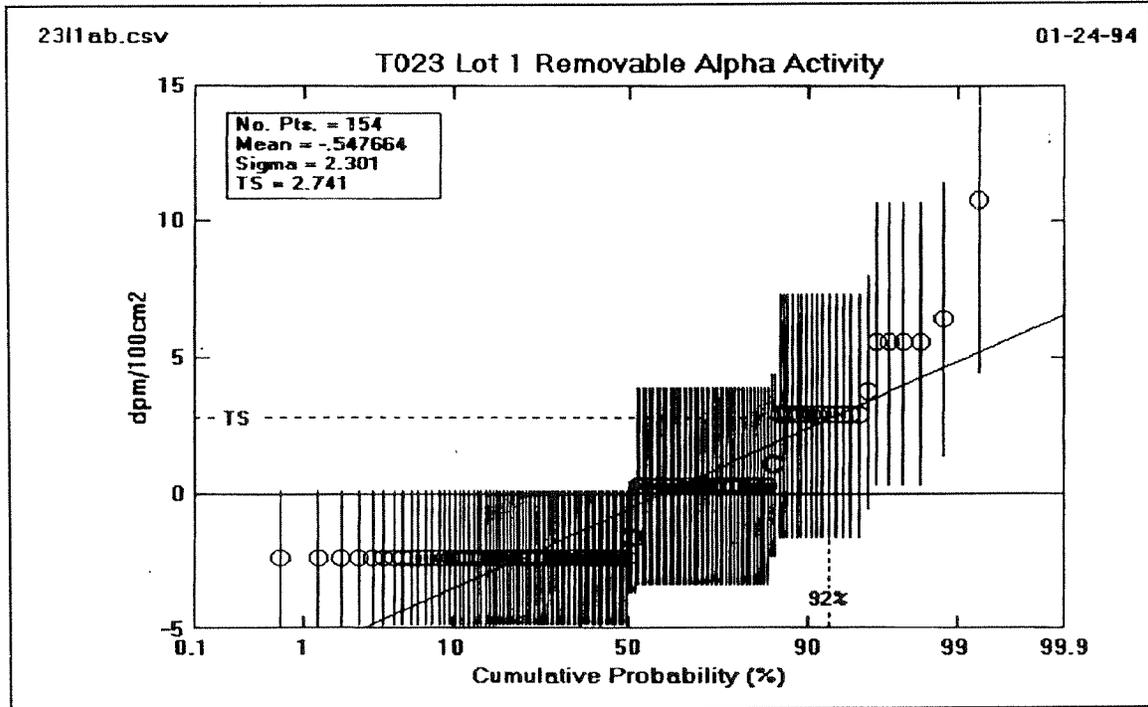


13b.) Expanded Scale

Figure 13: T023 - LOT 1 Removable Beta Activity

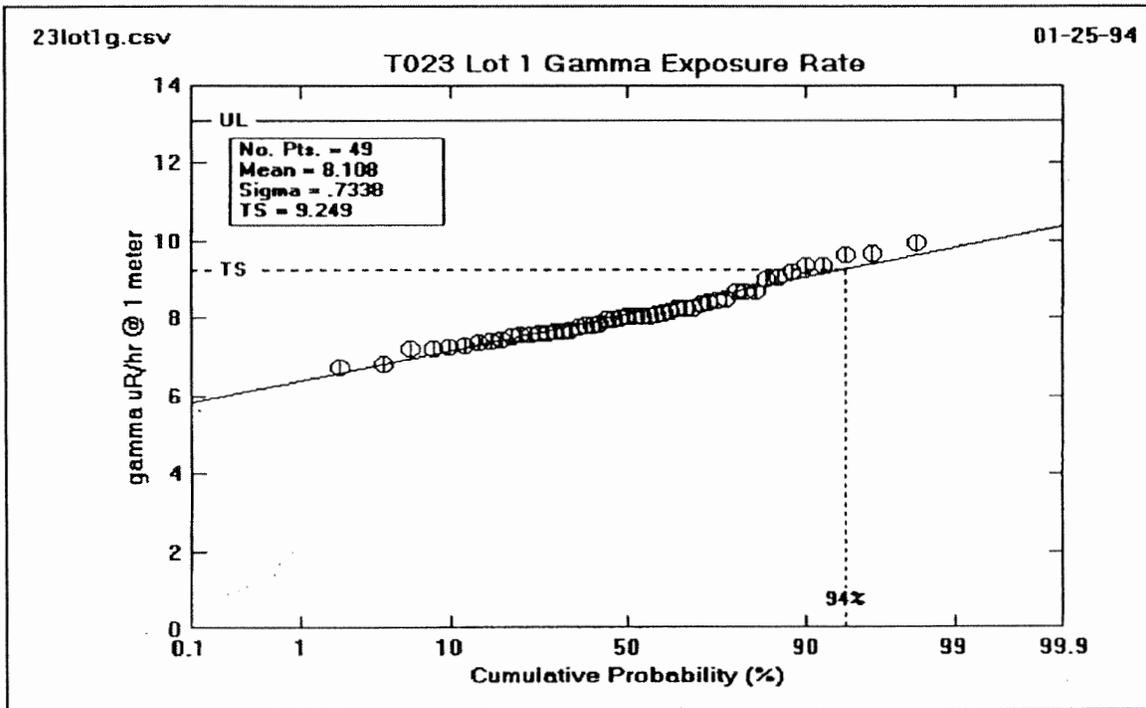


14a.) Scale including Acceptance Limit (UL)



14b.) Expanded Scale

Figure 14: T023 - LOT 1 Removable Alpha Activity



15) Scale including Acceptance Limit (UL)

Figure 15: T023 - LOT 1 Floors Ambient Gamma Exposure Rate

c) Interpretation of Results for Sample Lot 1

Figures 12 through 15 and Table 4 demonstrate that for each applicable acceptance limit (U) from Table 2, the corresponding test statistic (TS) value is less than the U or $TS < U$. Therefore, the four figures for Sample Lot 1 pass the "sampling inspection by variables" test and are "Accepted" as radiologically clean. Or in other words, the Building 023 Sample Lot 1 survey corresponds to assuring with a 90% confidence that 90% of Sample Lot 1 has residual contamination below 100% (a 90/90/100 test) of the applicable NRC, DOE, and State of California limits described in Table 2.

2. Sample Lot 2

a) Description

Sample Lot 2, located in the newer building 023A (Room 106) contained two fume hoods, the radioactive sink drain to the radioactive liquid holdup tank, and various analytical chemistry equipment (see Figure 6). All of the 1 m² areas except those with immovable furniture were surveyed.

b) Analyses of Sample Lot 2 Data

Raw data measurements for Sample Lot 2 were taken, subtracted for daily instrument background (except for ambient gamma exposure rates) and plotted on a cumulative probability graph as explained previously. For statistical comparisons (using the "sampling inspection by variables" method), similar areas within Sample Lot 2 were combined together and then analyzed for the specific type of radiation measurement made on the surface. Individual raw measurement data and instrument backgrounds are provided in Appendix A.

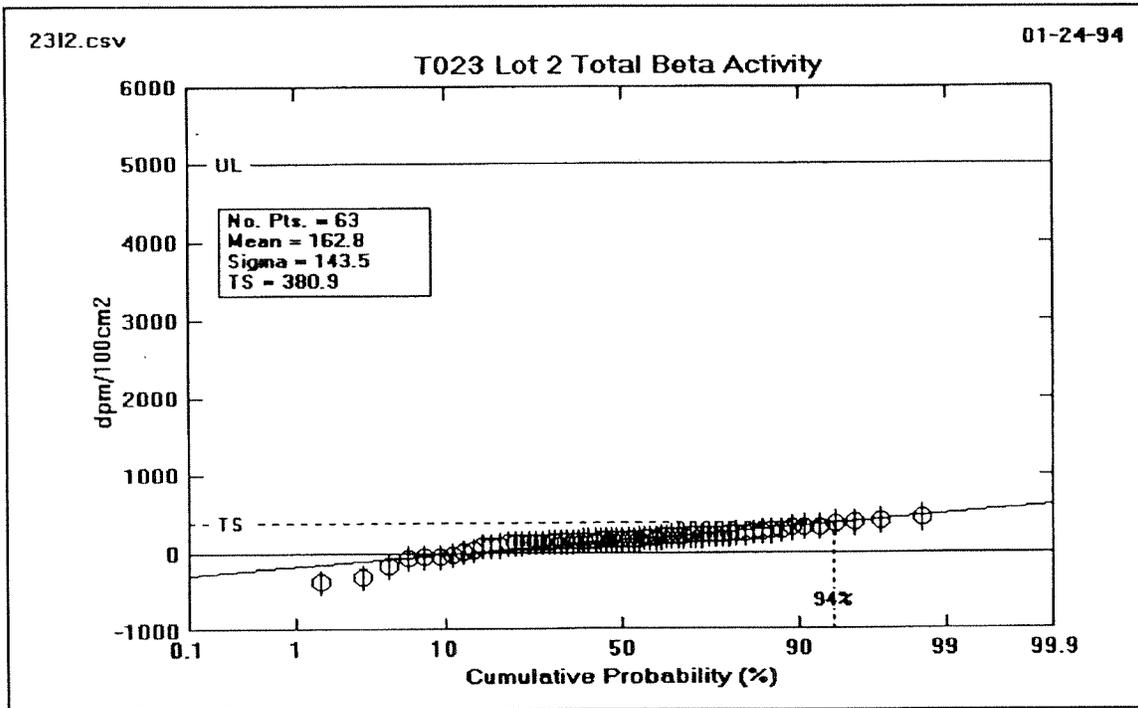
Sample lot 2 results are tabulated in Table 5 for comparing the test statistic ($TS = \bar{x} + ks$) with applicable, established contamination criteria or acceptance limit (U) from Table 2. The corresponding figures for the graphs of each calculated cumulative probability plot are also provided. Individual calculated sample results used as graph data for Sample Lot 2 are provided in Appendix B.

Table 5. Sample Lot 2 Results

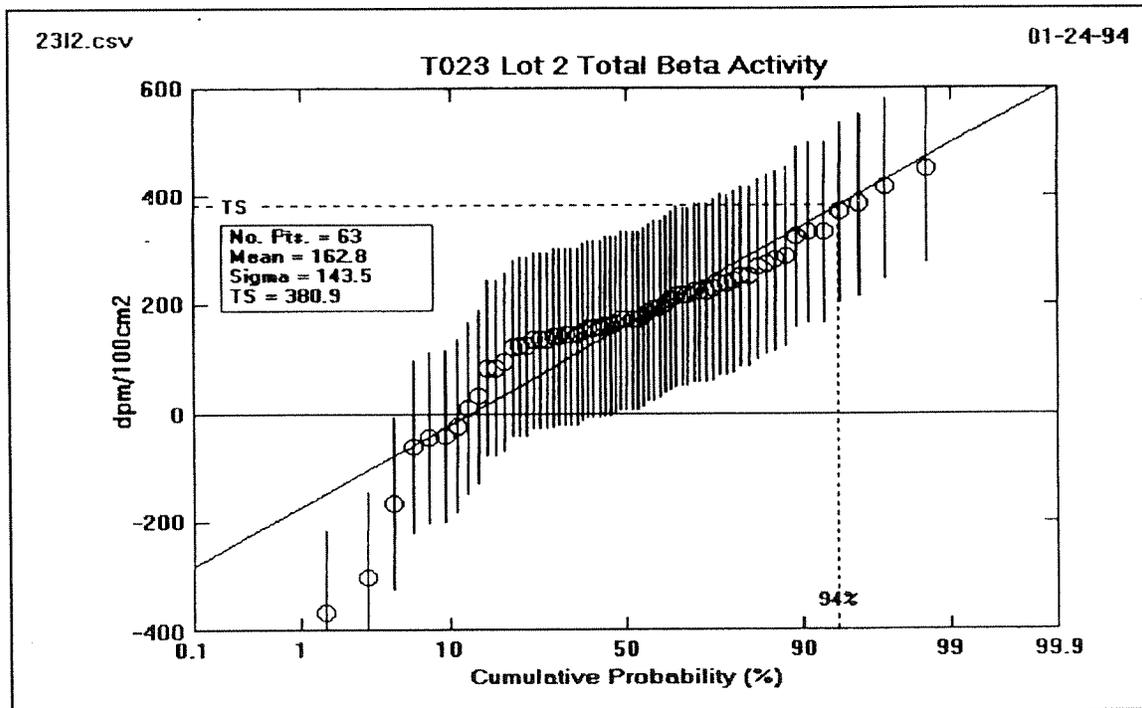
	Calculated Test Statistic (TS = $\bar{x} + ks$)			
	Total	Removable		Ambient Gamma Exposure Rate
	Beta (dpm/100 cm ²)	Alpha (dpm/100 cm ²)	Beta (dpm/100 cm ²)	
Acceptance Limit (UL)	5000	1000	1000	13.10**
Floors only				9.35 (19)*
Entire area - floors, walls, ceiling, & structure	380.9 (16)*	3.07 (18)*	19.17 (17)*	

* Numbers in parenthesis refer to figure numbers.

** The acceptance limit for ambient gamma exposure rate in $\mu\text{R/hr}$ was determined by calculating the average ambient indoor background ($8.10 \mu\text{R/hr}$, see Figure 11 for the normal distribution) from 30 locations inside a known uncontaminated building (Bldg. 038) and adding the acceptance criteria from Table 2 ($<5 \mu\text{R/hr}$ above background) to achieve a final indoor ambient gamma exposure rate limit of $13.10 \mu\text{R/hr}$. All values, excluding the ambient gamma exposure rate, in this table are subtracted for daily instrument background.

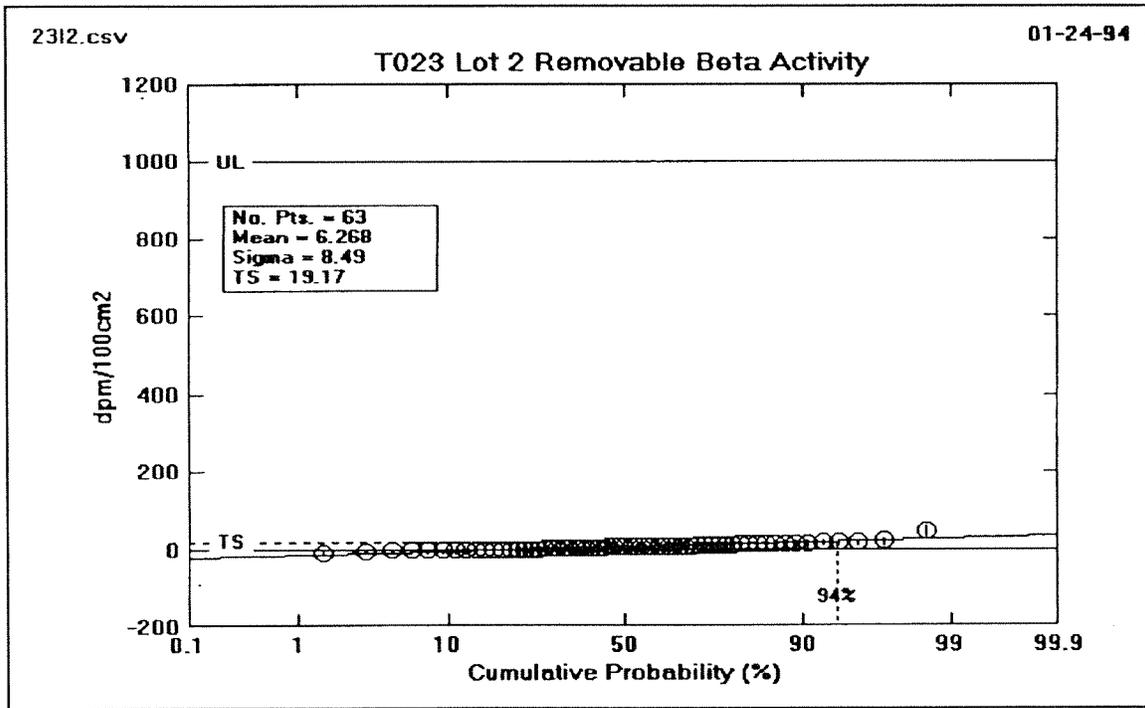


16a.) Scale including Acceptance Limit (UL)

