

Florida Department of Environmental Protection



Office of Communications

Keys to the Inspection Process

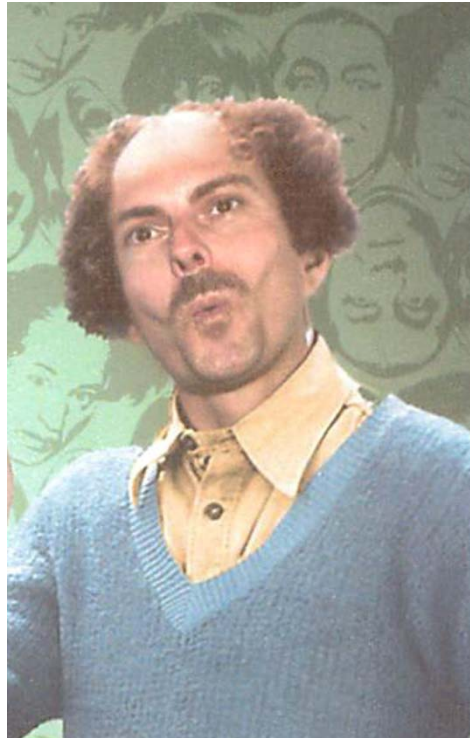
An Intro to the Florida Keys and Generator Classifications

May 15, 2013





Webinar Overview



Presented by Ed Russell, SD Marathon Branch



Webinar Overview

- To provide a “Basic” Training for Newer inspectors during our transition and reorganization to “multi-sector” inspectors.
- (Quick) Overview of the inspection process.
- Needed a catchy phrase: Keys to the Inspection Process, focused namely the Florida “Keys”!
- Provide examples that are not just Bad – a mix.
- Overview of our biggest generator that encompasses all levels of generator classifications.



An Overview

- The “Keys” Stretch about 112 linear miles
- Cluster of Island Chains – Island Hopping
- Industries include (but not limited to):
 - Fishing, Automotive Repair, Retail Stores, Marinas and Boatyards, Dry Cleaners, Hospitals, Military, etc.
 - One of two Large Quantity Generator (LQG) in our District.
 - Treatment, Storage and/or Disposal Facility (TSDF)
 - Post-closure OB/OD (Open Burn / Open Detonation)
 - Probably the Only County without a Wal-Mart



An Overview





Keys to the Inspection Process

Conducting An Inspection

- **Identify:**
 - Identify yourself, ask to speak to owner / operator / manager.
- **Explain:**
 - Explain the purpose of the inspection, what you'll be looking at, what you'll need to see (records, operations), let them know you'll be taking photos.
- **Plan:**
 - This is likely the first inspection at the site or the first they have had, so choose your plan or approach. Will it be a announced / coordinated inspection or not?

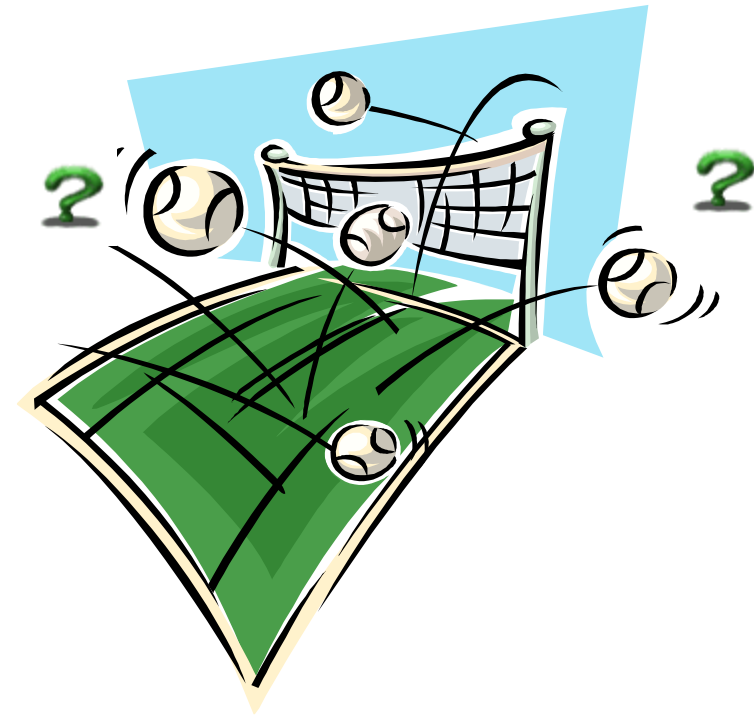


Conducting An Inspection

- **Plan continued:**
 - **Records or Processes:** Which first? Everyone's choice is different. Situations are different.
 - **Records** may not be readily available – your clue may be in your Explanation of your inspection – or they may have told you they “have copies somewhere.” Records give you a quick indication of their generator status or classification. It's one clue to how they may be regulated.
 - **Processes:** Site Review or Walk Through. This will give you an indication of their processes and potential waste streams generated. You have to “determine” what's Hazardous Waste (HW) and what's Solid Waste or Exempted (recycled).

Conducting An Inspection

- **Plan continued:**
 - **Processes continued:** Site Review or Walk Through. Try to be orderly in the walk through and control the flow if possible. Otherwise you'll be jumping around the site.
 - **Understand:** It's their business and they may need to be interrupted with calls or customers. Make use of the interruption to observe but unless it's ok with the facility, don't start snooping.





