Table of Contents

I. PURPOSE 2
II. SCOPE 2
III. PROCEDURE 2
IV. WASTE ESTIMATION 2
V. WASTE SEGREGATION 3
VI. RECYCLING 3
VII. WASTE HANDLING MATRIX 3
VIII. STORAGE REQUIREMENTS 8
IX. PPE 8
X. EDUCATION AND TRAINING 9

I. PURPOSE

The purpose of this waste management strategy was developed to provide guidance and requirements necessary for efficient, effective and compliant waste management during construction and operations.

II. SCOPE

This procedure applies to all Gallant Builders, LLC (Gallant) employees. When work is performed on a non-owned or operated site, the operator's program shall take precedence, however, this document covers Gallant employees and contractors and shall be used on owned premises, or when an operator's program doesn't exist or is less stringent.

III. PROCEDURE

The Gallant Safety Director or other designated person in his or her absence is accountable for managing waste and disposition of wastes generated at the work site.

IV. WASTE ESTIMATION

Each work site will estimate the waste, trash and/or scrap that will be generated and taken into consideration prior to work being performed so the need for containers and waste removal, if necessary, can be determined.

Each site will utilize the following for planning of dumpster scheduling and total non-hazardous dry waste material. These figures do not include neither recycling nor waste minimization efforts and reflect no use of an incinerator. Dumpster figures are based on a 40 yard container and can be modified if another size is used by changing the table below.

SAMPLE ONLY - SOLID WASTE

Number of Employees	**10**	**25**	**35**	**50**	**100**
Total Estimated Square Feet of Waste (@ 0.675 cu ft per person daily)					
Daily	7	17	24	34	68
Weekly	47	118	165	236	473
Monthly (4.33 wks)	205	511	716	1,023	2,046
Annual	2,455	6,138	8,593	12,276	24,551
Total Estimated Weight of Waste (@ 4lb per person daily)	40	100	140	200	400
Weekly	280	700	980	1,400	2,800
Monthly (4.33 wks)	1,212	3,031	4,243	6,062	12,124
Annual	14,549	36,372	50,921	72,744	145,488
Number of Total Dumpster Fills 40 yard dumpster 7x8x22 = 1,232 square feet					
Daily	0.0	0.0	0.0	0.0	0.1
Weekly	0.0	0.1	0.1	0.2	0.4
Monthly (4.33 wks)	0.2	0.4	0.6	0.8	1.7
Annual	2.0	5.0	7.0	10.0	19.9

Gallant must coordinate with the project site or owner to ensure proper disposal of wastes or scrap materials.

Gallant must ensure the owner client is aware of whether wastes and scrap materials will be taken off site by Gallant or will be disposed of on the owner client's site.

V. WASTE SEGREGATION

- Do not mix waste streams
- Only place waste in the designated container, satellite accumulation area (SAA), recyclable accumulation area (RAA), universal waste accumulation area (UWAA) or designated dumpster.

VI. RECYCLING

Wastes should be recycled whenever practicable. Gallant will encourage proper segregation of waste materials to ensure opportunities for reuse or recycling occurs at each work site. The collection of recycled material will reduce the total load on the environment. Bins of sufficient size must be lined with a plastic bag and clearly labeled for use. Posters from Gallant will be posted throughout the work site to encourage recycling. Collection bins will also be placed in administrative areas will follow the following color guiding:

- Blue - Paper
- Green - Aluminum cans
- Yellow - Plastic

Cardboard will be flattened, staples and excess shipping tape removed. No cardboard shall be placed in the dumpster used for the landfill.

VII. WASTE HANDLING MATRIX

Each work site will develop a Waste Handling Matrix (sample shown) that will:

- Address safe practices related to the immediate storage and handling of waste, scrap or leftover material.
- The handling, organization and storage of waste and scrap materials to minimize potential impact to the environment. Waste materials shall be properly stored and handled to minimize the potential for a spill or impact to the environment. During outdoor activities receptacles must be covered to prevent dispersion of waste materials and to control the potential for runoff.