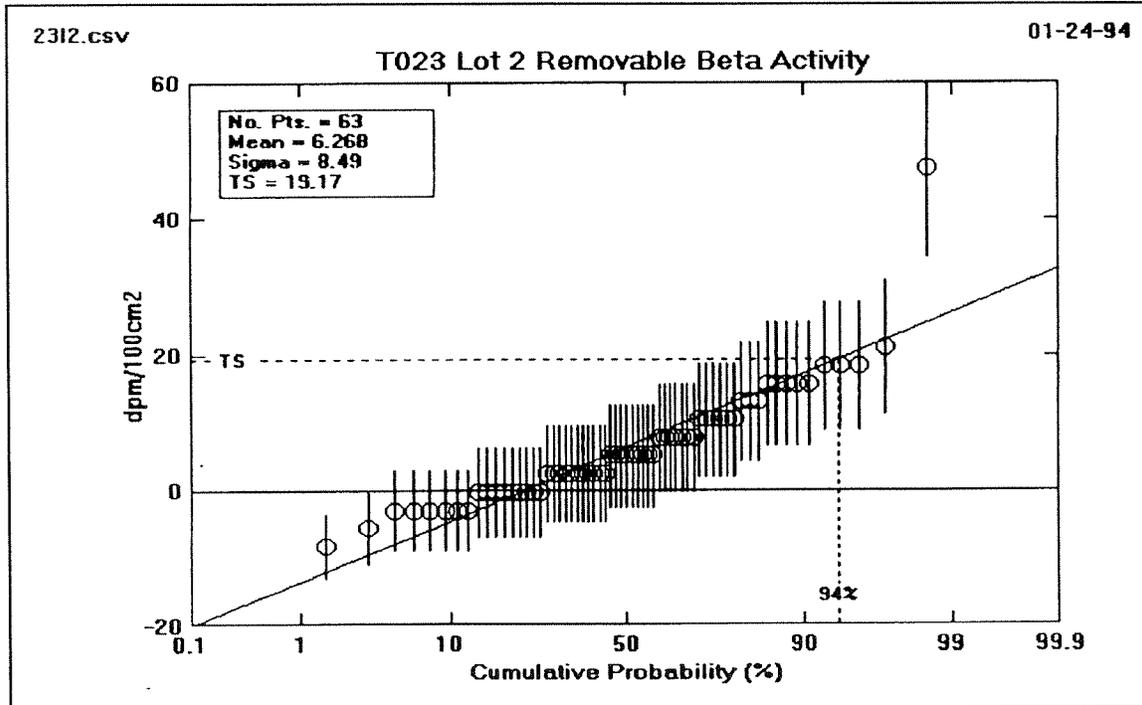


16b.) Expanded Scale

Figure 16: T023 - LOT 2 Total Beta Activity

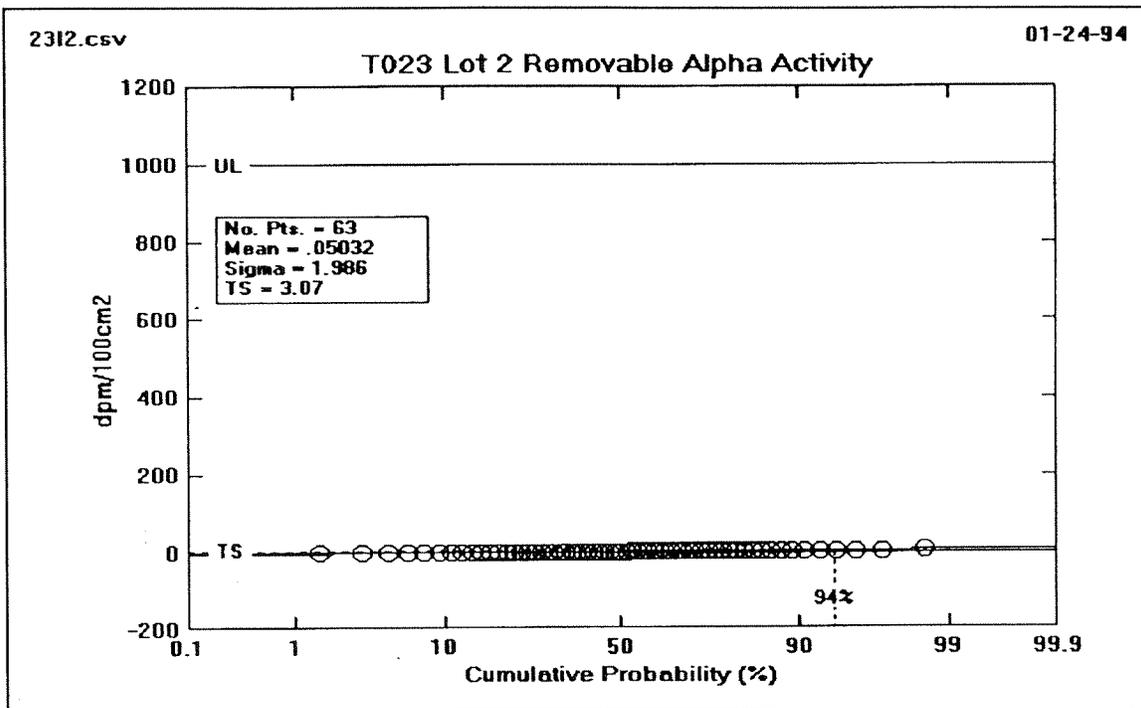


17a.) Scale including Acceptance Limit (UL)

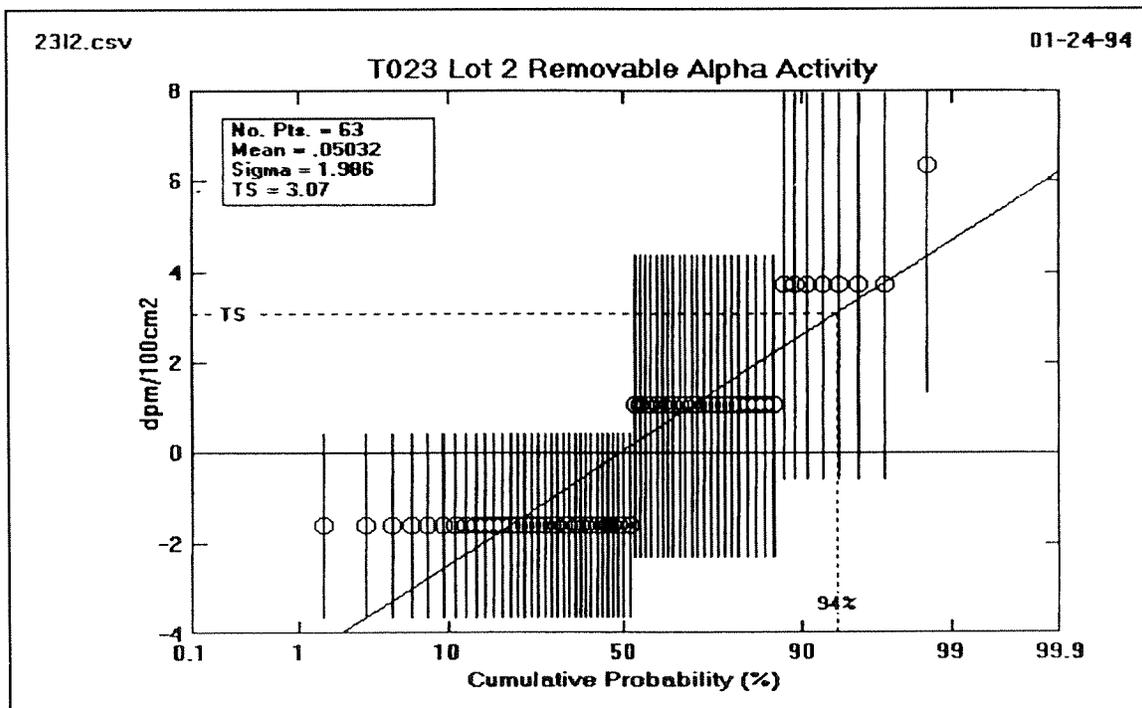


17b.) Expanded Scale

Figure 17: T023 - LOT 2 Removable Beta Activity

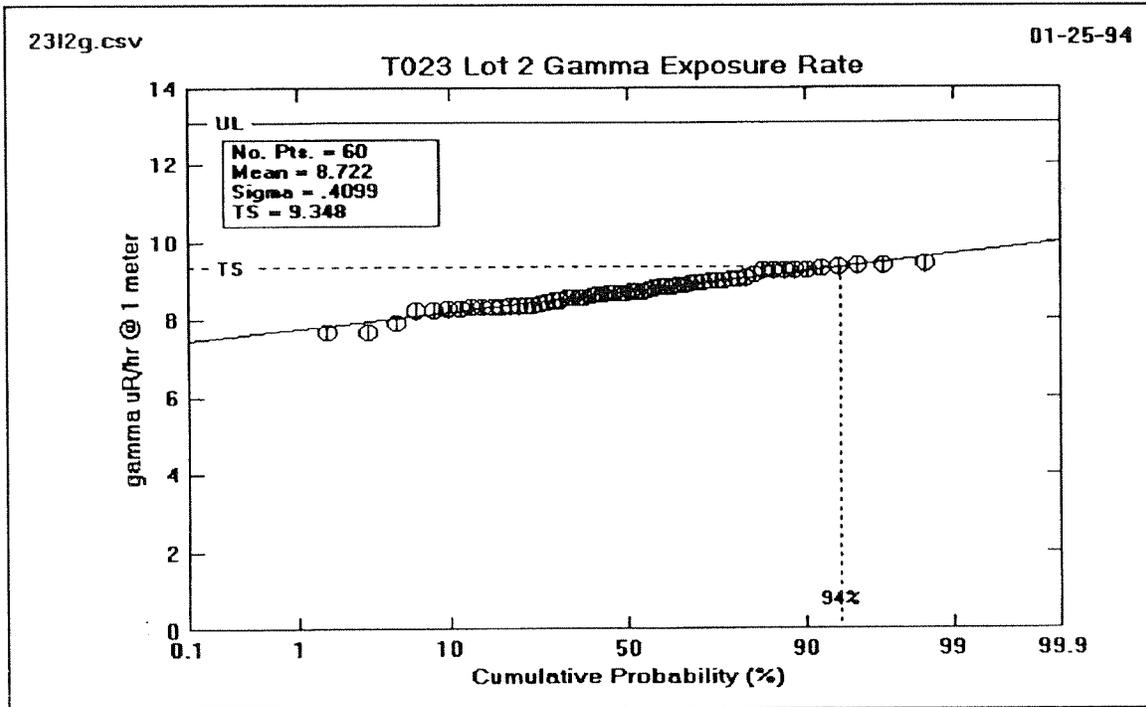


18a.) Scale including Acceptance Limit (UL)



18b.) Expanded Scale

Figure 18: T023 - LOT 2 Removable Alpha Activity



19) Scale including Acceptance Limit (UL)

Figure 19: T023 - LOT 2 Floors Ambient Gamma Exposure Rate

c) Interpretation of Results for Sample Lot 2

Figures 16 through 19 and Table 5 demonstrate that for each applicable acceptance limit (U) from Table 2, the corresponding test statistic (TS) value is less than the U or $TS < U$. Therefore, the four figures for Sample Lot 2 pass the "sampling inspection by variables" test and are "Accepted" as radiologically clean. Or in other words, the Building 023 Sample Lot 2 survey corresponds to assuring with a 90% confidence that 90% of Sample Lot 2 has residual contamination below 100% (a 90/90/100 test) of the applicable NRC, DOE, and State of California limits described in Table 2.

3. Sample Lot 3

a) Description

Sample Lot 3, located outside Building 023 in the northeast corner, contains the north overhang asphalt area where the fume hood exhausted and the radioactive liquid holdup tank pit and drain pipe excavations on the east side of the building (see Figure 6).

b) Analyses of Sample Lot 3 Data

Raw data measurements for Sample Lot 3 were taken, subtracted for daily instrument background (except for ambient gamma exposure rates) and plotted on a cumulative probability graph as explained previously. For statistical comparisons (using the "sampling inspection by variables" method), similar areas within Sample Lot 3 were combined together and then analyzed for the specific type of radiation measurement made on the surface. Individual raw measurement data and instrument backgrounds are provided in Appendix A.

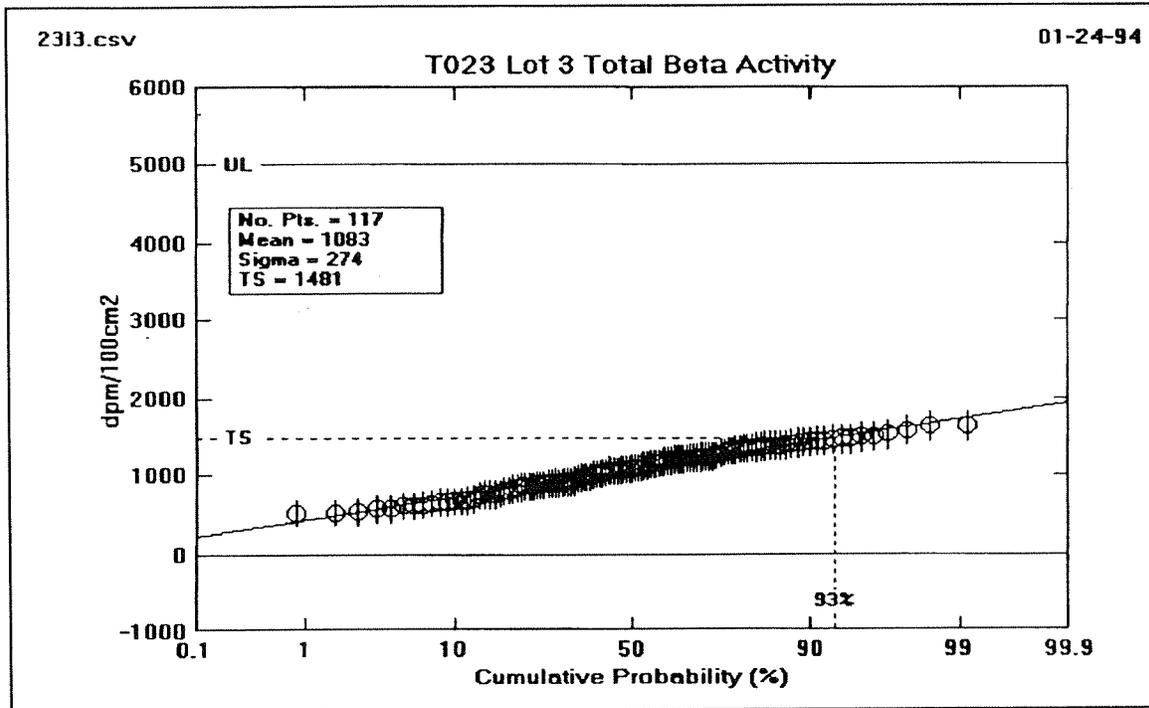
Sample lot 3 results are tabulated in Table 6 for comparing the test statistic ($TS = \bar{x} + ks$) with applicable, established contamination criteria or acceptance limit (U) from Table 2. The corresponding figures for the graphs of each calculated cumulative probability plot are also provided. Individual calculated sample results used as graph data for Sample Lot 3 are provided in Appendix B.

