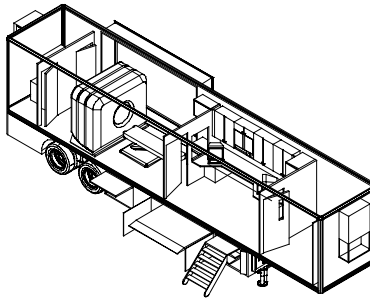




## SITE PLANNING GUIDE

MOBILE CT SCANNER  
Philips Brilliance 16 Slice  
46' Trailer

Manufactured by  
MEDICAL COACHES, INCORPORATED



Proper site preparation for special-purpose mobile units is critical to their successful operation. This guide has been assembled to provide you with detailed site planning and preparation data specifically for the Philips Brilliance CT System installed in a Medical Coaches MobileUnit. The information compiled and provided should be sufficient to cover most site planning requirements. If additional questions do arise, please contact DMS Interim Solutions directly. See page 4.

DMS Interim Solutions continues to learn from our valued customers. We invite your comments and suggestions on any improvements to this document, and sincerely appreciate your past contributions.

**SITE PLANNING GUIDE REVISION SHEET**

REV	PAGES	DESCRIPTION OF CHANGE	UNIT & DATE
-		Initial Release	7-16-01
A	Cover	Updated isometric view of trailer	10/22/01
	12	Updated D13113 to Rev. C	10/22/01
	14	Updated D13144 to Rev. A	10/22/01
	15	Updated D13144 to Rev. A	10/22/01
	16	Updated D13144 to Rev. A	10/22/01
	17	Updated D13144 to Rev. A	10/22/01
B	1	Corrected revision page to show correct drawing revision (D13113)	11/14/01

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## **1.0. SUPPORT PAD REQUIREMENTS:**

The following is a list of recommendations and requirements for a concrete support pad.

### **1.1. RECOMMENDED SUPPORT PAD:**

A pad measuring 47' long by 10' wide should be located as shown on the drawing on page 17. This sized pad represents a minimum required.

### **1.2. SUPPORT PAD DEPTH:**

Recommendations for the length and width of pad are given above. However, the depth should be determined by a local contractor based upon the weight distribution information given on the drawing on page 17 and existing site conditions.

### **1.3. SUPPORT PAD LEVELNESS:**

The CT System requires that the support pad be LEVEL FOR PROPER OPERATION. The pad must not exceed .25 inch deviation in 10 feet 0 inches.

### **1.4. RECOMMENDED SERVICE PAD:**

A full pad measuring 10 feet by 47 feet should be provided for ease of service access.

### **1.5. ATTACHING TO BUILDING:**

If using a dock seal or similar inflatable seal to attach the Mobile Unit to a building, pages 14 and 15 can be used as guides.

### **1.6. SITE VARIATIONS AND SUPPORT PAD REQUIREMENTS**

The support Pad Requirements described under 1.1 to 1.4 and accompanying drawings outline an ideal pad. Many hospitals and medical service centers prepare sites to these specifications to accommodate multiple mobile units or for long term siting. Sites meeting standards reduce set-up time.

We do recognize that all sites cannot meet these stringent requirements for a multitude of reasons. In these cases, sites must meet at least the following minimum requirements for support pad compliance shown on page 17.

### **1.7. PAD LOCATION**

To assure that proper functioning of all equipment inside the trailer, the trailer can not be in a one Gauss or greater magnetic field.

### **! CAUTION !**

The ability to properly level our trailer is mandatory for operation of sides and medical equipment. Failure to properly level the unit can cause frame damage and void body warranty.

If you require assistance, please contact DMS Interim Solutions directly.

TEL 877-441-0635

FAX 763-425-4709

Jeff Stroger  
Operations Manager

Scott Brush  
Transportation Coordinator

## **2.0. CUSTOMER POWER REQUIREMENTS:**

The following shows the electrical specifications needed to run the Philips Mobile CT System. Please contact factory for more information on requirements.

### **2.1. ELECTRICAL SERVICE:**

A 480VAC, three phase, fused at a minimum 150Amps is the service required. Maximum allowable line voltage variation is +/- 5 percent (456-504VAC).

### **2.2. CONFIGURATION:**

Three phase wye.

### **2.3. FREQUENCY:**

60 Hertz +/- 1.0 Hertz.

### **2.4. SHORELINE CABLE:**

A 50 foot shoreline wired directly to trailer is provided for connecting the mobile unit to local power. The shoreline is located in the rear skirt compartment and may be drawn from either side of the trailer. The end has a Russell-Stoll DS2504MP(480V) to mate with the site receptacle.

### **2.5. CUSTOMER RECEPTACLE:**

The facility must have the matching receptacle as specified on page 13. This receptacle needs to be a Russell-Stoll DF2504FRAB(480V). Connection should be prepared by a qualified electrician.