Conducting An Inspection

- **Watch** like at Chameleon: Eyes open and looking ALL around.
- **Listen** like a Bat: Pay attention to what someone says or tells you and write it down.
- **Ask** questions
- Take **Photos**: best memory device.
- **Explain** problems or make recommendations when you find them.



Above Photos from Wikipedia

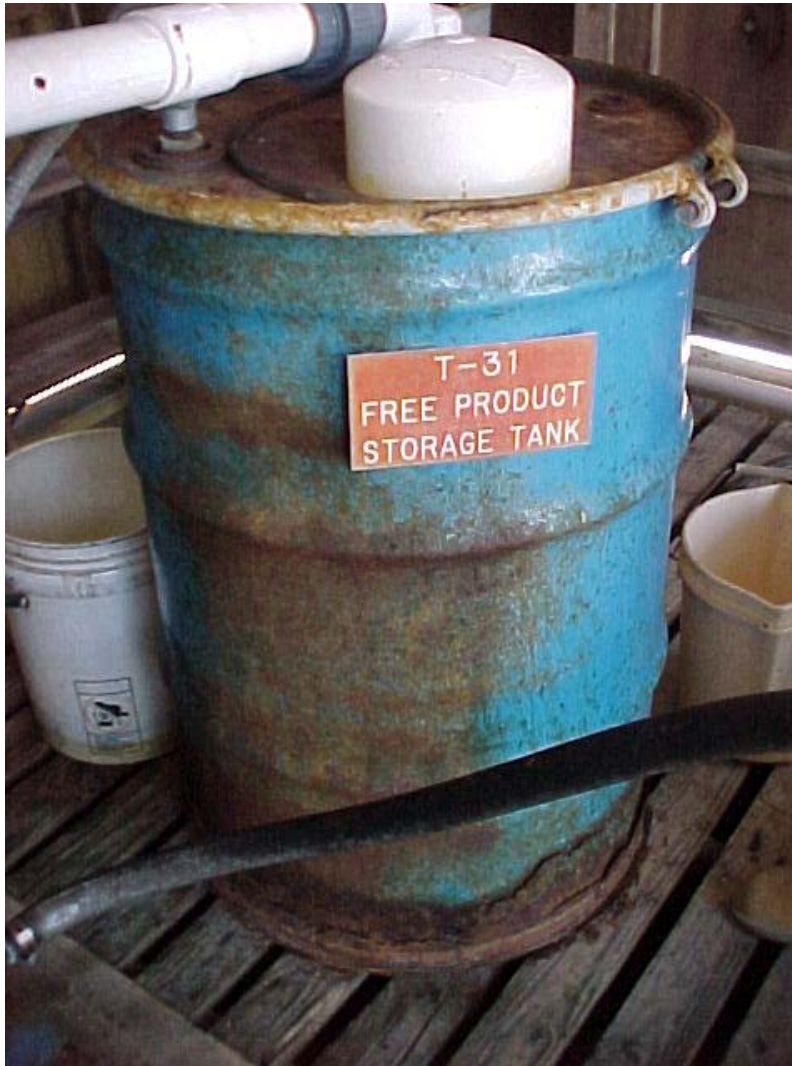


Conducting An Inspection



Being aware of your surroundings is important – Eyes open for hazards and other areas of interest. Your looking at operations, procedures, work processes, etc.

Conducting An Inspection



Site Operations / Work Processes, etc.

- It's not uncommon for people to walk past the same "waste" or unknown items for years.
- Tunnel Vision
- Old Petroleum Clean-up site
- Free Product? – Labeled as such
- Drum rusted out at bottom
- Questions?:
 - What happened to the contents
 - Any discharges obvious
- Recommendations:
 - Properly dispose /replace if needed

Conducting An Inspection



Tunnel Vision:

- Walking past things routinely until you don't see them anymore.
- Rusted tops indicated they've been onsite for some time.



Conducting An Inspection



The Lone Stranger:

- Looks abandoned
- Worth investigating
- Poor condition
- Probably contains waste items

Conducting An Inspection



- Not Abandoned
- Worth investigating
- Poor condition
- Probably contains waste items