Table 6. Sample Lot 3 Results

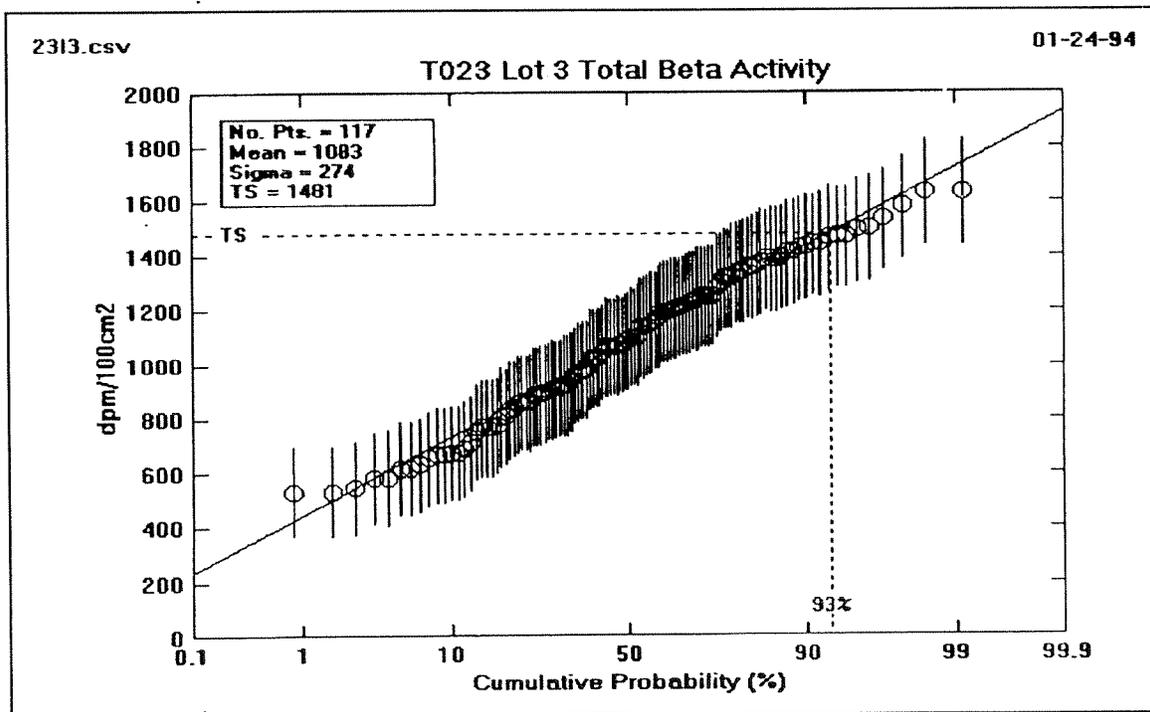
Calculated Test Statistic (TS = \bar{x} + ks)				
	Total	Removable		Ambient Gamma Exposure Rate
	Beta (dpm/100 cm ²)	Alpha (dpm/100 cm ²)	Beta (dpm/100 cm ²)	
Acceptance Limit (UL)	5000	1000	1000	20.27**
Floors only				14.97 (23)*
Entire area - floors, walls, ceiling, & structure	1481 (20)*	4.57 (22)*	12.68 (21)*	

* Numbers in parenthesis refer to figure numbers.

** The acceptance limit for exterior ambient gamma exposure rate in $\mu\text{R/hr}$ was determined by using the average ambient outdoor background exposure rate for 90 locations in SSFL Area I (15.27 $\mu\text{R/hr}$) from Reference 14 (page 83) and then adding the acceptance criteria from Table 3 (<5.27 $\mu\text{R/hr}$ above background) to achieve a final exterior ambient gamma exposure rate, in this table are subtracted for daily instrument background.

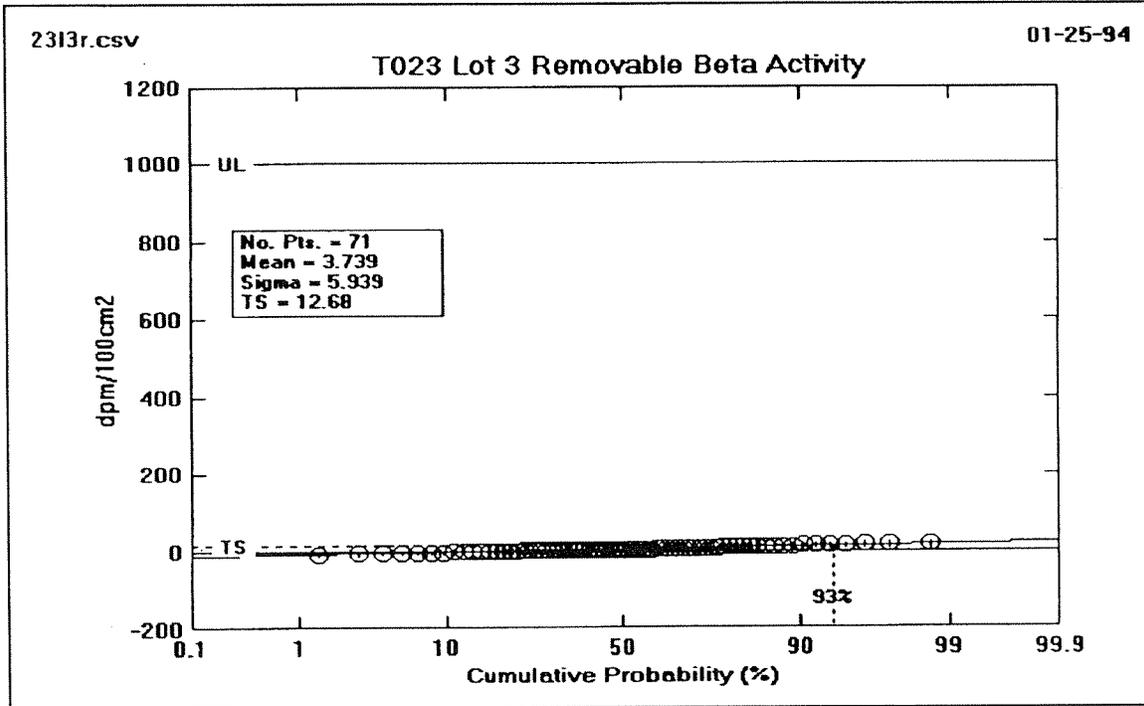


20a.) Scale including Acceptance Limit (UL)

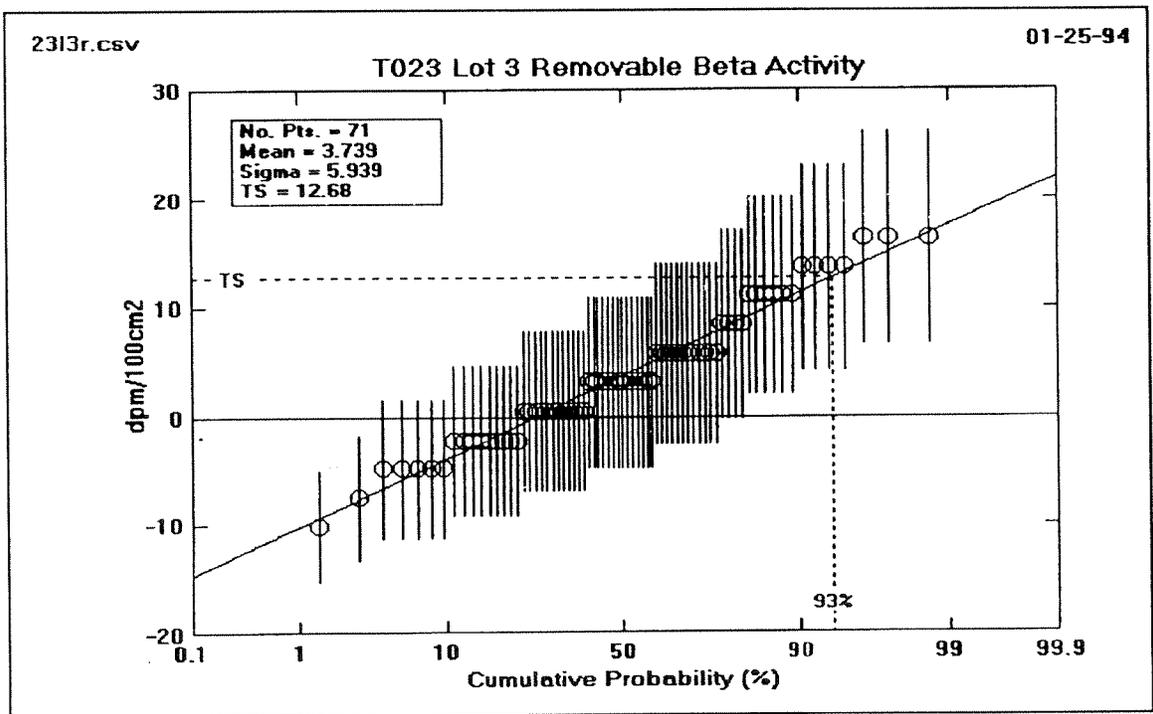


20b.) Expanded Scale

Figure 20: T023 - LOT 3 Total Beta Activity

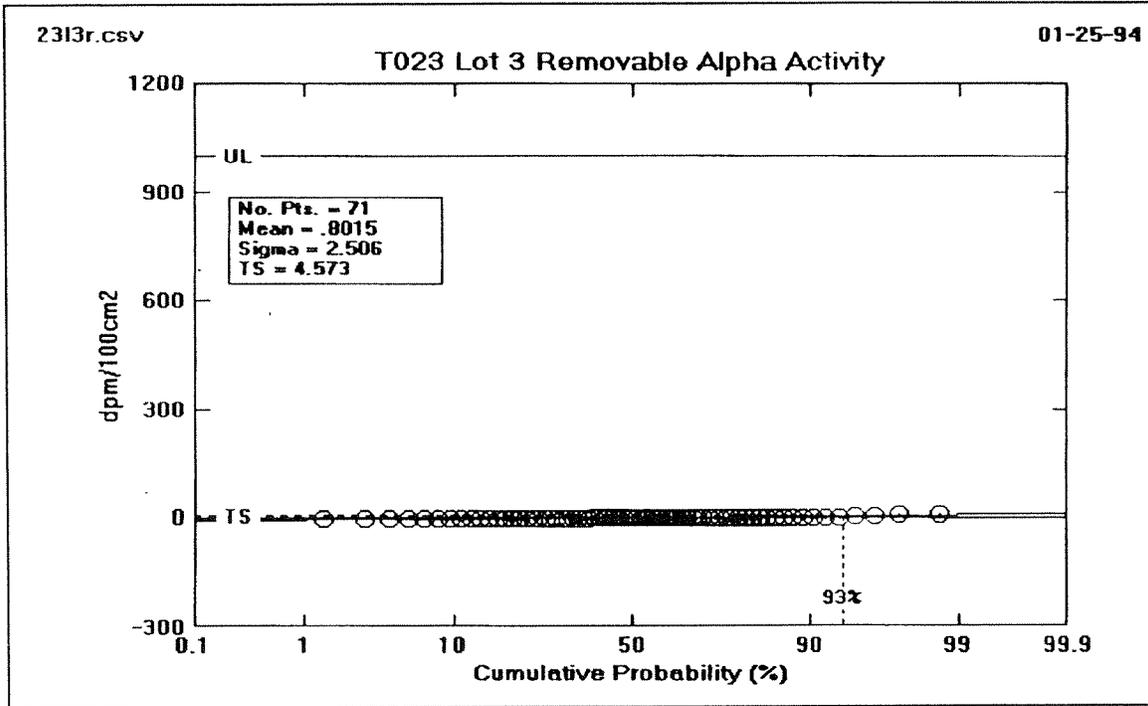


21a.) Scale including Acceptance Limit (UL)

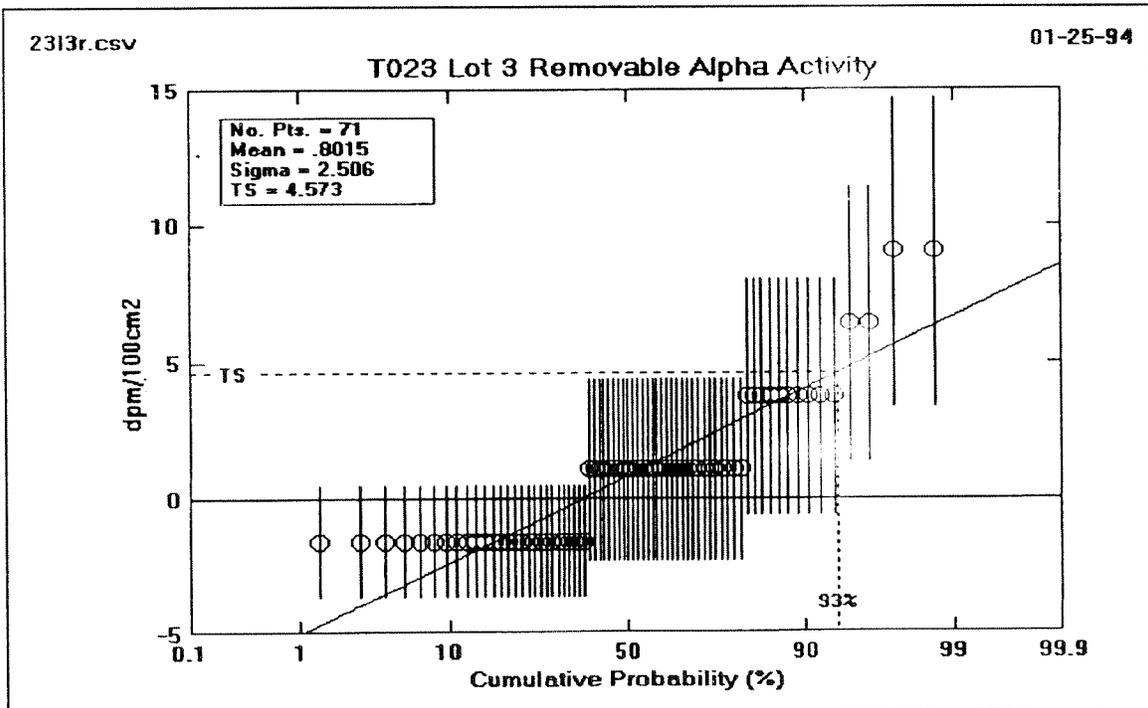


21b.) Expanded Scale

Figure 21: T023 - LOT 3 Removable Beta Activity

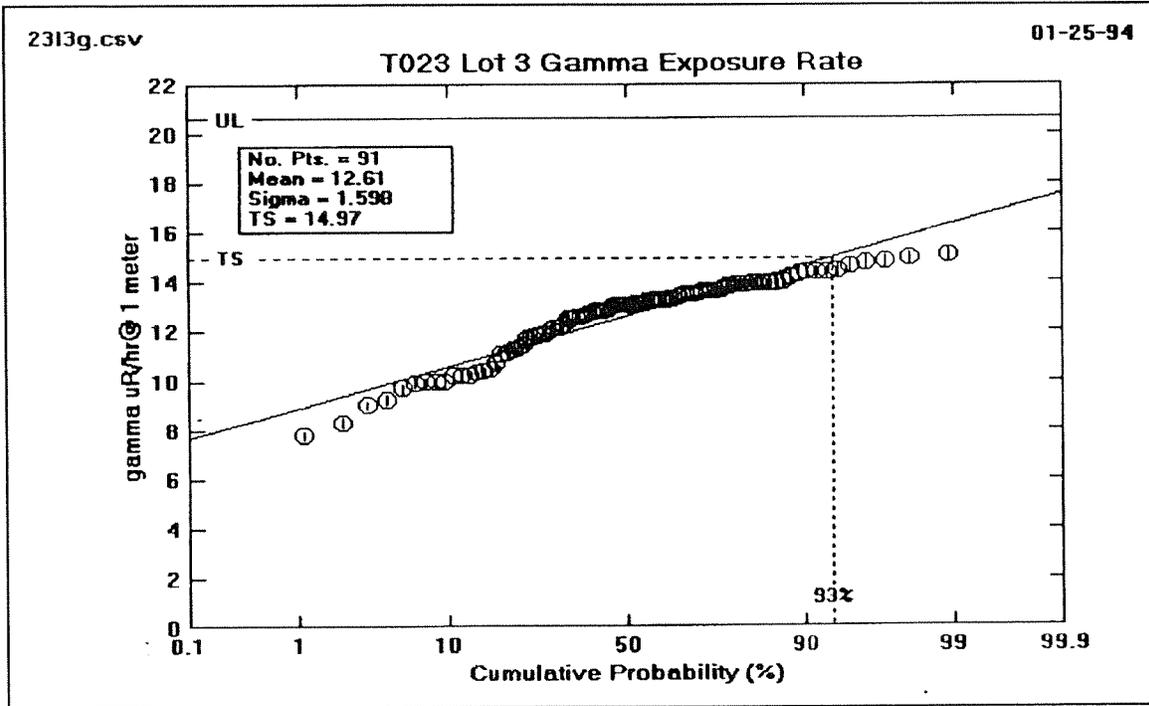


22a.) Scale including Acceptance Limit (UL)



22b.) Expanded Scale

Figure 22: T023 - LOT 3 Removable Alpha Activity



23) Scale including Acceptance Limit (UL)

Figure 23: T023 - LOT 3 Floors Ambient Gamma Exposure Rate

c) Interpretation of Results for Sample Lot 3

Figures 20 through 23 and Table 4 demonstrate that for each applicable acceptance limit (U) from Table 2, the corresponding test statistic (TS) value is less than the U or $TS < U$. Therefore, the four figures for Sample Lot 3 pass the "sampling inspection by variables" test and are "Accepted" as radiologically clean. Or in other words, the Building 023 Sample Lot 3 survey corresponds to assuring with a 90% confidence that 90% of Sample Lot 3 has residual contamination below 100% (a 90/90/100 test) of the applicable NRC, DOE, and State of California limits described in Table 2.