Waste Stream	Location	Activity Generating Waste	Hazardous/Non Hazardous	Safe Storage Practice	Disposal Method	PPE or Other Precautions
Aerosol Can Contents	Equipment Repair Shop	Puncturing of aerosol cans	Hazardous	SAA is self-contained in the equipment repair shop	Ship to assigned site for recycling or disposal	Read warnings before use of unit.
Aerosol Can Puncturing Unit Filter	Equipment Repair Shop	Filter Changes	Hazardous	Place in designated labeled container	Ship to assigned site for recycling or disposal	Change filter every 3 months

Waste Stream	Location	Activity Generating Waste	Hazardous/Non Hazardous	Safe Storage Practice	Disposal Method	PPE or Other Precautions
Aerosol Cans	Various Locations	Painting, lubricants, cleaning	Non-Hazardous if aerosol can is punctured and drained	Place punctured aerosol can in RAA storage drum	Crush RAA storage drum and place in the scrap metal dumpster from client.	See "Scrap Metal" for waste stream management
Ash	Smart Ash Unit	Incineration of acceptable waste	Non Hazardous	Dispose of Immediately	Place in the Burnable Waste Dumpster	Gloves Goggles
Automotive and Heavy Equipment Parts-Used	Equipment Repair Shop and Fab Shop	Replacement	Non-Hazardous	Place in RAA	Returned to vendors for recycling	Starters, Alternators, Pumps, Transmissions
Batteries (Alkaline)	Various Locations	Battery Failures	Universal Waste	Place in the UWAA	"D" cell and below are acceptable in the Non-Burnable Waste Dumpster	Ship to designated site for recycling or disposal
Batteries (Lead Acid)	Equipment Repair Shop and Fab Shop	Battery Failures	Universal Waste	No storage allowed. Containment boxes are labeled and available in the shops.	Lead acid batteries are returned to the Vendor upon removal	Ship to designated site for recycling
Batteries (NiCad)	Various Locations	Battery Failures	Universal Waste	UWAA in the equipment repair shop.	Ship to assigned site for recycling or disposal	Cell phones, radios
Butane Torch Bottle	Various Locations	Mechanic activities	Excluded Hazardous if recycled	Place drained Butane Torch	Crush RAA storage drum and place in	Prosolv Butane Bottle processor l

Waste Stream	Location	Activity Generating Waste	Hazardous/Non Hazardous	Safe Storage Practice	Disposal Method	PPE or Other Precautions
				Bottles in RAA storage drum	the scrap metal dumpster	
Cardboard/Office Paper	Parts Department & Offices	Shipping Boxes & Office Activities	Non-Hazardous	Place in RAA	Place on pallet in RAA and band for shipment to assigned site for recycling.	
Computers Discarded	Parts Department & Offices	Replacement	Non-Hazardous	Place in RAA	Ship to assigned site for recycling or disposal	
Diesel Filters-Used	Equipment Repair Shop and Fab Shop	Filter Changes	Non-Hazardous	RAA for drained and crushed used filters	Drain for 12 hrs., crush and incinerate in Smart Ash unit	Place metal in recycle metal dumpster
Diesel Rags	Various Locations	Mechanic activities	Non-Hazardous	Oily waste rag in clear bags w/yellow stripes.	Incinerated in Smart Ash unit	See "Ash" for management and disposal
Drained Diesel	Equipment Repair and Fab Shop	Draining diesel fuel and filters	Non-Hazardous when burned as off-Spec fuel	Place in "used oil" tank in the equipment repair shop and fab shop.	Burned for energy recovery in clean burn multi-oil heating system.	
Empty Paint Cans	Various Locations	Painting activities	Non-Hazardous	No storage allowed	Ship to assigned site for recycling or disposal	Paint cans must be RCRA empty.
Fluorescent Light Ballast	Various Locations	Failure	Non-Hazardous unless they	None	Place in Non-Burnable	Ballast will say on the label if it contains PCB's

Waste Stream	Location	Activity Generating Waste	Hazardous/Non Hazardous	Safe Storage Practice	Disposal Method	PPE or Other Precautions
			contain PCB's or DEHP		Dumpster	
Fluorescent Light Bulbs	Shops, Office Areas	Bulb replacement	Universal Waste	Place bulbs in their original container in the RAA in the shop area	Ship to assigned site for recycling or disposal	Label bulbs "Used Bulb" when put into RAA.
Glass	Various Locations	Replacement	Non-Hazardous	None	Place in Non-Burnable Dumpster	Ensure glass containers are empty.
Glycol Rags	Equipment Repair Shop and Fab Shop	Fluid Changes	Non-Hazardous	Oily waste rag WAA's lined w/clear bags w/yellow stripes.	Incinerated in Smart Ash unit	Minimize use of absorbent rags
Glycol-Used	Equipment Repair Shop and Fab Shop	Fluid Changes	Non-Hazardous	RAA - self-contained tank on recycling unit	Recycled in glycol recycling unit	Recycling unit stored in shop
Grinding Wheels	Equipment Repair Shop and Fab Shop	Grinding activities	Non-Hazardous	None	Place in Non-Burnable Dumpster	
Hoses & Belts	Equipment Repair Shop and Fab Shop	Replacement	Non-Hazardous	Place in Non-Burnable Dumpster	Place in Non-Burnable Dumpster	Drain all fluids from hoses
Metal Shavings/Cuttings	Equipment Repair Shop and Fab Shop	Fabricating activities	Excluded Hazardous if recycled	Placed in recycle metal dumpster or metal only RAA's	Place in recycle metal dumpster	Ensure there are no free flowing cutting fluids present before disposal.
Oil Filters-Used	Equipment Repair Shop and Fab Shop	Oil filter changes	Excluded Hazardous	RAA for drained and crushed used filters	Drain for 12 hrs., crush and incinerate in Smart	Place metal in recycle metal dumpster