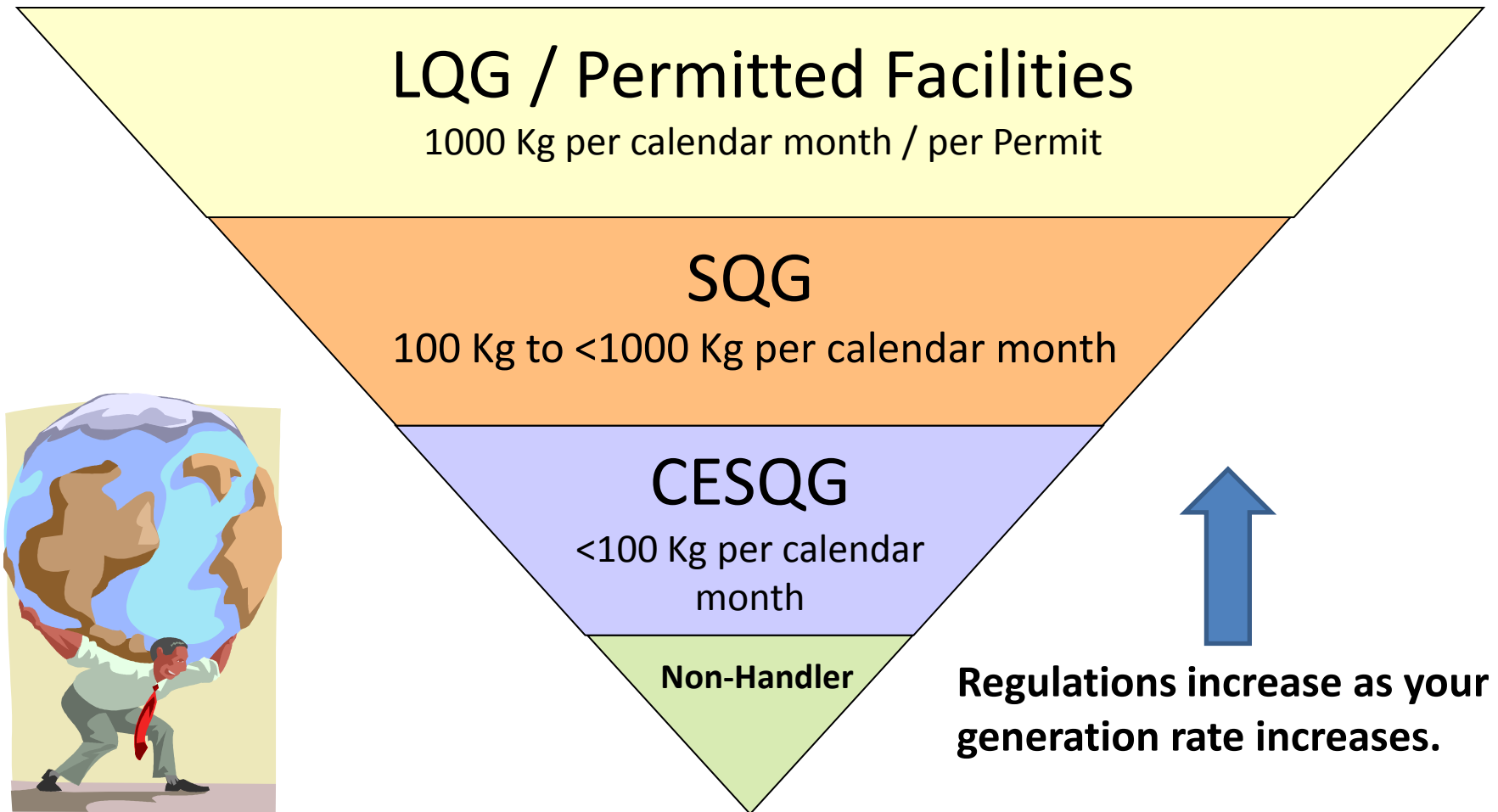


Types of Generators

- Generator Status / Classifications
 - **Non-handler** (e.g. non-hazardous waste generator.)
 - **Conditionally Exempt Small Quantity Generator (CESQG)**: Generates <100 Kg per calendar month.
 - **Small Quantity Generator (SQG)**: Generates between 100 Kg and <1000 Kg per calendar month.
 - **Large Quantity Generator (LQG)**: Generates 1000 Kg per calendar month.
 - **Permitted Hazardous Waste Facility** (TSDF, OB/OD..)

Note: “P-waste” (“*acutely hazardous*”) limits apply in determining generator status. Not discussed in this presentation.

Types of Generators





Non-Handlers

- “No” HW generated.
- Types of wastes often generated:
 - Used Oil: Recycled, Labeling, containment,
 - Used Oil Filters: Recycled.
 - Used antifreeze or used coolant.
 - Batteries: Universal Waste (UW) / Recycled
 - Fluorescent Lamps: Universal Waste.
 - Parts Washers if they are in a continuous use program.
 - Shop rags in a shop rag / uniform cleaning program.

CESQG Requirements

- Perform HW determination.
- Cannot accumulate >1000 kg at any time. (“5 drum limit”)
- Ensure delivery of HW to a proper recycling facility or TSDF.
- Keep records documenting proper disposal.





SQG Requirements



1. Obtain a DEP/EPA ID Number (**NOTIFICATION REQUIRED**)
2. Use manifest system [unless there is a reclamation agreement, and ship only to a permitted facility.
3. **Never exceed the 6000 kg accumulation / 180 day storage time limit.**
4. **Emergency Planning:** at least one employee or a designee with authority as Emergency Coordinator (EC) on 24-hour call & more...
5. **Training** of personnel regarding proper HW handling and emergency response.
6. Keep **records**, including manifests, test results, etc., a **minimum of three (3) years**.
7. If tanks are used for management of HW, meet the tank requirements (daily and weekly inspections, required maintenance, spill response and closure standards.)
8. Meet the following LQG requirements (next slide): Items 1, 2, 4, 5, 6, 12 to 15, 17, and 22.
9. If a SQG fails to meet applicable requirements, the full generator standards (and possibly TSDF standards) may apply.