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APPENDIX A

Building 023

Sample Lots 1 through 3

Final Survey Data

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN	ALPHA						BETA						GAMMA		
		ALPHA			BETA				GAMMA	INSTRUMENT			SMEAR			INSTRUMENT			SMEAR			BACKG	EFACT
		TOTAL	MAX	REM	TOTAL	MAX	REM			TOTAL	BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	AFACT	BACKG	EFACT			
Floors - Rm 103	1,1			2	333		4	2079			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	1,2			0	323		9	2138			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	1,3			0	350		7	2008			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	1,4			0	361		5	2009			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	1,5			1	387		4	1948			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	1,6			0	390		3	1866			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	1,7			1	383		11	1678			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	2,1			0	359		13	1934			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	2,2			1	357		8	1981			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	2,3			3	367		10	2075			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103 (Pre- Decon)	2,4			1	493	2919	7	1823			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103 (Pre- Decon)	2,5			2	486	849	14	1866			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103 (Post Decon)	2,4				446						1.41			241.833	7.035	5					0.00465		
Floors - Rm 103 (Post Decon)	2,5				439						1.41			241.833	7.035	5					0.00465		
Floors - Rm 103	2,6			1	372		13	1760			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	2,7			0	363		10	1718			1.41	0.9	2.6261	233.444	7.652	5	2.7	2.6518			0.00465		
Floors - Rm 103	3,1			1	321		6	1809			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	3,2			0	359		4	1775			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	3,3			1	357		8	1773			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,2			0	355		4	1743			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,3			1	340		5	1592			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,4			0	346		7	1563			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,5			1	348		2	1628			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,6			0	340		6	1549			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,7			0	354		12	1628			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,1			1	345		10	1736			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,2			0	331		4	1771			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,3			1	347		7	1678			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,4			0	324		33	1689			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,5			2	379		2	1728			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,6			0	335		4	1589			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	5,7			0	309		5	1566			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	6,1			0	340		5	1673			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	6,2			1	366		6	1711			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	6,3			0	341		5	1642			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	6,4			1	361		11	1602			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	6,5			0	377		9	1623			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	6,6			1	381		8	1647			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	4,1			0	323		6	1720			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490			0.00465		
Floors - Rm 103	6,7			2	341		6	1657			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	7,1			0	333		5	1471			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		
Floors - Rm 103	7,2			1	317		6	1449			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518			0.00465		

023-ZR-0001
 Page 51
 03/01/94

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN	ALPHA						BETA						GAMMA		
		ALPHA			BETA				GAMMA	INSTRUMENT			SMEAR			INSTRUMENT			SMEAR			BACKG	EFACT
		TOTAL	MAX	REM	TOTAL	MAX	REM			BACKG	EFACT	AFACT	BACKG	EFACT	AFACT	BACKG	EFACT	AFACT	BACKG	EFACT			
Floors - Rm 103	7,6			1	358		9	1639			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518		0.00465			
Floors - Rm 103	7,7			0	327		6	1554			1.41	0.9	2.6261	238.111	7.711	5	2.7	2.6518		0.00465			
Floors - Rm 103	3,4			1	375		7	1872			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Floors - Rm 103 (Pre- Decon)	3,5			0	750	1301	19	1816			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Floors - Rm 103 (Pre- Decon)	3,6			1	851	2157	18	1736			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Floors - Rm 103 (Post Decon)	3,5				455						1.41			255.667	7.232	5				0.00465			
Floors - Rm 103 (Post Decon)	3,6				434						1.41			255.667	7.232	5				0.00465			
Floors - Rm 103	3,7			2	395		7	1798			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Floors - Rm 103	7,3			0	320		8	1640			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Floors - Rm 103	7,4			0	418		8	1731			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Floors - Rm 103	7,5			3	511		14	1753			1.41	0.6	2.6575	255.667	7.232	5	3.8	2.6490		0.00465			
Wall West - Rm 103	1,1			0	206		5				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	2,1			1	196		4				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	3,1			1	193		7				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	4,1			0	213		5				1.41	0.9	2.6261	255.667	7.232	5	2.7	2.6518		0.00465			
Wall West - Rm 103	5,1			0	195		6				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	6,1			0	190		4				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	7,1			1	175		5				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	1,2			1	206		4				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	2,2			0	191		4				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	3,2			0	193		6				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	4,2			0	183		6				1.41	0.9	2.6261	255.667	7.232	5	2.7	2.6518		0.00465			
Wall West - Rm 103	5,2			2	172		9				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	6,2			2	189		6				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	7,2			0	162		9				1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465			
Wall West - Rm 103	1,3			1	170		10				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall West - Rm 103	2,3			1	178		7				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall West - Rm 103	3,3			2	192		6				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall West - Rm 103	4,3			1	186		3				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall West - Rm 103	5,3			0	174		4				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall West - Rm 103	6,3			2	169		7				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall West - Rm 103	7,3			0	162		4				1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465			
Wall North - Rm 103	8,1			0	197		2				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	9,1			0	194		11				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	10,1			1	190		4				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	11,1			2	186		9				1.41	0.9	2.6261	255.667	7.232	5	2.7	2.6518		0.00465			
Wall North - Rm 103	12,1			0	264		20				1.41	0.9	2.6261	255.667	7.232	5	2.7	2.6518		0.00465			
Wall North - Rm 103	13,1			1	184		8				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	14,1			0	193		2				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	8,2			0	166		4				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	9,2			0	172		11				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			
Wall North - Rm 103	10,2			0	174		6				1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465			

023-ZR-0001
Page 52
03/01/94

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN	ALPHA				BETA				GAMMA		
		ALPHA			BETA				GAMMA	INSTRUMENT		SMEAR		INSTRUMENT		SMEAR		BACKG	EFACT
		TOTAL	MAX	REM	TOTAL	MAX	REM			BACKG	EFACT	AFACT	BACKG	EFACT	AFACT	BACKG	EFACT		
Wall North - Rm 103	11,2			1	192		7			1.41	0.9	2.6261	255.667	7.232	5	2.7	2.6518		0.00465
Wall North - Rm 103	12,2			1	222		15			1.41	0.9	2.6261	255.667	7.232	5	2.7	2.6518		0.00465
Wall North - Rm 103	13,2			2	166		6			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall North - Rm 103	14,2			2	180		7			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall North - Rm 103	8,3			0	189		3			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall North - Rm 103	9,3			0	202		4			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall North - Rm 103	10,3			1	190		3			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall North - Rm 103	11,3			0	173		4			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall North - Rm 103	12,3			0	180		9			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall North - Rm 103	13,3			1	169		28			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall North - Rm 103	14,3			2	163		6			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	8,1			1	216		9			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	9,1			1	204		6			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	10,1			1	202		5			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	11,1			1	226		13			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	12,1			1	238		1			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	13,1			0	230		6			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	14,1			2	227		2			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	15,1+2			1	243		4			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	8,2			0	192		5			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	9,2			0	202		7			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	10,2			1	215		3			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	11,2			0	212		5			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	12,2			1	215		7			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	13,2			0	217		11			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	14,2			0	214		5			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall South - Rm 103	8,3			0	200		8			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	9,3			1	197		1			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	10,3			0	205		6			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	11,3			0	203		4			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	12,3			1	224		7			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	13,3			1	231		5			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	14,3			0	220		10			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	15,3+4			0	216		5			1.41	0.9	2.6261	234.111	7.337	5	2.7	2.6518		0.00465
Wall South - Rm 103	8,4			0	218		6			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall South - Rm 103	9,4			5	211		7			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall South - Rm 103	10,4			0	200		6			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall South - Rm 103	11,4			1	205		7			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall South - Rm 103	12,4			0	201		1			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall South - Rm 103	13,4			0	193		7			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall South - Rm 103	14,4			3	235		3			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	1,1			0	222		9			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN			ALPHA			BETA			GAMMA		
		ALPHA			BETA			GAMMA TOTAL	INSTRUMENT		SMEAR	INSTRUMENT		SMEAR	GAMMA				
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT		AFACT	BACKG		EFACT	AFACT	BACKG	EFACT	
Wall East - Rm 103	2,1			0	211		10			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall East - Rm 103	3,1			0	229		7			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall East - Rm 103	4,1			0	220		5			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall East - Rm 103	5,1			1	231		6			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall East - Rm 103	6,1			0	227		6			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall East - Rm 103	7,1			0	237		3			1.41	0.9	2.6261	239.333	7.760	5	2.7	2.6518		0.00465
Wall East - Rm 103	1,2			3	162		8			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	2,2			2	194		2			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	3,2			1	209		5			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	4,2			1	202		10			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	5,2			1	189		7			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	6,2			0	193		6			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	7,2			0	188		14			1.41	0.9	2.6261	244.667	7.524	5	2.7	2.6518		0.00465
Wall East - Rm 103	1,3			0	188		7			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	2,3			0	177		3			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	3,3			1	222		7			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	4,3			0	198		13			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	5,3			1	203		8			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	6,3			0	232		10			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	7,3			0	215		8			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	1,4			3	215		4			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	2,4			2	206		7			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	3,4			0	183		9			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	4,4			0	204		5			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	5,4			1	206		15			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	6,4			0	218		4			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	7,4			1	201		5			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	1,5			0	178		8			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	2,5			0	195		2			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	3,5			0	200		9			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	4,5			0	223		11			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465
Wall East - Rm 103	5,5			1	221		9			1.41	0.9	2.6261	241.889	7.432	5	2.7	2.6518		0.00465

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES							IN 1 MIN			ALPHA			BETA			GAMMA		
		ALPHA			BETA			GAMMA	INSTRUMENT		SMEAR		INSTRUMENT		SMEAR		BACKG	EFACT		
		TOTAL	MAX	REM	TOTAL	MAX	REM		TOTAL	BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT			AFACT	BACKG
Floors - Rm 106	1,1			3	301		3	1839			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	2,1			0	237		2	1826			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	3,1			1	262		6	1795			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	4,1			0	271		4	1818			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	5,1			2	257		0	1793			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	6,1			1	259		3	1789			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	7,1			0	253		7	1796			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	8,1			1	273		10	1850			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	9,1			1	232		5	1708			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	1,2			1	292		11	1829			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	2,2			1	266		9	1928			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	3,2			0	264		6	1947			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	4,2			1	255		5	1947			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	5,2			0	291		6	1864			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	6,2			0	267		4	1868			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	7,2			0	253		5	1877			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	8,2			0	262		3	1778			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	9,2			0	257		3	1783			1.41	0.6	2.648	240.00	7.375	5	3.1	2.6553		0.00465
Floors - Rm 106	1,3			1	263		4	1800			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	2,3			0	256		7	2004			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	3,3			0	236		7	1993			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	4,3			1	254		2	2019			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	5,3			0	229		10	2000			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	6,3			0	271		2	2017			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	7,3			0	253		4	1790			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	1,4			0	273		4	1775			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	2,4			1	280		21	1938			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	3,4			0	246		9	1994			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	4,4			1	262		4	1950			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	5,4			0	272		5	1933			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	6,4			0	246		5	1939			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	7,4			0	285		5	1791			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	9,4			0	258		5	1652			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	1-2,5			1	274		7	1651			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	3,5			1	260		4	1993			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	4,5			0	257		8	2010			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	6,5			2	253		10	1865			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	7,5			0	254		9	1808			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465
Floors - Rm 106	9,5			0	254		3	1770			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES							IN 1 MIN					ALPHA					BETA					GAMMA	
		ALPHA			BETA			GAMMA TOTAL	INSTRUMENT			SMEAR		INSTRUMENT			SMEAR		BACKG	EFACT					
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	AFACT	BACKG	EFACT							
Floors - Rm 106	1,6			0	239		7	1800			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	2,6			0	264		7	1918			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	3,6			2	251		2	1907			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	4,6			1	261		4	1904			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	5,6			2	265		4	1876			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	6,6			1	258		4	1886			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	7,6			0	265		6	1875			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	9,6			2	269		5	1838			1.41	0.6	2.648	234.56	7.344	5	3.1	2.6553		0.00465					
Floors - Rm 106	1,7			1	255		6	1908			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	2,7			1	230		2	1859			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	3,7			2	257		3	1905			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	4,7			0	270		8	1929			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	5,7			2	280		8	1971			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	6,7			1	259		3	1844			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	9,7			1	265		6	1903			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	F-1			0	266		9	1871			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	F-2			0	257		4	2029			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	F-3			1	268		2	1993			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	1-5,8			0	259		6	1858			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	6-7,8			0	260		3	1895			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Floors - Rm 106	8-9,8			0	281		3	1845			1.41	0.6	2.648	235.78	7.375	5	3.1	2.6553		0.00465					
Wall North - Rm 106	1,1			1	188		9				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	1,2			1	215		1				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	1,3			0	197		5				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	2,3			3	213		2				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	3,3			0	238		4				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	4,2			0	223		8				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	4,3			2	228		6				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	5,2			2	221		6				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	5,3			1	220		4				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	6,1			0	245		3				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	6,2			0	226		7				1.41	0.6	2.648	236.89	7.510	5	3.1	2.6553		0.00465					
Wall North - Rm 106	6,3			0	187		8				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					
Wall North - Rm 106	7,1			0	209		5				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					
Wall North - Rm 106	7,2			1	162		11				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					
Wall North - Rm 106	7,3			1	213		4				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					
Wall North - Rm 106	8,1			0	245		4				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					
Wall North - Rm 106	8,2			1	227		2				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					
Wall North - Rm 106	8,3			0	197		5				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465					

01-Mar-94

BUILDING 023 - FINAL SURVEY DATA FOR LOT 2

Page 3 of 6

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN						ALPHA						BETA						GAMMA	
		ALPHA			BETA			GAMMA TOTAL	INSTRUMENT			SMEAR			INSTRUMENT			SMEAR			BACKG	EFACT					
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT	AFACT	BACKG	EFACT	AFACT	BACKG	EFACT	AFACT	BACKG	EFACT								
Wall North - Rm 106	9,1			0	223		8				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall North - Rm 106	9,2			0	241		5				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall North - Rm 106	9,3			1	201		0				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	10,1			0	196		20				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	10,2			0	261		5				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	10,3			0	193		1				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	11,1			0	218		2				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	11,2			0	212		3				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	11,3			1	202		5				1.41	0.6	2.648	241.00	7.413	5	3.1	2.6553		0.00465							
Wall East - Rm 106	12,1			1	194		10				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	12,2			1	220		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	12,3			0	243		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	13,1			2	202		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	13,2			1	194		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	13,3			0	210		8				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	14,1			0	217		26				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	14,2			0	198		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	14,3			0	200		4				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	15,1			1	187		1				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	15,2			0	192		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	15,3			0	210		7				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	16,1			3	217		4				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	16,2			0	215		4				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	16,3			1	206		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	17,1			2	163		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	17,2			1	200		12				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall East - Rm 106	17,3			1	174		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	18,1			3	185		7				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	18,2			0	217		9				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	18,3			1	189		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	19,1			0	211		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	19,2			0	207		8				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	19,3			0	207		8				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	20,1			1	257		6				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	20,2			1	243		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	20,3			0	193		6				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	21,1			0	178		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	21,2			0	240		4				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							
Wall South - Rm 106	21,3			0	222		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465							

T23L2DAT.WB1

023-ZR-0001
Page 57
03/01/94

01-Mar-94

BUILDING 023 - FINAL SURVEY DATA FOR LOT 2

Page 4 of 6

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN			ALPHA			BETA			GAMMA			
		ALPHA			BETA			GAMMA TOTAL	INSTRUMENT		SMEAR		INSTRUMENT		SMEAR		BACKG	EFACT		
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	BACKG			EFACT	
Wall South - Rm 106	22,1			1	223		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	22,2			1	241		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	22,3			4	203		1				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	23,1			0	212		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	23,2			0	196		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	23,3			0	178		2				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	24,1			1	234		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	24,2			0	232		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	24,3			0	247		6				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	25,1			3	247		17				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	25,2			1	211		10				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	25,3			0	197		3				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	26,1			0	221		5				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	26,2			2	232		7				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Wall South - Rm 106	26,3			0	214		8				1.41	0.6	2.648	244.67	7.196	5	3.1	2.6553		0.00465
Ceiling - Rm 106	1,1			3	237		4				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,2			0	237		8				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,3			0	287		5				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,4			1	268		6				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,5			0	272		0				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,6			0	264		10				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,7			1	216		5				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,8			1	218		7				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	1,9			1	238		2				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,1			0	242		9				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,2			3	275		2				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,3			0	258		6				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,4			1	232		2				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,5			0	260		5				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,6			1	265		3				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,7			1	248		2				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,8			1	264		5				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	2,9			0	271		3				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,1			0	277		6				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,2			1	260		3				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,3			1	286		6				1.41	0.6	2.657	241.22	7.000	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,4			0	284		3				1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,5			0	287		8				1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,6			0	283		4				1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465