Waste Stream	Location	Activity Generating Waste	Hazardous/Non Hazardous	Safe Storage Practice	Disposal Method	PPE or Other Precautions
					Ash unit	
Oil-Used	Equipment Repair Shop, Fab Shop, Service Trucks	Draining oil and filters	Excluded Hazardous if burned for energy recovery	Receiving sumps are located in the Equipment Repair Shop and Fab Shop	Burned for energy recovery in clean burn multi-oil heating system.	Keep lids on receiving sumps at all times. DO NOT PUT SOLVENTS INTO USED OIL
Oily Waste (rags, absorbents)	Various Locations	Mechanic activities, equipment drips and leaks	Non-Hazardous	Oily waste rag WAA's lined w/clear bags w/yellow stripes.	Incinerated in Smart Ash unit	Collected daily. See "Ash" for management and disposal
Paint Waste (rags, rollers, brushes, etc.)	Various Locations	Painting activities	Determine on per occurrence basis. Use MSDS or testing	If hazardous, store in the assigned area. If non-hazardous, no storage is required.	If hazardous, ship to assigned site for disposal. If non-hazardous, place in burnable waste dumpster.	Need to review MSDS, do analytical test, or use generator knowledge to make waste determinations.
Parts Cleaner Rags	Equipment Repair Shop	Cleaning parts	Non-Hazardous	Oily waste rag WAA's lined w/clear bags w/yellow stripes.	Incinerated in Smart Ash unit	See "Ash" for management and disposal
Scrap Metal	Various Locations	Fabrication activities & house cleaning	Excluded Hazardous if recycled	Placed in recycle metal dumpster or metal only RAA's	Place in recycle metal dumpster	Eye Protection Gloves

Waste Stream	Location	Activity Generating Waste	Hazardous/Non Hazardous	Safe Storage Practice	Disposal Method	PPE or Other Precautions
Sodium Vapor/ Metal Halide Light Bulbs	Various Locations	Bulb replacement	Universal Waste	Place bulbs in their original container in the RAA.	Ship to assigned site for recycling or disposal	Label bulbs "Used Bulb" when put into RAA.
Tires	Various Locations	Replacement	Non-Hazardous	None	Place tires up to 20" rim diameter into dumpster.	
Toner Cartridges	Offices	Copiers, printers, fax machines	Non-Hazardous	Placed in original container in RAA	Ship to assigned site for recycling or disposal	Verify toner is expended before disposal.
Water Scrubber Filter & Absorbents	Equipment Repair Shop and Fab Shop	Filtering sump water in shops	Non-Hazardous	None	Incinerated in Smart Ash unit	See "Ash" for management and disposal
Welding Rods	Various Locations	Welding activities	Excluded Hazardous	Placed in recycle metal dumpster or metal only RAA's	Ship to assigned site for recycling or disposal	See "Scrap Metal" for waste stream management
Wood Waste	Various Locations	Various activities and shipping pallets	Non-Hazardous	Store on the far back corner of the pad or in the dump truck box if available.	Place in recycle wood dumpster	Pallets are refurbished and recycled when possible

VIII. STORAGE REQUIREMENTS

Gallant must ensure project related wastes are stored and maintained in an organized fashion to encourage proper disposal and minimize risks to employees. Proper waste receptacles must be provided for trash and materials that may be reused or recycled during a project.

IX. PPE

For each site waste management plan Gallant shall determine a PPE matrix that includes gloves, hand protection, eye and face protection and/or other necessary PPE.

X. EDUCATION AND TRAINING

Employees shall be instructed on managing waste generated at the work site and on the proper disposal method of wastes. Examples include:

- Instruction on the proper handling, storage and disposal of wastes and depending on the waste generated at the site to also include general instruction on disposal of non-hazardous wastes, trash or scrap materials. If wastes generated are classified as hazardous then employees shall be trained to ensure proper disposal and compliance with regulations.
- Minimization methods to reduce waste.
- Recycling methods and proper PPE to be utilized.