LQG Requirements



1. Perform HW determination including LDR waste analyses.
2. Obtain a DEP/EPA ID number. (**NOTIFICATION REQUIRED**)
3. Use manifest system, and ship to a permitted facility
4. Meet pre-transport requirements for packaging, labeling, marking and placarding.
5. Meet satellite accumulation rules.
6. Label containers and tanks with the words "Hazardous Waste" and label containers with accumulation start dates.
7. **Do not store HW > 90 days.**
8. Keep all **records for at least three (3) years**
9. File a biennial report for HW shipped off site.
10. File exception report for late or missing manifests from the designated facility.
11. Meet personnel **training** requirements, including documentation of training.
12. Maintain and operate the facility in a clean, safe manner.
13. Provide emergency.
14. Maintain adequate aisle space for evacuation, **inspecting drums**, etc., e.g., no less than three (3) feet.



LQG Requirements Cont'd

15. Attempt to make arrangements with authorities
16. Have a **contingency plan**.
17. Containers (e.g. drums, cans, etc.) must be kept closed and in good condition, inspected at least weekly, be compatible with the HW stored, and separated from other incompatible wastes. **Records must be kept of these inspections.**
18. Ignitable or reactive HW must be stored at least fifty (50) feet from the facility's boundary line.
19. Tanks must meet specific requirements (structural integrity; containment and detection of releases; inspections; response leaks or spills; operating requirements; closure and post-closure care; special requirements for the waste stored, etc.
20. Special cautions (including "no smoking" signs) are required for ignitable or reactive wastes.
21. Security (e.g. a locked fence) and bermed containment areas (with roof and impermeable floor) for HW storage areas are strongly recommended.
22. A Land Disposal Restrictions (LDR) Certification or Notification must accompany the initial manifest for a restricted waste. Generators who treat waste to meet land disposal restrictions must submit a waste analysis plan to DEP.
23. Meet applicable air emission standards.



Generator Examples

The following are
some general examples of Generator Sites
related to one entity over several non-contiguous
properties showing the
different Generator Classifications
and their operations / storage areas.



NAS Key West





Non-Handlers

- No HW generated*
- May Generate (examples):
 - Used Oil: Recycled, Labeling, containment,
 - Used Oil Filters: Recycled
 - Used gasoline: Recycled
 - Batteries: Universal Waste (UW) / Recycled
 - Fluorescent Lamps: Universal Waste.
 - *Parts Washers waste - if they are in a continuous use program



Non-Handlers

- What do we look at / for:
 - Disposal method
 - Manifest or receipts
 - Core exchanges (e.g. batteries)
 - Evidence of recycling such as “manifest”, receipts for used oil, used oil filters, contract for parts washers recycling, etc.
 - Labeling as required
 - Containment as required
 - Management:
 - condition of drums
 - open/closed
 - good housekeeping

Non-Handlers



POL Site – Petroleum, Oil and Lubricant Storage

- Used oil related storage
- Oily rag (Non-hazardous waste) storage
- Pluses: Well managed, containment
- Minus: decline in their level of management



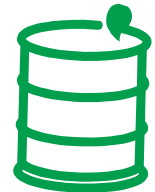
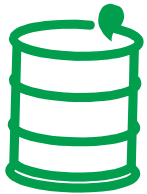


CESQG

- Hazardous Waste is generated:
 - Small monthly volumes (up to 100 kg/ calendar month)
 - Paint related waste
 - Aerosol residue waste
 - Solvent wastes
 - Shop rags
- Other waste which may be generated:
 - Any Non-Handler waste streams / types
 - Used Oil, Used Oil Filters, Batteries, Used Antifreeze, Used Fluorescent Lamps, etc...

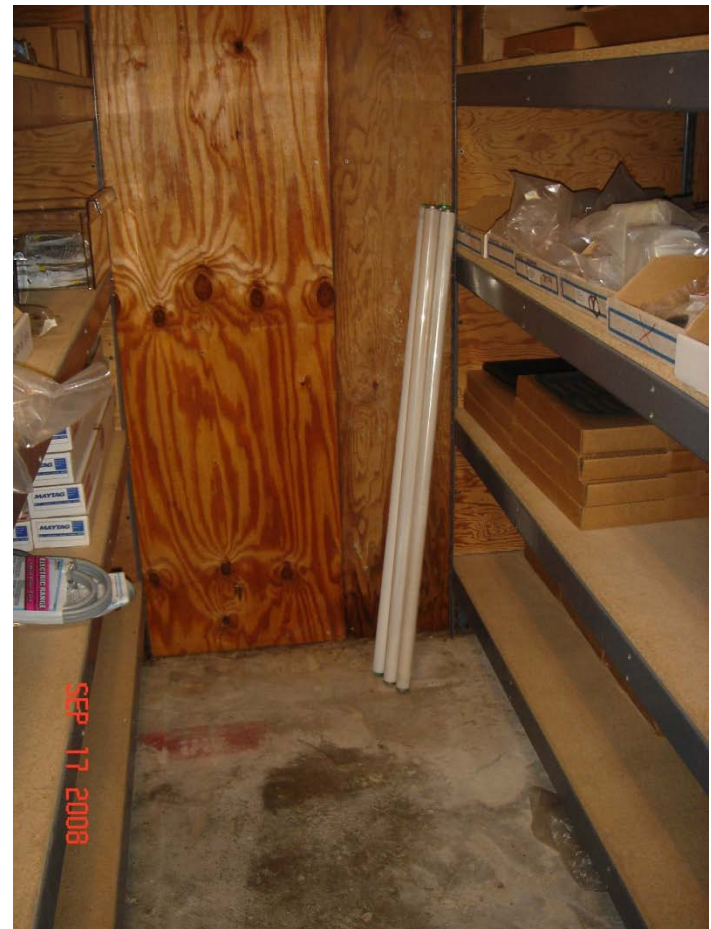
CESQG

- What do we look at / for:
 - Disposal method
 - Manifest or receipts
 - Same types of things as a Non-Handler.
 - Labeling as required
 - Containment as required
 - Management:
 - condition of drums
 - open/closed
 - Volume on site (“5 drum limit”)