T23L2DAT.WB1

023-ZR-0001
Page 58
03/01/94

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN			ALPHA			BETA			GAMMA		
		ALPHA			BETA			GAMMA	INSTRUMENT			SMEAR			INSTRUMENT		SMEAR		
		TOTAL	MAX	REM	TOTAL	MAX	REM		TOTAL	BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	AFACT	BACKG	EFACT
Ceiling - Rm 106	3,7			0	285		9			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,8			1	276		7			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	3,9			0	301		4			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,1			1	260		2			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,2			0	262		8			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,3			1	243		3			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,4			0	259		6			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,5			1	261		7			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,6			0	236		2			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,7			3	278		8			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,8			0	268		3			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	4,9			0	298		10			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,1			0	305		6			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,2			2	276		4			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,3			0	259		3			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,4			0	272		11			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,5			0	252		5			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,6			2	264		8			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,7			0	255		7			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,8			1	260		2			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	5,9			0	259		4			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,1			1	290		2			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,2			0	237		4			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,3			1	284		8			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,4			0	260		4			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,5			2	278		30			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,6			3	275		9			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,7			1	272		7			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,8			0	231		6			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	6,9			1	249		4			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,1			2	254		3			1.41	0.6	2.657	246.44	7.135	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,2			0	238		3			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,3			0	260		4			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,4			0	229		3			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,5			1	283		7			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,6			1	267		4			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,7			0	269		6			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,8			0	273		3			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	7,9			0	264		5			1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN			ALPHA			BETA			GAMMA			
		ALPHA			BETA			GAMMA TOTAL	INSTRUMENT		SMEAR		INSTRUMENT			SMEAR				
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT
Ceiling - Rm 106	8,1			0	277		1				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,2			0	245		4				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,3			0	278		3				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,4			1	284		6				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,5			1	290		3				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,6			1	221		3				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,7			3	291		5				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,8			1	238		3				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	8,9			1	231		3				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Cn-1			1	259		5				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Cn-2			0	283		6				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Cn-3			1	250		11				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Cn-4			2	256		2				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Cn-5			1	283		3				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Ce-1			1	255		9				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465
Ceiling - Rm 106	Ce-2			0	253		7				1.41	0.6	2.657	237.89	7.324	5	3.8	2.6490		0.00465

023-ZR-0001
Page 60
03/01/94

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES						IN 1 MIN			ALPHA			BETA			GAMMA			
		ALPHA			BETA			GAMMA	INSTRUMENT		SMEAR		INSTRUMENT		SMEAR		BACKG	EFACT		
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	BACKG			EFACT	
Outside - Ground (North)	9,2			2	421		8	2204			1.41	0.6	2.6575	255.556	7.216	5	3.8	2.6490		0.00465
Outside - Ground (North)	9,3			1	416		10	2713			1.41	0.6	2.6575	255.556	7.216	5	3.8	2.6490		0.00465
Outside - Ground (North)	9,4				397			2868			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	9,5				463			2928			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	10,1			0	398		2	2298			1.41	0.6	2.6575	255.556	7.216	5	3.8	2.6490		0.00465
Outside - Ground (North)	10,2			0	404		5	2523			1.41	0.6	2.6575	255.556	7.216	5	3.8	2.6490		0.00465
Outside - Ground (North)	10,3			1	429		2	2867			1.41	0.6	2.6575	255.556	7.216	5	3.8	2.6490		0.00465
Outside - Ground (North)	10,4				459			2917			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	10,5				445			3116			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	11,1				381			2597			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	11,2				400			2749			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	11,3				482			2826			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	11,4				423			2972			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	11,5				464			2993			1.41			255.556	7.216	5				0.00465
Outside - Ground (North)	12,1				403			2689			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	12,2				406			2760			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	12,3				408			2937			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	12,4				470			2937			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	12,5				442			2999			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	13,1				461			2825			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	13,2				461			2842			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	13,3				437			2997			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	13,4				439			3193			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	14,1				425			2887			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	14,2				397			3080			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	14,3				457			3052			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	15,1				449			2995			1.41			250.222	6.979	5				0.00465
Outside - Ground (North)	15,2				427			3011			1.41			250.222	6.979	5				0.00465
Outside - Ground (East)	1,1			1	404		8	2556			1.41	0.6	2.6575	250.222	6.979	5	3.8	2.6490		0.00465
Outside - Ground (East)	1,2			4	404		3	2643			1.41	0.6	2.6575	250.222	6.979	5	3.8	2.6490		0.00465
Outside - Ground (East)	1,3			0	417		4	2728			1.41	0.6	2.6575	250.222	6.979	5	3.8	2.6490		0.00465
Outside - Ground (East)	1,4			0	439		7	2856			1.41	0.6	2.6575	250.222	6.979	5	3.8	2.6490		0.00465
Outside - Ground (East)	2,1			0	424		5	2713			1.41	0.6	2.6575	250.222	6.979	5	3.8	2.6490		0.00465
Outside - Ground (East)	2,2			2	384		6	2933			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Ground (East)	2,3			0	457		4	2852			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Ground (East)	2,4			0	479		3	2904			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Ground (East)	3,1			0	411		7	2998			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Ground (East)	3,2			0	424		5	2820			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Ground (East)	3,3			4	406		5	2988			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Ground (East)	3,4			1	364		6	3090			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465
Outside - Pit Floor	1,1			1	432		4	3240			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465

SAMPLE NAME	GRID NAME	GROSS COUNTS IN 5 MINUTES							IN 1 MIN					ALPHA					BETA					GAMMA	
		ALPHA			BETA			GAMMA TOTAL	INSTRUMENT			SMEAR		INSTRUMENT			SMEAR		BACKG	EFACT					
		TOTAL	MAX	REM	TOTAL	MAX	REM		BACKG	EFACT	AFACT	BACKG	EFACT	BACKG	EFACT	AFACT	BACKG	EFACT							
Outside - Pit Floor	1,2			2	394		10	3096			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Floor	1,3			2	432		7	3182			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Floor	2,1			1	391		8	3220			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Floor	2,2			1	445		4	3090			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Floor	2,3			1	394		5	3151			1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Ground (Near Pit)	G-1				445			2141			1.41			250.222	6.979	5				0.00465					
Outside - Ground (Near Pit)	G-2				430			1989			1.41			250.222	6.979	5				0.00465					
Outside - Ground (Near Pit)	G-3				382			2143			1.41			250.222	6.979	5				0.00465					
Outside - Ground (Near Pit)	G-4				390			2233			1.41			250.222	6.979	5				0.00465					
Outside - Pit Wall West	1,1			1	383		6				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall West	1,2			1	356		6				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall West	2,1			1	353		6				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall West	2,2			2	350		5				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall West	3,1			0	351		3				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall West	3,2			0	343		4				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall North	4,1			2	364		6				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall North	4,2			0	351		4				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall North	5,1			0	382		5				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall North	5,2			1	333		8				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall East	6,1			1	350		4				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall East	6,2			1	348		9				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall East	7,1			1	362		6				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall East	7,2			1	345		4				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall East	8,1			1	365		3				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall East	8,2			2	343		5				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	9,1			1	338		3				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	9,2			1	364		8				1.41	0.6	2.6575	255.556	7.081	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	10,1			1	365		8				1.41	0.6	2.6575	243.667	7.096	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	10,2			1	319		2				1.41	0.6	2.6575	243.667	7.096	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	11,1			0	365		4				1.41	0.6	2.6575	243.667	7.096	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	11,2			2	358		3				1.41	0.6	2.6575	243.667	7.096	5	3.8	2.6490		0.00465					
Outside - Pit Wall South	12,1-2			1	362		6				1.41	0.6	2.6575	243.667	7.096	5	3.8	2.6490		0.00465					

023-ZR-0001
 Page 63
 03/01/94

APPENDIX B

Building 023

Sample Lots 1 through 3

Final Survey Results

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Floors - Rm 103	1,1	0.00	0.00			2.89	4.47	761.85	182.13			3.45	6.86	9.67	0.21
Floors - Rm 103	1,2	0.00	0.00			-2.36	2.49	685.32	180.52			16.71	9.07	9.94	0.22
Floors - Rm 103	1,3	0.00	0.00			-2.36	2.49	891.94	184.84			11.40	8.26	9.34	0.21
Floors - Rm 103	1,4	0.00	0.00			-2.36	2.49	976.12	186.58			6.10	7.36	9.34	0.21
Floors - Rm 103	1,5	0.00	0.00			0.26	3.62	1175.08	190.61			3.45	6.86	9.06	0.21
Floors - Rm 103	1,6	0.00	0.00			-2.36	2.49	1198.04	191.07			0.80	6.33	8.68	0.20
Floors - Rm 103	1,7	0.00	0.00			0.26	3.62	1144.47	190.00			22.01	9.82	7.80	0.19
Floors - Rm 103	2,1	0.00	0.00			-2.36	2.49	960.81	186.26			27.31	10.51	8.99	0.20
Floors - Rm 103	2,2	0.00	0.00			0.26	3.62	945.51	185.95			14.05	8.67	9.21	0.21
Floors - Rm 103	2,3	0.00	0.00			5.51	5.19	1022.03	187.52			19.36	9.45	9.65	0.21
Floors - Rm 103 (Pre- Decon)	2,4	0.00	0.00			0.26	3.62	1986.25	206.25	20551.21	429.66	11.40	8.26	8.48	0.20
Floors - Rm 103 (Pre- Decon)	2,5	0.00	0.00			2.89	4.47	1932.68	205.26	4710.54	251.77	29.97	10.84	8.68	0.20
Floors - Rm 103 (Post Decon)	2,4							1436.36	184.51						
Floors - Rm 103 (Post Decon)	2,5							1387.12	183.57						
Floors - Rm 103	2,6	0.00	0.00			0.26	3.62	1060.30	188.30			27.31	10.51	8.18	0.20
Floors - Rm 103	2,7	0.00	0.00			-2.36	2.49	991.42	186.89			19.36	9.45	7.99	0.19
Floors - Rm 103	3,1	0.00	0.00			0.26	3.62	639.12	182.32			8.75	7.82	8.41	0.20
Floors - Rm 103	3,2	0.00	0.00			-2.36	2.49	932.12	188.41			3.45	6.86	8.25	0.20
Floors - Rm 103	3,3	0.00	0.00			0.26	3.62	916.70	188.10			14.05	8.67	8.24	0.20
Floors - Rm 103	4,2	0.00	0.00			-2.36	2.49	901.27	187.78			3.45	6.86	8.10	0.19
Floors - Rm 103	4,3	0.00	0.00			0.26	3.62	785.62	185.39			6.10	7.36	7.40	0.19
Floors - Rm 103	4,4	0.00	0.00			-2.36	2.49	831.88	186.35			11.40	8.26	7.27	0.18
Floors - Rm 103	4,5	0.00	0.00			0.26	3.62	847.30	186.67			-1.86	5.75	7.57	0.19
Floors - Rm 103	4,6	0.00	0.00			-2.36	2.49	785.62	185.39			8.75	7.82	7.20	0.18
Floors - Rm 103	4,7	0.00	0.00			-2.36	2.49	893.56	187.62			24.66	10.17	7.57	0.19
Floors - Rm 103	5,1	0.00	0.00			0.26	3.62	824.17	186.19			19.36	9.45	8.07	0.19
Floors - Rm 103	5,2	0.00	0.00			-2.36	2.49	716.22	183.94			3.45	6.86	8.24	0.20
Floors - Rm 103	5,3	0.00	0.00			0.26	3.62	839.59	186.51			11.40	8.26	7.80	0.19
Floors - Rm 103	5,4	0.00	0.00			-2.36	2.49	662.25	182.81			80.35	15.84	7.85	0.19
Floors - Rm 103	5,5	0.00	0.00			2.89	4.47	1086.33	191.54			-1.86	5.75	8.04	0.19
Floors - Rm 103	5,6	0.00	0.00			-2.36	2.49	747.06	184.59			3.45	6.86	7.39	0.19
Floors - Rm 103	5,7	0.00	0.00			-2.36	2.49	546.59	180.35			6.10	7.36	7.28	0.18
Floors - Rm 103	6,1	0.00	0.00			-2.36	2.49	785.62	185.39			6.10	7.36	7.78	0.19
Floors - Rm 103	6,2	0.00	0.00			0.26	3.62	986.09	189.51			8.75	7.82	7.96	0.19
Floors - Rm 103	6,3	0.00	0.00			-2.36	2.49	793.33	185.55			6.10	7.36	7.64	0.19
Floors - Rm 103	6,4	0.00	0.00			0.26	3.62	947.54	188.73			22.01	9.82	7.45	0.19
Floors - Rm 103	6,5	0.00	0.00			-2.36	2.49	1070.91	191.23			16.71	9.07	7.55	0.19

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Floors - Rm 103	6,6	0.00	0.00			0.26	3.62	1101.75	191.85			14.05	8.67	7.66	0.19
Floors - Rm 103	4,1	0.00	0.00			-1.59	2.06	486.93	173.96			5.83	8.29	8.00	0.19
Floors - Rm 103	6,7	0.00	0.00			2.89	4.47	793.33	185.55			8.75	7.82	7.71	0.19
Floors - Rm 103	7,1	0.00	0.00			-2.36	2.49	731.64	184.27			6.10	7.36	6.84	0.18
Floors - Rm 103	7,2	0.00	0.00			0.26	3.62	608.27	181.67			8.75	7.82	6.74	0.18
Floors - Rm 103	7,6	0.00	0.00			0.26	3.62	924.41	188.26			16.71	9.07	7.62	0.19
Floors - Rm 103	7,7	0.00	0.00			-2.36	2.49	685.38	183.29			8.75	7.82	7.23	0.18
Floors - Rm 103	3,4	0.00	0.00			1.06	3.36	862.97	181.61			8.48	8.71	8.70	0.20
Floors - Rm 103 (Pre- Decon)	3,5	0.00	0.00			-1.59	2.06	3574.80	229.33	7559.39	285.32	40.26	12.65	8.44	0.20
Floors - Rm 103 (Pre- Decon)	3,6	0.00	0.00			1.06	3.36	4305.19	240.57	13749.61	355.21	37.62	12.37	8.07	0.19
Floors - Rm 103 (Post Decon)	3,5							1441.49	192.78						
Floors - Rm 103 (Post Decon)	3,6							1289.63	189.91						
Floors - Rm 103	3,7	0.00	0.00			3.72	4.29	1007.60	184.46			8.48	8.71	8.36	0.20
Floors - Rm 103	7,3	0.00	0.00			-1.59	2.06	465.23	173.51			11.13	9.10	7.63	0.19
Floors - Rm 103	7,4	0.00	0.00			-1.59	2.06	1173.92	187.70			11.13	9.10	8.05	0.19
Floors - Rm 103	7,5	0.00	0.00			6.38	5.04	1846.46	200.23			27.02	11.18	8.15	0.19
Wall West - Rm 103	1,1	0.00	0.00			-2.36	2.49	-258.68	163.77			6.10	7.36		
Wall West - Rm 103	2,1	0.00	0.00			0.26	3.62	-336.28	161.92			3.45	6.86		
Wall West - Rm 103	3,1	0.00	0.00			0.26	3.62	-359.57	161.36			11.40	8.26		
Wall West - Rm 103	4,1	0.00	0.00			-2.36	2.49	-308.55	156.55			6.10	7.36		
Wall West - Rm 103	5,1	0.00	0.00			-2.36	2.49	-344.04	161.73			8.75	7.82		
Wall West - Rm 103	6,1	0.00	0.00			-2.36	2.49	-382.85	160.80			3.45	6.86		
Wall West - Rm 103	7,1	0.00	0.00			0.26	3.62	-499.25	157.96			6.10	7.36		
Wall West - Rm 103	1,2	0.00	0.00			0.26	3.62	-258.68	163.77			3.45	6.86		
Wall West - Rm 103	2,2	0.00	0.00			-2.36	2.49	-375.09	160.99			3.45	6.86		
Wall West - Rm 103	3,2	0.00	0.00			-2.36	2.49	-359.57	161.36			8.75	7.82		
Wall West - Rm 103	4,2	0.00	0.00			-2.36	2.49	-525.49	151.46			8.75	7.82		
Wall West - Rm 103	5,2	0.00	0.00			2.89	4.47	-522.53	157.39			16.71	9.07		
Wall West - Rm 103	6,2	0.00	0.00			2.89	4.47	-390.61	160.61			8.75	7.82		
Wall West - Rm 103	7,2	0.00	0.00			-2.36	2.49	-600.14	155.47			16.71	9.07		
Wall West - Rm 103	1,3	0.00	0.00			0.26	3.62	-470.40	147.50			19.36	9.45		
Wall West - Rm 103	2,3	0.00	0.00			0.26	3.62	-411.70	148.95			11.40	8.26		
Wall West - Rm 103	3,3	0.00	0.00			2.89	4.47	-308.98	151.46			8.75	7.82		
Wall West - Rm 103	4,3	0.00	0.00			0.26	3.62	-353.01	150.39			0.80	6.33		
Wall West - Rm 103	5,3	0.00	0.00			-2.36	2.49	-441.05	148.23			3.45	6.86		
Wall West - Rm 103	6,3	0.00	0.00			2.89	4.47	-477.74	147.32			11.40	8.26		
Wall West - Rm 103	7,3	0.00	0.00			-2.36	2.49	-529.10	146.03			3.45	6.86		