CESQG

- Poor Fluorescent Bulb (Spent Lamps) Management.
- Should be Managed, to prevent breakage and labeled.



CESQG



CESQG

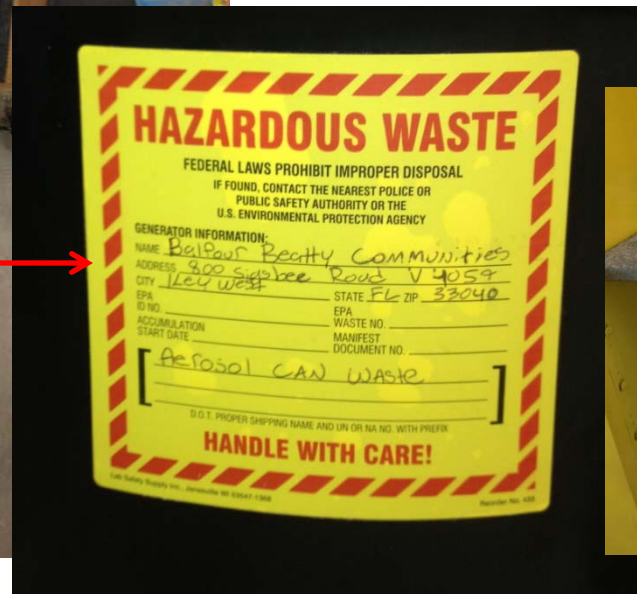


CESQG



This facility generates waste aerosol residue from puncturing aerosol canisters as well as potential paint waste.

Labeling not required for CESQGs but is Highly recommended.



CESQG



This site deals primarily with Non-Handler waste but may generate hazardous waste (Lawn Care operation with possible solvents: i.e. parts washer and other possible solvents).



SQG

- HW is generated
 - Higher volumes of waste per month (100-1000 Kg / calendar month)
 - Paint related waste
 - Solvents
 - Cleaners, thinners
 - Chemicals – expired lab waste
- Other waste which may be generated:
 - Any Non-Handler waste streams / types
 - Used Oil, Used Oil Filters, Batteries, Used Antifreeze, Used Fluorescent Lamps, etc...



SQG

- What do we look at / for:
 - Disposal method / Manifest
 - Labeling as required
 - Containment as required
 - Container Management
 - Volume on site
 - Time limits on storage (**180 day limit**)
 - Inspection records (the date and time of the inspection, the legibly printed name of the inspector, the number of containers, the condition of the containers, a notation of the observations made, and the date and nature of any repairs or other remedial actions)

SQG



SQG

Paint Related Waste is the primary waste of this facility.



SQG

Does this look like good Management?



- Open Containers
- Spillage
- Labeling
- Start Date
- This with other issues was an enforcement item – In-kind and implementation of management procedures

SQG



New Paint Booth : In-Kind Project

SQG



Lab Chemicals – Require Waste Determination or Verification as Products



LQG

- HW is generated
 - Lots of different waste streams
 - Paint related wastes
 - Parts washer solvents, numerous parts washers
 - Waste solvents
 - Sandblasting waste
 - X-ray waste
 - Unknowns
- Other waste which may be generated:
 - Any Non-Handler waste streams / types
 - Used Oil, Used Oil Filters, Batteries, Used Antifreeze, Used Fluorescent Lamps, etc...



LQG

- What do we look at / for:
 - Disposal method / Manifest
 - Labeling as required
 - Containment as required
 - Container Management
 - Start Dates (when waste is first placed in)
 - Time limits on storage (**90 day limit**)
 - Inspection records (the date and time of the inspection, the legibly printed name of the inspector, the number of containers, the condition of the containers, a notation of the observations made, and the date and nature of any repairs or other remedial actions)
 - & more....



LQG

Weekly inspections tell us a lot:

- Start dates
- Waste in storage (type and size)
- What, if any, problems
- Who, What, When and Where

HAZARDOUS WASTE WEEKLY INSPECTION REPORT

ACTIVITY: NHL Key West, Bldg. F-1
 SITE CONTACT: R. L. Foster
 DATE: 7 JUL 05
 TIME: 0945
 SIGNATURE: [Signature]
 REMARKS:

ITEM	DESCRIPTION	SAT	UNSAT	REMARKS
1	OUTSIDE CONDITION	✓		
2	SITE CONDITION	✓		
3	AREA SECURED / LOCKED	✓		
4	CONTAINMENT WELL	✓		
5	EYE WASH / SHOWER	✓		
6	SITE EQUIPMENT INVENTORY	✓		RAN 5 MIN
7	FIRE EXTINGUISHER	✓		INSPECT 5 MIN
8	DRUM CONDITION	✓		
9	SEGREGATION	✓		
10	LABELS	✓		
11	PROPER EPA NUMBER	✓		
12	ODOR / FUMES	✓		
13	LEAKS / SPILLS	✓		
14	CONTAINER LOG	✓		
15	ACCUMULATION DATE	✓		
16	DRUM PICK-UP DATE	✓		80 DAY DATE: 27 AUG 05
17	WARNING SIGNS	✓		
18	CONTINGENCY PLAN / SIGN	✓		

SITE INVENTORY AND STORAGE INFORMATION

DRUM TOTAL	DRUM SIZE	DESCRIPTION	WASTE CODES	START DATES
1	55	PAINT & SOLVENTS	0001, F005	8 JUN 05
1	27	USED BLAST MEDIA	N.R.	5 APR 05
1	55	WASTE PAINT	0005	30 JUN 05
1	55	WASTE PAINT	0001, 0005	30 JUN 05
2	85	WASTE PAINT	N.R.	28 JUN 05
584	85	WASTE PAINT	0001	6/13-9/15
1	85	PAINTED PAINT, BRUSH ROLLER, PAINT SPRAY GUN	F003, 0035 F005, 0005	28 JUN 05
1	20	(BOOTH) RAGS BRUSHES ROLLERS	N.R.	29 JUN 05
1	20	(RAG) EMPTY		

GENERAL REMARKS

DATE	DESCRIPTION	INITIALS
7 MAR 05	4' BOX PARTIAL DULBS	
24 FEB 05	3' BOX PARTIAL DULBS	

NAS FORM 5090/1 (3-92) MODIFIED 8-15-96



LQG

HAZARDOUS WASTE WEEKLY INSPECTION REPORT

ACTIVITY: NRL Key West, Bldg. F-1

DATE:

7 JUL 05

TIME:

0945

SITE CONTACT: R. L. Foster

SIGNATURE:

R. L. Foster

ITEM	DESCRIPTION	SAT	UNSAT	REMARKS
1	OUTSIDE CONDITION	✓		
2	SITE CONDITION	✓		
3	AREA SECURED / LOCKED	✓		
4	CONTAINMENT WELL	✓		
5	EYE WASH / SHOWER	✓		
6	SITE EQUIPMENT INVENTORY	✓		RAN 5 MIN
7	FIRE EXTINGUISHER	✓		
8	DRUM COMDITON	✓		INSPECT 5 MIN
9	SEGREGATION	✓		
10	LABELS	✓		
11	PROPER EPA NUMBER	✓		
12	ODER / FUMES	✓		
13	LEAKS / SPILLS	✓		
14	CONTAINER LOG	✓		
15	ACCUMULATION DATE	✓		
16	DRUM PICK-UP DATE	✓		80 DAY DATE: 27 AUG 05
17	WARNING SIGNS	✓		
18	CONTIGENCY PLAN / SIGN	✓		

SITE INVENTORY AND STORAGE INFORMATION



LQG

18		CONTINGENCY PLAN / SIGN		✓			
SITE INVENTORY AND STORAGE INFORMATION							
DRUM TOTAL	DRUM SIZE	DESCRIPTION	WASTE CODES	START DATES			
1	55	PAINT & SOLVENTS	0001, F003	8 JUN 05			
1	27	USCO BLAST MEDIA	N.R.	5 APR 05			
1	55	WASTE PAINT	0005	30 JUN 05			
1	55	WASTE PAINT	0001, 0005	30 JUN 05			
2	85	WASTE PAINT	N.R.	28 & 30 JUN 05			
5 8	85	WASTE PAINT	0001	6/28-9/5			
1	85	REPAINT, BRUSH, ROLLER, RAG & SPRAY/PAINT	F003, 0035 F005, 0005	28 JUN 05			
1	20	(BOOTH) RAGS BRUSHES ROLLERS	N.R.	29 JUN 05			
1	20	(LAB) EMPTY	—	—			
GENERAL REMARKS							
1	4'	BOX PARTIAL BULBS	—	9 MAR 05			
1	8'	BOX PARTIAL BULBS	—	24 FEB 05			

NAS FORM 5090/1 (3-92) MODIFIED 8-15-96

LQG



Used Oils, Used Gasoline, Used Antifreeze Storage Area
Recycled – Non- Hazardous Waste Storage

LQG



90 Day Storage

LQG



Typical Waste Storage Areas

LQG

GENERATOR INFORMATION:

NAME Commanding Officer NAVAL REGION 1/DETAL CHAS

ADDRESS NAVAL AIR STATION

CITY KEY WEST STATE FL ZIP 33040

EPA ID NO. FLO000 445624 EPA WASTE NO. POOL, U162

ACCUMULATION START DATE _____ MANIFEST DOCUMENT NO. _____

[UN 1247, WASTE METHYL METHACRYLATE DIMER
STABILIZED, 3 P, II]

D.O.T. PROPER SHIPPING NAME AND UN OR NA NO. WITH PREFIX

HANDLE WITH CARE!

Safe Supply Inc., Janesville WI 53537

Reorder No. 400

We look at waste stored at the various work areas and for waste codes (e.g. U162) that are not in the TSDF's permit. This is important since the TSDF is permitted only for specific wastes codes.