023-ZR-0001
Page 66
03/01/94

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Wall North - Rm 103	8,1	0.00	0.00			-2.36	2.49	-358.66	158.13					-1.86	5.75
Wall North - Rm 103	9,1	0.00	0.00			-2.36	2.49	-381.24	157.59					22.01	9.82
Wall North - Rm 103	10,1	0.00	0.00			0.26	3.62	-411.34	156.87					3.45	6.86
Wall North - Rm 103	11,1	0.00	0.00			2.89	4.47	-503.80	151.98					16.71	9.07
Wall North - Rm 103	12,1	0.00	0.00			-2.36	2.49	60.26	164.85					45.88	12.63
Wall North - Rm 103	13,1	0.00	0.00			0.26	3.62	-456.48	155.79					14.05	8.67
Wall North - Rm 103	14,1	0.00	0.00			-2.36	2.49	-388.76	157.41					-1.86	5.75
Wall North - Rm 103	8,2	0.00	0.00			-2.36	2.49	-591.92	152.48					3.45	6.86
Wall North - Rm 103	9,2	0.00	0.00			-2.36	2.49	-546.78	153.59					22.01	9.82
Wall North - Rm 103	10,2	0.00	0.00			-2.36	2.49	-531.73	153.96					8.75	7.82
Wall North - Rm 103	11,2	0.00	0.00			0.26	3.62	-460.41	153.01					11.40	8.26
Wall North - Rm 103	12,2	0.00	0.00			0.26	3.62	-243.46	158.05					32.62	11.16
Wall North - Rm 103	13,2	0.00	0.00			2.89	4.47	-591.92	152.48					8.75	7.82
Wall North - Rm 103	14,2	0.00	0.00			2.89	4.47	-486.58	155.06					11.40	8.26
Wall North - Rm 103	8,3	0.00	0.00			-2.36	2.49	-330.99	150.93					0.80	6.33
Wall North - Rm 103	9,3	0.00	0.00			-2.36	2.49	-235.61	153.23					3.45	6.86
Wall North - Rm 103	10,3	0.00	0.00			0.26	3.62	-323.66	151.10					0.80	6.33
Wall North - Rm 103	11,3	0.00	0.00			-2.36	2.49	-448.39	148.04					3.45	6.86
Wall North - Rm 103	12,3	0.00	0.00			-2.36	2.49	-397.03	149.31					16.71	9.07
Wall North - Rm 103	13,3	0.00	0.00			0.26	3.62	-477.74	147.32					67.09	14.69
Wall North - Rm 103	14,3	0.00	0.00			2.89	4.47	-521.76	146.22					8.75	7.82
Wall South - Rm 103	8,1	0.00	0.00			0.26	3.62	-181.08	165.60					16.71	9.07
Wall South - Rm 103	9,1	0.00	0.00			0.26	3.62	-274.20	163.40					8.75	7.82
Wall South - Rm 103	10,1	0.00	0.00			0.26	3.62	-289.72	163.03					6.10	7.36
Wall South - Rm 103	11,1	0.00	0.00			0.26	3.62	-103.47	167.40					27.31	10.51
Wall South - Rm 103	12,1	0.00	0.00			0.26	3.62	-10.35	169.55					-4.51	5.10
Wall South - Rm 103	13,1	0.00	0.00			-2.36	2.49	-72.43	168.12					8.75	7.82
Wall South - Rm 103	14,1	0.00	0.00			2.89	4.47	-95.71	167.58					-1.86	5.75
Wall South - Rm 103	15,1+2	0.00	0.00			0.26	3.62	28.45	170.43					3.45	6.86
Wall South - Rm 103	8,2	0.00	0.00			-2.36	2.49	-367.33	161.17					6.10	7.36
Wall South - Rm 103	9,2	0.00	0.00			-2.36	2.49	-289.72	163.03					11.40	8.26
Wall South - Rm 103	10,2	0.00	0.00			0.26	3.62	-188.84	165.41					0.80	6.33
Wall South - Rm 103	11,2	0.00	0.00			-2.36	2.49	-212.12	164.87					6.10	7.36
Wall South - Rm 103	12,2	0.00	0.00			0.26	3.62	-188.84	165.41					11.40	8.26
Wall South - Rm 103	13,2	0.00	0.00			-2.36	2.49	-173.32	165.78					22.01	9.82
Wall South - Rm 103	14,2	0.00	0.00			-2.36	2.49	-196.60	165.23					6.10	7.36
Wall South - Rm 103	8,3	0.00	0.00			-2.36	2.49	-250.28	152.88					14.05	8.67

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)			
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV		
Wall South - Rm 103	9,3	0.00	0.00			0.26	3.62	-272.30	152.35					-4.51	5.10		
Wall South - Rm 103	10,3	0.00	0.00			-2.36	2.49	-213.60	153.75					8.75	7.82		
Wall South - Rm 103	11,3	0.00	0.00			-2.36	2.49	-228.27	153.40					3.45	6.86		
Wall South - Rm 103	12,3	0.00	0.00			0.26	3.62	-74.19	157.04					11.40	8.26		
Wall South - Rm 103	13,3	0.00	0.00			0.26	3.62	-22.83	158.24					6.10	7.36		
Wall South - Rm 103	14,3	0.00	0.00			-2.36	2.49	-103.54	156.36					19.36	9.45		
Wall South - Rm 103	15,3+4	0.00	0.00			-2.36	2.49	-132.89	155.67					6.10	7.36		
Wall South - Rm 103	8,4	0.00	0.00			-2.36	2.49	-177.55	159.39					8.75	7.82		
Wall South - Rm 103	9,4	0.00	0.00			10.77	6.38	-229.58	158.17					11.40	8.26		
Wall South - Rm 103	10,4	0.00	0.00			-2.36	2.49	-311.34	156.24					8.75	7.82		
Wall South - Rm 103	11,4	0.00	0.00			0.26	3.62	-274.18	157.12					11.40	8.26		
Wall South - Rm 103	12,4	0.00	0.00			-2.36	2.49	-303.91	156.42					-4.51	5.10		
Wall South - Rm 103	13,4	0.00	0.00			-2.36	2.49	-363.37	155.00					11.40	8.26		
Wall South - Rm 103	14,4	0.00	0.00			5.51	5.19	-51.20	162.31					0.80	6.33		
Wall East - Rm 103	1,1	0.00	0.00			-2.36	2.49	-134.51	166.68					16.71	9.07		
Wall East - Rm 103	2,1	0.00	0.00			-2.36	2.49	-219.88	164.68					19.36	9.45		
Wall East - Rm 103	3,1	0.00	0.00			-2.36	2.49	-80.19	167.94					11.40	8.26		
Wall East - Rm 103	4,1	0.00	0.00			-2.36	2.49	-150.03	166.32					6.10	7.36		
Wall East - Rm 103	5,1	0.00	0.00			0.26	3.62	-64.67	168.30					8.75	7.82		
Wall East - Rm 103	6,1	0.00	0.00			-2.36	2.49	-95.71	167.58					8.75	7.82		
Wall East - Rm 103	7,1	0.00	0.00			-2.36	2.49	-18.11	169.37					0.80	6.33		
Wall East - Rm 103	1,2	0.00	0.00			5.51	5.19	-622.02	151.74					14.05	8.67		
Wall East - Rm 103	2,2	0.00	0.00			2.89	4.47	-381.24	157.59					-1.86	5.75		
Wall East - Rm 103	3,2	0.00	0.00			0.26	3.62	-268.37	160.27					6.10	7.36		
Wall East - Rm 103	4,2	0.00	0.00			0.26	3.62	-321.04	159.03					19.36	9.45		
Wall East - Rm 103	5,2	0.00	0.00			0.26	3.62	-418.86	156.69					11.40	8.26		
Wall East - Rm 103	6,2	0.00	0.00			-2.36	2.49	-388.76	157.41					8.75	7.82		
Wall East - Rm 103	7,2	0.00	0.00			-2.36	2.49	-426.38	156.51					29.97	10.84		
Wall East - Rm 103	1,3	0.00	0.00			-2.36	2.49	-400.53	154.10					11.40	8.26		
Wall East - Rm 103	2,3	0.00	0.00			-2.36	2.49	-482.29	152.12					0.80	6.33		
Wall East - Rm 103	3,3	0.00	0.00			0.26	3.62	-147.82	160.08					11.40	8.26		
Wall East - Rm 103	4,3	0.00	0.00			-2.36	2.49	-326.20	155.89					27.31	10.51		
Wall East - Rm 103	5,3	0.00	0.00			0.26	3.62	-289.04	156.77					14.05	8.67		
Wall East - Rm 103	6,3	0.00	0.00			-2.36	2.49	-73.50	161.80					19.36	9.45		
Wall East - Rm 103	7,3	0.00	0.00			-2.36	2.49	-199.85	158.87					14.05	8.67		
Wall East - Rm 103	1,4	0.00	0.00			5.51	5.19	-199.85	158.87					3.45	6.86		
Wall East - Rm 103	2,4	0.00	0.00			2.89	4.47	-266.74	157.30					11.40	8.26		

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Wall East - Rm 103	3,4	0.00	0.00			-2.36	2.49	-437.69	153.20			16.71	9.07		
Wall East - Rm 103	4,4	0.00	0.00			-2.36	2.49	-281.61	156.94			6.10	7.36		
Wall East - Rm 103	5,4	0.00	0.00			0.26	3.62	-266.74	157.30			32.62	11.16		
Wall East - Rm 103	6,4	0.00	0.00			-2.36	2.49	-177.55	159.39			3.45	6.86		
Wall East - Rm 103	7,4	0.00	0.00			0.26	3.62	-303.91	156.42			6.10	7.36		
Wall East - Rm 103	1,5	0.00	0.00			-2.36	2.49	-474.85	152.30			14.05	8.67		
Wall East - Rm 103	2,5	0.00	0.00			-2.36	2.49	-348.50	155.35			-1.86	5.75		
Wall East - Rm 103	3,5	0.00	0.00			-2.36	2.49	-311.34	156.24			16.71	9.07		
Wall East - Rm 103	4,5	0.00	0.00			-2.36	2.49	-140.39	160.25			22.01	9.82		
Wall East - Rm 103	5,5	0.00	0.00			0.26	3.62	-155.26	159.91			16.71	9.07		
Maximum:		0.00	0.00	0.00	0.00	10.77	6.38	4305.19	240.57	20551.21	429.66	80.35	15.84	9.94	0.22
Minimum:		0.00	0.00	0.00	0.00	-2.36	0.00	-622.02	0.00	1289.63	183.57	-4.51	5.10	6.74	0.18
Average:		0.00	0.00	0.00	0.00	-0.53	3.09	127.85	163.54	6515.67	259.09	11.70	8.19	8.11	0.19

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Floors - Rm 106	1,1					6.35	5.02	449.90	171.55			-0.27	6.56	8.55	0.20
Floors - Rm 106	2,1					-1.59	2.05	-22.13	161.08			-2.92	6.00	8.49	0.20
Floors - Rm 106	3,1					1.06	3.35	162.26	165.25			7.70	8.01	8.35	0.20
Floors - Rm 106	4,1					-1.59	2.05	228.64	166.72			2.39	7.08	8.45	0.20
Floors - Rm 106	5,1					3.71	4.27	125.38	164.42			-8.23	4.68	8.34	0.20
Floors - Rm 106	6,1					1.06	3.35	140.13	164.75			-0.27	6.56	8.32	0.20
Floors - Rm 106	7,1					-1.59	2.05	95.88	163.76			10.36	8.44	8.35	0.20
Floors - Rm 106	8,1					1.06	3.35	243.39	167.05			18.32	9.61	8.60	0.20
Floors - Rm 106	9,1					1.06	3.35	-59.00	160.23			5.05	7.56	7.94	0.19
Floors - Rm 106	1,2					1.06	3.35	383.52	170.11			20.98	9.97	8.50	0.20
Floors - Rm 106	2,2					1.06	3.35	191.76	165.90			15.67	9.24	8.97	0.20
Floors - Rm 106	3,2					-1.59	2.05	216.24	163.98			7.70	8.01	9.05	0.21
Floors - Rm 106	4,2					1.06	3.35	150.14	162.49			5.05	7.56	9.05	0.21
Floors - Rm 106	5,2					-1.59	2.05	414.53	168.36			7.70	8.01	8.67	0.20
Floors - Rm 106	6,2					-1.59	2.05	238.27	164.47			2.39	7.08	8.69	0.20
Floors - Rm 106	7,2					-1.59	2.05	135.46	162.16			5.05	7.56	8.73	0.20
Floors - Rm 106	8,2					-1.59	2.05	162.26	165.25			-0.27	6.56	8.27	0.20
Floors - Rm 106	9,2					-1.59	2.05	125.38	164.42			-0.27	6.56	8.29	0.20
Floors - Rm 106	1,3					1.06	3.35	208.90	163.81			2.39	7.08	8.37	0.20
Floors - Rm 106	2,3					-1.59	2.05	157.49	162.66			10.36	8.44	9.32	0.21
Floors - Rm 106	3,3					-1.59	2.05	10.61	159.31			10.36	8.44	9.27	0.21
Floors - Rm 106	4,3					1.06	3.35	142.80	162.33			-2.92	6.00	9.39	0.21
Floors - Rm 106	5,3					-1.59	2.05	-40.80	158.12			18.32	9.61	9.30	0.21
Floors - Rm 106	6,3					-1.59	2.05	267.65	165.13			-2.92	6.00	9.38	0.21
Floors - Rm 106	7,3					-1.59	2.05	135.46	162.16			2.39	7.08	8.32	0.20
Floors - Rm 106	1,4					-1.59	2.05	282.33	165.45			2.39	7.08	8.25	0.20
Floors - Rm 106	2,4					1.06	3.35	333.74	166.59			47.53	13.04	9.01	0.20
Floors - Rm 106	3,4					-1.59	2.05	84.05	160.99			15.67	9.24	9.27	0.21
Floors - Rm 106	4,4					1.06	3.35	201.55	163.65			2.39	7.08	9.07	0.21
Floors - Rm 106	5,4					-1.59	2.05	274.99	165.29			5.05	7.56	8.99	0.20
Floors - Rm 106	6,4					-1.59	2.05	84.05	160.99			5.05	7.56	9.02	0.20
Floors - Rm 106	7,4					-1.59	2.05	370.46	167.40			5.05	7.56	8.33	0.20
Floors - Rm 106	9,4					-1.59	2.05	172.18	162.99			5.05	7.56	7.68	0.19
Floors - Rm 106	1-2,5					1.06	3.35	289.68	165.62			10.36	8.44	7.68	0.19
Floors - Rm 106	3,5					1.06	3.35	186.86	163.32			2.39	7.08	9.27	0.21