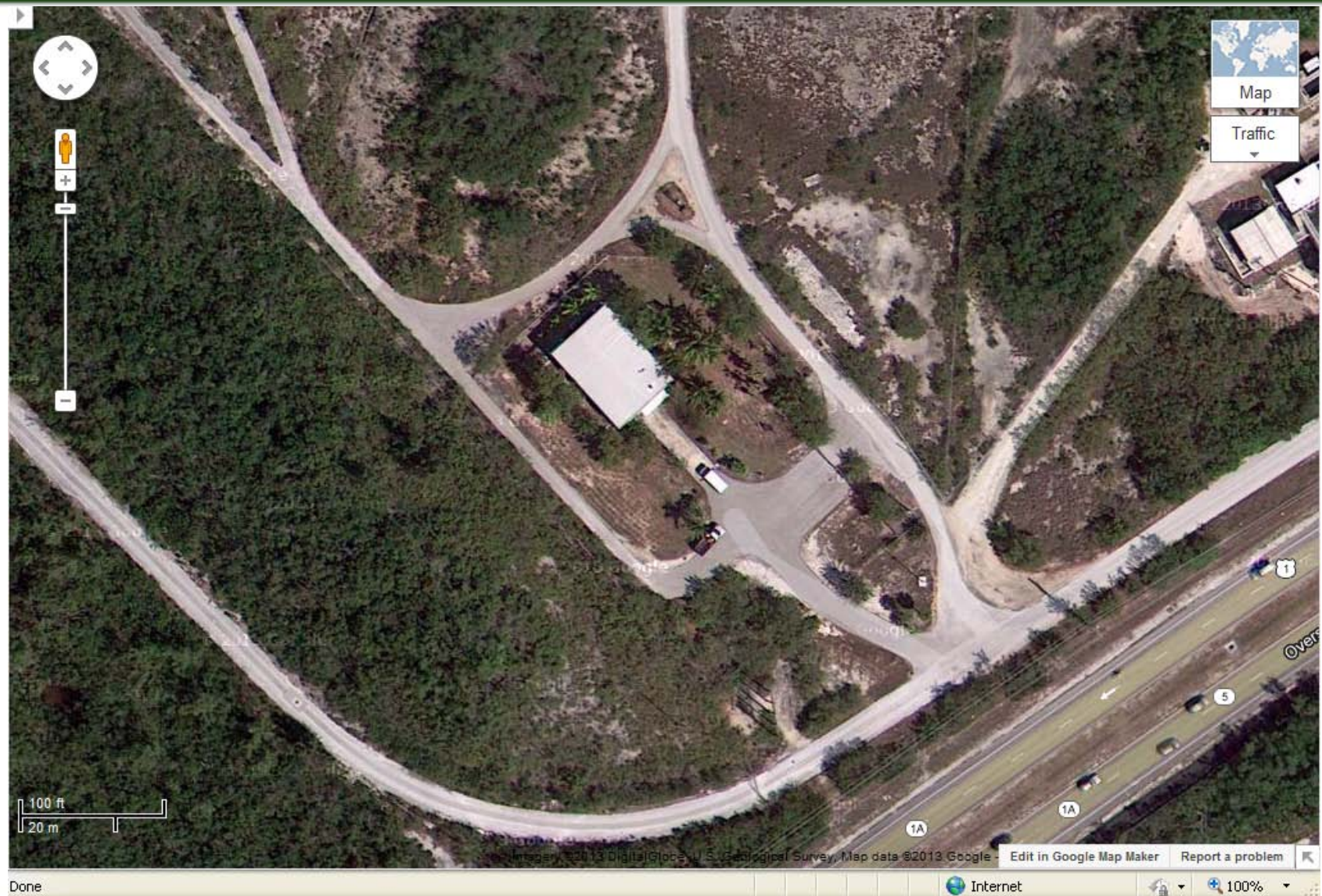




Records

- Problems we've seen with records
 - Inspection reports that are copies and just signed
 - Items appear and disappear from weekly inspection report
 - Items disappear from weekly inspection report and no corresponding shipping manifest or not received at TSDF
 - Waste codes change from HW to non-Hazardous Waste (HW)

TSDF





TSDF Facility

- Permitted RCRA Subpart B facility.
- Container Storage Facility
- Receives waste from Navy (DOD) operations and tenant activities and one USAF.
- Storage Facility for up to 1 year.