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Floors - Rm 106	4,5					-1.59	2.05	164.83	162.82			13.01	8.85	9.35	0.21
Floors - Rm 106	6,5					3.71	4.27	135.46	162.16			18.32	9.61	8.67	0.20
Floors - Rm 106	7,5					-1.59	2.05	142.80	162.33			15.67	9.24	8.41	0.20
Floors - Rm 106	9,5					-1.59	2.05	142.80	162.33			-0.27	6.56	8.23	0.20
Floors - Rm 106	1,6					-1.59	2.05	32.64	159.81			10.36	8.44	8.37	0.20
Floors - Rm 106	2,6					-1.59	2.05	216.24	163.98			10.36	8.44	8.92	0.20
Floors - Rm 106	3,6					3.71	4.27	120.77	161.83			-2.92	6.00	8.87	0.20
Floors - Rm 106	4,6					1.06	3.35	194.21	163.48			2.39	7.08	8.85	0.20
Floors - Rm 106	5,6					3.71	4.27	223.58	164.14			2.39	7.08	8.72	0.20
Floors - Rm 106	6,6					1.06	3.35	172.18	162.99			2.39	7.08	8.77	0.20
Floors - Rm 106	7,6					-1.59	2.05	223.58	164.14			7.70	8.01	8.72	0.20
Floors - Rm 106	9,6					3.71	4.27	252.96	164.80			5.05	7.56	8.55	0.20
Floors - Rm 106	1,7					1.06	3.35	141.77	163.39			7.70	8.01	8.87	0.20
Floors - Rm 106	2,7					1.06	3.35	-42.61	159.17			-2.92	6.00	8.64	0.20
Floors - Rm 106	3,7					3.71	4.27	156.52	163.72			-0.27	6.56	8.86	0.20
Floors - Rm 106	4,7					-1.59	2.05	252.40	165.87			13.01	8.85	8.97	0.20
Floors - Rm 106	5,7					3.71	4.27	326.15	167.50			13.01	8.85	9.17	0.21
Floors - Rm 106	6,7					1.06	3.35	171.27	164.05			-0.27	6.56	8.57	0.20
Floors - Rm 106	9,7					1.06	3.35	215.52	165.05			7.70	8.01	8.85	0.20
Floors - Rm 106	F-1					-1.59	2.05	222.90	165.21			15.67	9.24	8.70	0.20
Floors - Rm 106	F-2					-1.59	2.05	156.52	163.72			2.39	7.08	9.43	0.21
Floors - Rm 106	F-3					1.06	3.35	237.65	165.54			-2.92	6.00	9.27	0.21
Floors - Rm 106	1-5,8					-1.59	2.05	171.27	164.05			7.70	8.01	8.64	0.20
Floors - Rm 106	6-7,8					-1.59	2.05	178.65	164.22			-0.27	6.56	8.81	0.20
Floors - Rm 106	8-9,8					-1.59	2.05	333.53	167.66			-0.27	6.56	8.58	0.20
Wall North - Rm 106	1,1					1.06	3.35	-367.17	154.81			15.67	9.24		
Wall North - Rm 106	1,2					1.06	3.35	-164.39	159.65			-5.58	5.38		
Wall North - Rm 106	1,3					-1.59	2.05	-299.58	156.44			5.05	7.56		
Wall North - Rm 106	2,3					6.35	5.02	-179.41	159.30			-2.92	6.00		
Wall North - Rm 106	3,3					-1.59	2.05	8.34	163.66			2.39	7.08		
Wall North - Rm 106	4,2					-1.59	2.05	-104.31	161.06			13.01	8.85		
Wall North - Rm 106	4,3					3.71	4.27	-66.76	161.93			7.70	8.01		
Wall North - Rm 106	5,2					3.71	4.27	-119.33	160.71			7.70	8.01		
Wall North - Rm 106	5,3					1.06	3.35	-126.84	160.53			2.39	7.08		
Wall North - Rm 106	6,1					-1.59	2.05	60.92	164.87			-0.27	6.56		

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)					BETA (DPM/100CM2)					GAMMA (uR/hr)			
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Wall North - Rm 106	6,2					-1.59	2.05	-81.78	161.58				10.36	8.44	
Wall North - Rm 106	6,3					-1.59	2.05	-400.33	153.37				13.01	8.85	
Wall North - Rm 106	7,1					-1.59	2.05	-237.23	157.26				5.05	7.56	
Wall North - Rm 106	7,2					1.06	3.35	-585.66	148.82				20.98	9.97	
Wall North - Rm 106	7,3					1.06	3.35	-207.58	157.96				2.39	7.08	
Wall North - Rm 106	8,1					-1.59	2.05	29.65	163.43				2.39	7.08	
Wall North - Rm 106	8,2					1.06	3.35	-103.79	160.38				-2.92	6.00	
Wall North - Rm 106	8,3					-1.59	2.05	-326.19	155.15				5.05	7.56	
Wall North - Rm 106	9,1					-1.59	2.05	-133.44	159.69				13.01	8.85	
Wall North - Rm 106	9,2					-1.59	2.05	0.00	162.76				5.05	7.56	
Wall North - Rm 106	9,3					1.06	3.35	-296.54	155.86				-8.23	4.68	
Wall East - Rm 106	10,1					-1.59	2.05	-333.61	154.98				44.88	12.76	
Wall East - Rm 106	10,2					-1.59	2.05	148.27	166.10				5.05	7.56	
Wall East - Rm 106	10,3					-1.59	2.05	-355.85	154.44				-5.58	5.38	
Wall East - Rm 106	11,1					-1.59	2.05	-170.51	158.83				-2.92	6.00	
Wall East - Rm 106	11,2					1.06	3.35	-214.99	157.79				-0.27	6.56	
Wall East - Rm 106	11,3					1.06	3.35	-289.12	156.04				5.05	7.56	
Wall East - Rm 106	12,1					1.06	3.35	-364.60	150.72				18.32	9.61	
Wall East - Rm 106	12,2					-1.59	2.05	-177.50	155.12				5.05	7.56	
Wall East - Rm 106	12,3					3.71	4.27	-11.99	158.91				-0.27	6.56	
Wall East - Rm 106	13,1					1.06	3.35	-307.03	152.08				5.05	7.56	
Wall East - Rm 106	13,2					-1.59	2.05	-364.60	150.72				-2.92	6.00	
Wall East - Rm 106	13,3					-1.59	2.05	-249.46	153.44				13.01	8.85	
Wall East - Rm 106	14,1					-1.59	2.05	-199.09	154.62				60.81	14.32	
Wall East - Rm 106	14,2					-1.59	2.05	-335.81	151.40				5.05	7.56	
Wall East - Rm 106	14,3					1.06	3.35	-321.42	151.74				2.39	7.08	
Wall East - Rm 106	15,1					-1.59	2.05	-414.97	149.51				-5.58	5.38	
Wall East - Rm 106	15,2					-1.59	2.05	-378.99	150.37				5.05	7.56	
Wall East - Rm 106	15,3					6.35	5.02	-249.46	153.44				10.36	8.44	
Wall East - Rm 106	16,1					-1.59	2.05	-199.09	154.62				2.39	7.08	
Wall East - Rm 106	16,2					-1.59	2.05	-213.48	154.28				2.39	7.08	
Wall East - Rm 106	16,3					1.06	3.35	-278.24	152.76				-2.92	6.00	
Wall East - Rm 106	17,1					3.71	4.27	-587.67	145.29				5.05	7.56	
Wall East - Rm 106	17,2					1.06	3.35	-321.42	151.74				23.63	10.32	
Wall East - Rm 106	17,3					1.06	3.35	-508.52	147.24				-0.27	6.56	

023-ZR-0001
 Page 72
 03/01/94

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Wall South - Rm 106	18,1					6.35	5.02	-429.36	149.16			10.36	8.44		
Wall South - Rm 106	18,2					-1.59	2.05	-199.09	154.62			15.67	9.24		
Wall South - Rm 106	18,3					1.06	3.35	-400.58	149.85			5.05	7.56		
Wall South - Rm 106	19,1					-1.59	2.05	-242.26	153.61			-2.92	6.00		
Wall South - Rm 106	19,2					-1.59	2.05	-271.05	152.93			13.01	8.85		
Wall South - Rm 106	19,3					-1.59	2.05	-271.05	152.93			13.01	8.85		
Wall South - Rm 106	20,1					1.06	3.35	88.75	161.17			7.70	8.01		
Wall South - Rm 106	20,2					1.06	3.35	-11.99	158.91			-2.92	6.00		
Wall South - Rm 106	20,3					-1.59	2.05	-371.79	150.54			7.70	8.01		
Wall South - Rm 106	21,1					-1.59	2.05	-479.73	147.94			-2.92	6.00		
Wall South - Rm 106	21,2					-1.59	2.05	-33.58	158.42			2.39	7.08		
Wall South - Rm 106	21,3					-1.59	2.05	-163.11	155.45			5.05	7.56		
Wall South - Rm 106	22,1					1.06	3.35	-155.91	155.62			-2.92	6.00		
Wall South - Rm 106	22,2					1.06	3.35	-26.39	158.58			-0.27	6.56		
Wall South - Rm 106	22,3					9.00	5.68	-299.83	152.25			-5.58	5.38		
Wall South - Rm 106	23,1					-1.59	2.05	-235.07	153.78			-0.27	6.56		
Wall South - Rm 106	23,2					-1.59	2.05	-350.20	151.06			-0.27	6.56		
Wall South - Rm 106	23,3					-1.59	2.05	-479.73	147.94			-2.92	6.00		
Wall South - Rm 106	24,1					1.06	3.35	-76.76	157.44			-0.27	6.56		
Wall South - Rm 106	24,2					-1.59	2.05	-91.15	157.11			-0.27	6.56		
Wall South - Rm 106	24,3					-1.59	2.05	16.79	159.56			7.70	8.01		
Wall South - Rm 106	25,1					6.35	5.02	16.79	159.56			36.91	11.90		
Wall South - Rm 106	25,2					1.06	3.35	-242.26	153.61			18.32	9.61		
Wall South - Rm 106	25,3					-1.59	2.05	-343.01	151.23			-0.27	6.56		
Wall South - Rm 106	26,1					-1.59	2.05	-170.30	155.28			5.05	7.56		
Wall South - Rm 106	26,2					3.71	4.27	-91.15	157.11			10.36	8.44		
Wall South - Rm 106	26,3					-1.59	2.05	-220.68	154.11			13.01	8.85		
Ceiling - Rm 106	1,1					6.38	5.04	-29.55	153.07			0.53	7.40		
Ceiling - Rm 106	1,2					-1.59	2.06	-29.55	153.07			11.13	9.10		
Ceiling - Rm 106	1,3					-1.59	2.06	320.44	160.88			3.18	7.86		
Ceiling - Rm 106	1,4					1.06	3.36	187.44	157.96			5.83	8.29		
Ceiling - Rm 106	1,5					-1.59	2.06	215.44	158.58			-10.07	5.16		
Ceiling - Rm 106	1,6					-1.59	2.06	159.44	157.34			16.42	9.84		
Ceiling - Rm 106	1,7					1.06	3.36	-176.55	149.68			3.18	7.86		
Ceiling - Rm 106	1,8					1.06	3.36	-162.55	150.00			8.48	8.71		

023-ZR-0001
 Page 73
 03/01/94

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Ceiling - Rm 106	1,9					1.06	3.36	-22.55	153.23			-4.77	6.38		
Ceiling - Rm 106	2,1					-1.59	2.06	5.44	153.87			13.77	9.48		
Ceiling - Rm 106	2,2					6.38	5.04	236.44	159.04			-4.77	6.38		
Ceiling - Rm 106	2,3					-1.59	2.06	117.44	156.40			5.83	8.29		
Ceiling - Rm 106	2,4					1.06	3.36	-64.55	152.27			-4.77	6.38		
Ceiling - Rm 106	2,5					-1.59	2.06	131.44	156.71			3.18	7.86		
Ceiling - Rm 106	2,6					1.06	3.36	166.44	157.49			-2.12	6.91		
Ceiling - Rm 106	2,7					1.06	3.36	47.44	154.82			-4.77	6.38		
Ceiling - Rm 106	2,8					1.06	3.36	159.44	157.34			3.18	7.86		
Ceiling - Rm 106	2,9					-1.59	2.06	208.44	158.42			-2.12	6.91		
Ceiling - Rm 106	3,1					-1.59	2.06	250.44	159.35			5.83	8.29		
Ceiling - Rm 106	3,2					1.06	3.36	131.44	156.71			-2.12	6.91		
Ceiling - Rm 106	3,3					1.06	3.36	313.44	160.73			5.83	8.29		
Ceiling - Rm 106	3,4					-1.59	2.06	267.98	164.34			-2.12	6.91		
Ceiling - Rm 106	3,5					-1.59	2.06	289.38	164.80			11.13	9.10		
Ceiling - Rm 106	3,6					-1.59	2.06	260.84	164.18			0.53	7.40		
Ceiling - Rm 106	3,7					-1.59	2.06	275.11	164.49			13.77	9.48		
Ceiling - Rm 106	3,8					1.06	3.36	210.89	163.10			8.48	8.71		
Ceiling - Rm 106	3,9					-1.59	2.06	389.28	166.95			0.53	7.40		
Ceiling - Rm 106	4,1					1.06	3.36	96.73	160.58			-4.77	6.38		
Ceiling - Rm 106	4,2					-1.59	2.06	111.00	160.90			11.13	9.10		
Ceiling - Rm 106	4,3					1.06	3.36	-24.58	157.86			-2.12	6.91		
Ceiling - Rm 106	4,4					-1.59	2.06	89.59	160.42			5.83	8.29		
Ceiling - Rm 106	4,5					1.06	3.36	103.86	160.74			8.48	8.71		
Ceiling - Rm 106	4,6					-1.59	2.06	-74.53	156.73			-4.77	6.38		
Ceiling - Rm 106	4,7					6.38	5.04	225.16	163.41			11.13	9.10		
Ceiling - Rm 106	4,8					-1.59	2.06	153.81	161.84			-2.12	6.91		
Ceiling - Rm 106	4,9					-1.59	2.06	367.87	166.49			16.42	9.84		
Ceiling - Rm 106	5,1					-1.59	2.06	417.82	167.56			5.83	8.29		
Ceiling - Rm 106	5,2					3.72	4.29	210.89	163.10			0.53	7.40		
Ceiling - Rm 106	5,3					-1.59	2.06	89.59	160.42			-2.12	6.91		
Ceiling - Rm 106	5,4					-1.59	2.06	182.35	162.47			19.07	10.19		
Ceiling - Rm 106	5,5					-1.59	2.06	39.64	159.31			3.18	7.86		
Ceiling - Rm 106	5,6					3.72	4.29	125.27	161.21			11.13	9.10		
Ceiling - Rm 106	5,7					-1.59	2.06	61.05	159.78			8.48	8.71		

023-ZR-0001
 Page 74
 03/01/94

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Ceiling - Rm 106	5,8					1.06	3.36	96.73	160.58			-4.77	6.38		
Ceiling - Rm 106	5,9					-1.59	2.06	89.59	160.42			0.53	7.40		
Ceiling - Rm 106	6,1					1.06	3.36	310.79	165.27			-4.77	6.38		
Ceiling - Rm 106	6,2					-1.59	2.06	-67.39	156.89			0.53	7.40		
Ceiling - Rm 106	6,3					1.06	3.36	267.98	164.34			11.13	9.10		
Ceiling - Rm 106	6,4					-1.59	2.06	96.73	160.58			0.53	7.40		
Ceiling - Rm 106	6,5					3.72	4.29	225.16	163.41			69.40	15.40		
Ceiling - Rm 106	6,6					6.38	5.04	203.76	162.94			13.77	9.48		
Ceiling - Rm 106	6,7					1.06	3.36	182.35	162.47			8.48	8.71		
Ceiling - Rm 106	6,8					-1.59	2.06	-110.20	155.91			5.83	8.29		
Ceiling - Rm 106	6,9					1.06	3.36	18.24	158.83			0.53	7.40		
Ceiling - Rm 106	7,1					3.72	4.29	53.91	159.62			-2.12	6.91		
Ceiling - Rm 106	7,2					-1.59	2.06	0.81	159.77			-2.12	6.91		
Ceiling - Rm 106	7,3					-1.59	2.06	161.94	163.42			0.53	7.40		
Ceiling - Rm 106	7,4					-1.59	2.06	-65.10	158.25			-2.12	6.91		
Ceiling - Rm 106	7,5					1.06	3.36	330.39	167.16			8.48	8.71		
Ceiling - Rm 106	7,6					1.06	3.36	213.21	164.57			0.53	7.40		
Ceiling - Rm 106	7,7					-1.59	2.06	227.86	164.89			5.83	8.29		
Ceiling - Rm 106	7,8					-1.59	2.06	257.15	165.54			-2.12	6.91		
Ceiling - Rm 106	7,9					-1.59	2.06	191.24	164.08			3.18	7.86		
Ceiling - Rm 106	8,1					-1.59	2.06	286.45	166.19			-7.42	5.80		
Ceiling - Rm 106	8,2					-1.59	2.06	52.08	160.94			0.53	7.40		
Ceiling - Rm 106	8,3					-1.59	2.06	293.77	166.35			-2.12	6.91		
Ceiling - Rm 106	8,4					1.06	3.36	337.72	167.32			5.83	8.29		
Ceiling - Rm 106	8,5					1.06	3.36	381.66	168.28			-2.12	6.91		
Ceiling - Rm 106	8,6					1.06	3.36	-123.69	156.89			-2.12	6.91		
Ceiling - Rm 106	8,7					6.38	5.04	388.99	168.43			3.18	7.86		
Ceiling - Rm 106	8,8					1.06	3.36	0.81	159.77			-2.12	6.91		
Ceiling - Rm 106	8,9					1.06	3.36	-50.45	158.59			-2.12	6.91		
Ceiling - Rm 106	Cn-1					1.06	3.36	154.62	163.26			3.18	7.86		
Ceiling - Rm 106	Cn-2					-1.59	2.06	330.39	167.16			5.83	8.29		
Ceiling - Rm 106	Cn-3					1.06	3.36	88.70	161.77			19.07	10.19		
Ceiling - Rm 106	Cn-4					3.72	4.29	132.65	162.77			-4.77	6.38		
Ceiling - Rm 106	Cn-5					1.06	3.36	330.39	167.16			-2.12	6.91		
Ceiling - Rm 106	Ce-1					1.06	3.36	125.32	162.60			13.77	9.48		

023-ZR-0001
 Page 75
 03/01/94

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)				BETA (DPM/100CM2)				GAMMA (uR/hr)			
		TOTAL	STD DEV	MAX	REM	STD DEV	TOTAL	STD DEV	MAX	REM	STD DEV	TOTAL	STD DEV
Ceiling - Rim 106	Ce-2				-1.59	2.06	110.67	162.27		8.48	8.71		
Maximum:		0.00	0.00	0.00	9.00	5.68	449.90	171.55	0.00	69.40	15.40	9.43	0.21
Minimum:		0.00	0.00	0.00	-1.59	2.05	-587.67	145.29	0.00	-10.07	4.68	7.68	0.19
Average:		0.00	0.00	0.00	0.17	2.83	31.81	159.92	0.00	5.44	7.72	8.72	0.20

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Outside - Ground (North)	1,1					1.06	3.36	923.82	184.86			5.83	8.29	9.97	0.22
Outside - Ground (North)	1,2					-1.59	2.06	1203.17	190.33			3.18	7.86	11.18	0.23
Outside - Ground (North)	1,3					1.06	3.36	923.82	184.86			-2.12	6.91	11.93	0.24
Outside - Ground (North)	1,4							1107.60	188.48					12.53	0.24
Outside - Ground (North)	1,5							1379.60	193.71					13.82	0.25
Outside - Ground (North)	2,1					-1.59	2.06	1019.39	186.75			3.18	7.86	10.19	0.22
Outside - Ground (North)	2,2					-1.59	2.06	938.52	185.15			-10.07	5.16	11.49	0.23
Outside - Ground (North)	2,3					6.38	5.04	909.12	184.57			0.53	7.40	12.64	0.24
Outside - Ground (North)	2,4							1063.50	187.62					13.07	0.25
Outside - Ground (North)	2,5							1173.77	189.76					12.87	0.24
Outside - Ground (North)	3,1					-1.59	2.06	585.66	178.01			3.18	7.86	9.02	0.20
Outside - Ground (North)	3,2					1.06	3.36	1151.71	189.34			-4.77	6.38	11.36	0.23
Outside - Ground (North)	3,3					-1.59	2.06	1328.14	192.73			-7.42	5.80	12.17	0.24
Outside - Ground (North)	3,4							1409.01	194.27					12.85	0.24
Outside - Ground (North)	3,5							1239.93	191.04					13.25	0.25
Outside - Ground (North)	4,1					-1.59	2.06	887.06	184.13			13.77	9.48	10.25	0.22
Outside - Ground (North)	4,2					-1.59	2.06	806.20	182.51			13.77	9.48	11.83	0.23
Outside - Ground (North)	4,3					6.38	5.04	1137.01	189.05			5.83	8.29	12.86	0.24
Outside - Ground (North)	4,4							1432.03	192.22					13.03	0.25
Outside - Ground (North)	4,5							1287.70	189.49					13.53	0.25
Outside - Ground (North)	5,1					-1.59	2.06	883.59	181.64			3.18	7.86	10.45	0.22
Outside - Ground (North)	5,2					-1.59	2.06	970.19	183.35			-2.12	6.91	11.08	0.23
Outside - Ground (North)	5,3					-1.59	2.06	1222.76	188.25			-2.12	6.91	13.09	0.25
Outside - Ground (North)	5,4							1417.60	191.95					13.48	0.25
Outside - Ground (North)	5,5							1395.95	191.54					13.88	0.25
Outside - Ground (North)	6,1					1.06	3.36	833.08	180.63			3.18	7.86	10.32	0.22
Outside - Ground (North)	6,2					1.06	3.36	1388.73	191.41			0.53	7.40	11.81	0.23
Outside - Ground (North)	6,3					-1.59	2.06	883.59	181.64			16.42	9.84	13.08	0.25
Outside - Ground (North)	6,4							1345.43	190.59					13.10	0.25
Outside - Ground (North)	6,5							1446.46	192.49					13.71	0.25
Outside - Ground (North)	7,1					3.72	4.29	861.94	181.21			0.53	7.40	9.70	0.21
Outside - Ground (North)	7,2					1.06	3.36	1136.16	186.59			5.83	8.29	11.30	0.23
Outside - Ground (North)	7,3					-1.59	2.06	1193.89	187.70			5.83	8.29	13.23	0.25
Outside - Ground (North)	7,4							1229.97	188.39					13.12	0.25
Outside - Ground (North)	7,5							1208.32	187.98					13.52	0.25

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Outside - Ground (North)	8,1					1.06	3.36	1143.38	186.73			3.18	7.86	8.32	0.20
Outside - Ground (North)	8,2					-1.59	2.06	854.73	181.06			13.77	9.48	9.93	0.21
Outside - Ground (North)	8,3					3.72	4.29	1244.41	188.67			8.48	8.71	12.16	0.24
Outside - Ground (North)	8,4							1359.87	190.86					13.27	0.25
Outside - Ground (North)	8,5							1388.73	191.41					13.99	0.26
Outside - Ground (North)	9,1					1.06	3.36	1064.00	185.19			-4.77	6.38	7.77	0.19
Outside - Ground (North)	9,2					3.72	4.29	1193.89	187.70			11.13	9.10	10.25	0.22
Outside - Ground (North)	9,3					1.06	3.36	1157.81	187.01			16.42	9.84	12.62	0.24
Outside - Ground (North)	9,4							1020.70	184.34					13.34	0.25
Outside - Ground (North)	9,5							1496.98	193.44					13.62	0.25
Outside - Ground (North)	10,1					-1.59	2.06	1027.92	184.48			-4.77	6.38	10.69	0.22
Outside - Ground (North)	10,2					-1.59	2.06	1071.22	185.33			3.18	7.86	11.73	0.23
Outside - Ground (North)	10,3					1.06	3.36	1251.62	188.81			-4.77	6.38	13.33	0.25
Outside - Ground (North)	10,4							1468.11	192.90					13.56	0.25
Outside - Ground (North)	10,5							1367.08	191.00					14.49	0.26
Outside - Ground (North)	11,1							912.72	175.34					12.08	0.24
Outside - Ground (North)	11,2							1045.32	177.96					12.78	0.24
Outside - Ground (North)	11,3							1634.08	195.98					13.14	0.25
Outside - Ground (North)	11,4							1208.32	187.98					13.82	0.25
Outside - Ground (North)	11,5							1504.19	193.57					13.92	0.25
Outside - Ground (North)	12,1							1066.26	178.37					12.50	0.24
Outside - Ground (North)	12,2							1087.19	178.78					12.83	0.24
Outside - Ground (North)	12,3							1101.15	179.06					13.66	0.25
Outside - Ground (North)	12,4							1533.86	187.30					13.66	0.25
Outside - Ground (North)	12,5							1338.44	183.62					13.95	0.25
Outside - Ground (North)	13,1							1471.05	186.12					13.14	0.25
Outside - Ground (North)	13,2							1471.05	186.12					13.22	0.25
Outside - Ground (North)	13,3							1303.55	182.96					13.94	0.25
Outside - Ground (North)	13,4							1317.51	183.22					14.85	0.26
Outside - Ground (North)	14,1							1219.80	181.35					13.42	0.25
Outside - Ground (North)	14,2							1024.38	177.55					14.32	0.26
Outside - Ground (North)	14,3							1443.13	185.60					14.19	0.26
Outside - Ground (North)	15,1							1387.30	184.55					13.93	0.25
Outside - Ground (North)	15,2							1233.76	181.62					14.00	0.26
Outside - Ground (East)	1,1					1.06	3.36	1073.24	178.51			11.13	9.10	11.89	0.24

023 - ZR - 0001
 Page 78
 03/01/94

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Outside - Ground (East)	1,2					9.04	5.70	1073.24	178.51			-2.12	6.91	12.29	0.24
Outside - Ground (East)	1,3					-1.59	2.06	1163.97	180.28			0.53	7.40	12.69	0.24
Outside - Ground (East)	1,4					-1.59	2.06	1317.51	183.22			8.48	8.71	13.28	0.25
Outside - Ground (East)	2,1					-1.59	2.06	1212.82	181.22			3.18	7.86	12.62	0.24
Outside - Ground (East)	2,2					3.72	4.29	909.58	179.09			5.83	8.29	13.64	0.25
Outside - Ground (East)	2,3					-1.59	2.06	1426.53	189.03			0.53	7.40	13.26	0.25
Outside - Ground (East)	2,4					-1.59	2.06	1582.32	191.93			-2.12	6.91	13.50	0.25
Outside - Ground (East)	3,1					-1.59	2.06	1100.78	182.83			8.48	8.71	13.94	0.25
Outside - Ground (East)	3,2					-1.59	2.06	1192.84	184.60			3.18	7.86	13.11	0.25
Outside - Ground (East)	3,3					9.04	5.70	1065.37	182.14			3.18	7.86	13.89	0.25
Outside - Ground (East)	3,4					1.06	3.36	767.95	176.26			5.83	8.29	14.37	0.26
Outside - Pit Floor	1,1					1.06	3.36	1249.49	185.69			0.53	7.40	15.07	0.26
Outside - Pit Floor	1,2					3.72	4.29	980.39	180.48			16.42	9.84	14.40	0.26
Outside - Pit Floor	1,3					3.72	4.29	1249.49	185.69			8.48	8.71	14.80	0.26
Outside - Pit Floor	2,1					1.06	3.36	959.15	180.06			11.13	9.10	14.97	0.26
Outside - Pit Floor	2,2					1.06	3.36	1341.55	187.43			0.53	7.40	14.37	0.26
Outside - Pit Floor	2,3					1.06	3.36	980.39	180.48			3.18	7.86	14.65	0.26
Outside - Ground (Near Pit)	G-1							1359.38	184.02					9.96	0.22
Outside - Ground (Near Pit)	G-2							1254.69	182.02					9.25	0.21
Outside - Ground (Near Pit)	G-3							919.70	175.48					9.96	0.22
Outside - Ground (Near Pit)	G-4							975.53	176.59					10.38	0.22
Outside - Pit Wall West	1,1					1.06	3.36	902.50	178.95			5.83	8.29		
Outside - Pit Wall West	1,2					1.06	3.36	711.30	175.12			5.83	8.29		
Outside - Pit Wall West	2,1					1.06	3.36	690.05	174.69			5.83	8.29		
Outside - Pit Wall West	2,2					3.72	4.29	668.81	174.26			3.18	7.86		
Outside - Pit Wall West	3,1					-1.59	2.06	675.89	174.41			-2.12	6.91		
Outside - Pit Wall West	3,2					-1.59	2.06	619.24	173.25			0.53	7.40		
Outside - Pit Wall North	4,1					3.72	4.29	767.95	176.26			5.83	8.29		
Outside - Pit Wall North	4,2					-1.59	2.06	675.89	174.41			0.53	7.40		
Outside - Pit Wall North	5,1					-1.59	2.06	895.41	178.81			3.18	7.86		
Outside - Pit Wall North	5,2					1.06	3.36	548.42	171.80			11.13	9.10		
Outside - Pit Wall East	6,1					1.06	3.36	668.81	174.26			0.53	7.40		
Outside - Pit Wall East	6,2					1.06	3.36	654.64	173.97			13.77	9.48		
Outside - Pit Wall East	7,1					1.06	3.36	753.79	175.98			5.83	8.29		
Outside - Pit Wall East	7,2					1.06	3.36	633.40	173.54			0.53	7.40		

SAMPLE NAME	GRID NAME	ALPHA (DPM/100CM2)						BETA (DPM/100CM2)						GAMMA (uR/hr)	
		TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV	MAX	STD DEV	REM	STD DEV	TOTAL	STD DEV
Outside - Pit Wall East	8,1					1.06	3.36	775.03	176.41			-2.12	6.91		
Outside - Pit Wall East	8,2					3.72	4.29	619.24	173.25			3.18	7.86		
Outside - Pit Wall South	9,1					1.06	3.36	583.83	172.53			-2.12	6.91		
Outside - Pit Wall South	9,2					1.06	3.36	767.95	176.26			11.13	9.10		
Outside - Pit Wall South	10,1					1.06	3.36	860.95	175.06			11.13	9.10		
Outside - Pit Wall South	10,2					1.06	3.36	534.54	168.31			-4.77	6.38		
Outside - Pit Wall South	11,1					-1.59	2.06	860.95	175.06			0.53	7.40		
Outside - Pit Wall South	11,2					3.72	4.29	811.28	174.05			-2.12	6.91		
Outside - Pit Wall South	12,1-2					1.06	3.36	839.66	174.63			5.83	8.29		
Maximum:						9.04	5.70	1634.08	195.98			16.42	9.84	15.07	0.26
Minimum:						-1.59	2.06	534.54	168.31			-10.07	5.16	7.77	0.19
Average:						0.95	3.16	1087.79	183.29			3.90	7.91	12.68	0.24

023-ZR-0001
 Page 80
 03/01/94

01-Mar-94 Bldg 038 Interior Ambient Gamma Background Measurements Page 1 of 1

Data Description

Building 038 GAMMA

Background Survey

for T023 DATA

SAMPLE NAME	GRID NAME	GAMMA TOTAL	GAMMA (uR/h)	
			TOTAL	STD DEV
Front Door (Main Entrance)	1	1706	7.93	0.19
Women's Restroom	2	1719	7.99	0.19
Inside Large Conference Room	3	1904	8.85	0.20
Inside Large Conference Room	4	1953	9.08	0.21
Outside Office Rm 156/133	5	1723	8.01	0.19
Inside Exec. Conference Room	6	1822	8.47	0.20
Inside Exec. Conference Room	7	1769	8.23	0.20
Hallway	8	1584	7.37	0.19
Outside Rm 146a/143a	9	1803	8.38	0.20
Inside Rm 136	10	1767	8.22	0.20
Inside Rm 120	11	1632	7.59	0.19
Inside Rm 120	12	1616	7.51	0.19
Inside Rm 117	13	1748	8.13	0.19
Inside North Exit	14	1704	7.92	0.19
Inside Small Conference Room	15	1751	8.14	0.19
Gaylord's Office Rm 111b	16	1701	7.91	0.19
Gibb's Office Rm 102a	17	1711	7.96	0.19
DeBear's Office Rm 102b	18	1655	7.70	0.19
Hallway Outside Rm 105	19	1738	8.08	0.19
Hallway Outside Lg. Conf. Rm	20	1838	8.55	0.20
Inside Rm 171	21	1701	7.91	0.19
Inside Rm 172	22	1699	7.90	0.19
Inside Rm 174	23	1744	8.11	0.19
Inside Rm 174	24	1618	7.52	0.19
Inside Rm 174	25	1702	7.91	0.19
Outside Men's Restroom	26	1731	8.05	0.19
Outside Rm 152	27	1727	8.03	0.19
Hallway	28	1705	7.93	0.19
Outside Rm 139	29	1838	8.55	0.20
Outside Vault	30	1935	9.00	0.20
South Exit	31	1800	8.37	0.20
BLANK>				
DATA>	Maximum	1953.00	9.08	0.21
DATA>	Minimum	1584.00	7.37	0.19
DATA>	Average	1741.47	8.10	0.19