TSDF Facility



TSD Facility





TSD Facility

Weekly Bay Inventory

1/1/2012 - 7/31/2012

Bay B				Date:			
ID	EPA Numbers	Location	Composition	Weight	Call In	DRMO	Disposal
✓ 8521	D035 ④ SD printed out	B61BL4078	Paint Rags and Debris	45	2/24/2012	9/12/2012	
✓ 8522	N/R	B61BR4078	PF Solvent Fr PW Special Forces	110	3/1/2012	9/12/2012	
✓ 8523	D018 ③	B61BL4078	Spill Debris C/W Gasoline	25	3/1/2012	9/12/2012	
✓ 8525 ④	N/R	B63BL4078	Paint Chips and Debris - Test 31-12 Port ops Gun Test	55	3/30/2012	9/12/2012	
✓ 8530	D005 N/R	B62BR4078	Seawater C/W Paint (Barium)	490	4/4/2012	9/12/2012	
✓ 8531	D005 N/R ②	B62BL4078	Seawater C/W Paint (Barium)	185	4/4/2012	9/12/2012	
✓ 8532	N/R	B62BR4078	N.O.S. Poly & Diisocyanate Specis	180	4/4/2012	9/12/2012	
✓ 8533	N/R N/R	B62BL4078	Paint In Original Containers	200	4/4/2012	9/12/2012	
✓ 8535	N/R	B61BR4078	Grease in 5 gallon container	95	4/10/2012	9/12/2012	
✓ 8536	N/R	B63BR4078	Alkiline batteries	400	4/10/2012	9/12/2012	
✓ 8540	D018 5-1-12 ②	B61BR4078	Rags C/W Gasoline From Spill	20	5/1/2012	9/12/2012	
✓ 8548	D008 ④	B63BR4078	Antisize C/W PB	10	5/10/2012	9/12/2012	
✓ 8549	N/R	B63BL4078	Magnaflux from NDI	240	5/22/2012	9/12/2012	
✓ 8550	N/R	B63BR4078	Latex Paint Wash Water	130	5/23/2012	9/12/2012	
✓ 8551	N/R NDI	B64BR4078	Devoloper Solution In 5 Gal Containers	169	5/23/2012	9/12/2012	
✓ 8552	D011	B64BL4078	Fixer Solution in 5 Gal Containers 5-23-12	189	5/23/2012	9/12/2012	
✓ 8561	N/R	B64BR4078	Non reg Paint Wash Water	70	6/11/2012	9/12/2012	
✓ 8565	D006,D007	B64BR4078	Paint Chips and Debris Fr FRC-CC PB A-990	130	7/3/2012	9/12/2012	
✓ 8566	UW	B151BL4078	Crushed Florescent lights	260	7/11/2012	9/12/2012	
✓ 8567	UW	B51BR4078	Alkaline Batteries	250	7/11/2012	9/12/2012	
✓ 8568	UW	B51BR4078	Crushed Florescent lights	360	7/12/2012	9/12/2012	
✓ 8570 ①	D009,D011 } 16 SD	B51BR4078	Filters C/w Amalgam Dental N/SB 7-17-12	12	7/17/2012	9/12/2012	
✓ 8571 ①	D009,D011 } SD 12-1-11	B51BL4078	Capcules C/w Amalgam Dental 12/1/11 - 7/17/12	5	7/17/2012	9/12/2012	
✓ 8572	N/R	B51BR4078	Asbestos Tiles, Non-Friable	82	7/25/2012	9/12/2012	
Bay B: 24 records				Bay Total:	3712		

Bay C				Date:			
ID	EPA Numbers	Location	Composition	Weight	Call In	DRMO	Disposal
8546	D002,D007 ④ ③	C72BR4078	Alodine 1201-Chromic Acid	12	5/10/2012	9/12/2012	
8562	D002,D008 ③	C73BR4078	Cracked Sealed Pb Acid Batteries	27	6/21/2012	9/12/2012	
Bay C: 2 records				Bay Total:	39		

Bay D				Date:			
ID	EPA Numbers	Location	Composition	Weight	Call In	DRMO	Disposal
8527 ②	D001,D005,D007,D008,D035	D131BR4078	Paint In Original Containers (5 Gal) 3-6-12/4-4-12	490	4/4/2012	9/12/2012	
8529 ②	D001 3-2-12	D131BR4078	Paint in Original containers 4-4-12	300	4/4/2012	9/12/2012	

Tuesday, July 31, 2012

Page 1 of 2

① FL660045684 ② FL2170024473 ③ FL66170022950 ④ FL4170025788

Things we look at:

- Every container.
- Storage time: 1 year or 90 days for non-permitted waste codes.
- Waste Codes.
- Overall site – any problems needing repairs.
- Training
- Disposal Manifest (codes and volumes)
- & more....



LQG



- Labels are facing out and easy to read.
- Good aisle space
- Good condition

TSDF Facility



- Every thing on these drums I can trace back to the original generator through the facility's logs, manifests and records.
- From the generator, I can trace the wastes from their logs, their manifests to a specific drum(s) at the TSDF.
- If there's a gap, it needs an explanation.



Demo Key - OBOD



Post Closure OBOD



Initial Remediation of site Circa 1999

Post Closure OBOD



Site in 2012



Things to Note

- This presentation is not your “typical” business operations.
- “Typical” business operations are likely to:
 - Have poor housekeeping (which often leads to poor waste management practices)
 - Have poor record keeping and few they can produce
 - Have fewer Staff and less time to spend with you (time=\$\$)
 - Have lesser knowledge on regulations (Explanation / Outreach is important)



Deltas

- Positives

- CHRIMP (Consolidated Hazardous Material Reutilization Inventory Management Program)
- Reduced Hazardous Materials to 30-day supply
- Wastes reduced considerably over the years
- Checks and Balances
- Great communication and partnership

- Negatives

- Change in Personnel
- Decline in the consistency
- Decline in good paper documentation / records keeping

Questions

- Please limit questions to the following:

- Restaurants
- Sites to visit
- Rock Fever
- And similar



- Oops (If I was lucky I ran the time out for questions!)