### **2.6. GROUNDING:**

The ground for the system shall originate at the system power source (transformer or first access point of power) and be continuous to our system power disconnect in the room. This ground can be spliced with high compression fittings and should be terminated at each distribution panel it passes through. When it is broken for a connection to a panel, it shall be connected into an approved grounding block with the incoming and outgoing ground in this same grounding block, which is then connected to the steel panel never using the steel panel or other steel as the block.

The connection at the power source shall be at the grounding point of the neutral/ground if a wye transformer is used, or typical grounding points of a separately derived system. In the case of an external facility, it shall be bonded to the facility ground point at the service entrance.

### **2.7. GROUND WIRE:**

The ground wire shall be copper wire with a minimum of AWG 1/0 or the same size as the power feeders, whichever is larger. This means that if there is a primary feeder to a distribution panel of 500 MCM with a secondary feeder to the system of AWG 1/0 wire, the ground to the distribution panel shall be 500 MCM with an AWG 1/0 to the system. The ground wire impedance from our

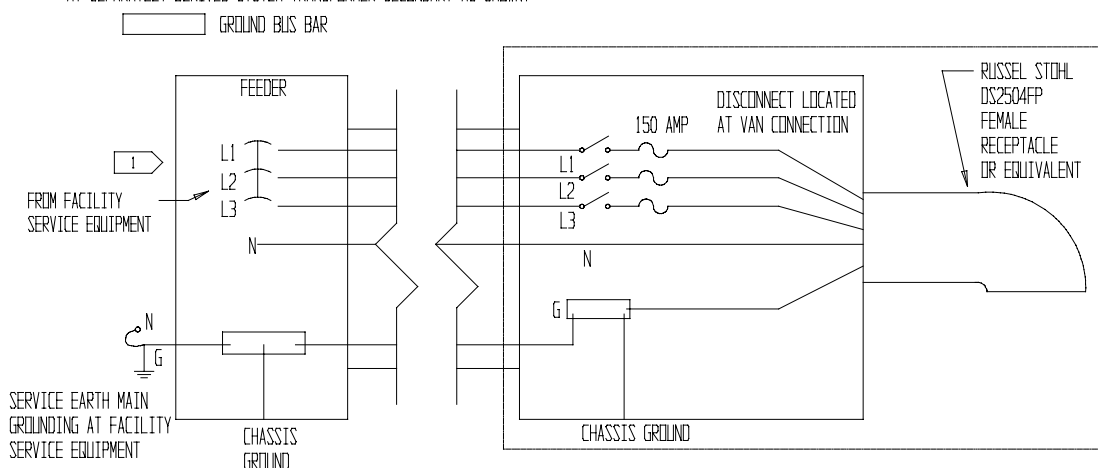
system disconnect, including the ground rod, shall not have an impedance greater than 2 ohms to earth as measured by one of the applicable techniques in section 4 of ANSI/IEEE standard 142-1982.

NOTE:

ALL WORK TO BE DONE IN ACCORDANCE WITH NATIONAL AND LOCAL ELECTRICAL CODES. INFORMATION SHOWN HERE IS ONLY A RECOMMENDATION, MUST BE VERIFIED FOR SITE, NATIONAL AND LOCAL CODES.

1 GROUND WIRES INSIDE ENCLOSURES TO BE TAPED GREEN FOR ENTIRE VISUAL LENGTH FOR IDENTIFICATION.

MAIN BONDING JUMPER BETWEEN GROUNDED CONDUCTOR AND EQUIPMENT GROUNDING CONDUCTOR TO BE PROVIDED IN FACILITY SERVICE EQUIPMENT AND DOWNSTREAM AT SEPARATELY DERIVED SYSTEM TRANSFORMER SECONDARY AS SHOWN.



## 2.8. IN-TRANSIT GENERATOR POWER:

During transit (when the Mobile Unit is NOT connected to shore power), the generator MUST run. This assures that the HVAC and the humidifier will operate to maintain proper environmental conditions required for the CT system. This requires that sufficient water must be available in the tank to maintain humidifier operation when not on shore power and adequate amount of diesel fuel for the generator.

**3.0. WATER SUPPLY REQUIREMENTS:**

Only a  $\frac{3}{4}$ " cold water garden hose is required. This unit can be operated either with water line connected and pressurized or disconnected, providing tank is refilled as needed. The tank size is 38 gallons and should typically be refilled every 24 hours.

**3.1. TRAILER:**

The water fill connection is in the streetside compartment. A special opening is provided in the bottom of the compartment.

**3.2. COLD WATER PROTECTION:**

All on-board tanks and lines are weather protected. The site must provide for weather-protected supply line to prevent freeze up.



**4.0. COMMUNICATION SERVICE:**

This mobile system is supplied with two telephone connections and three RJ45 connections.

**4.1. DESCRIPTION OF PHONE CONNECTORS SUPPLIED:**

The inlet receptacles for on site hook ups are located in the rear curbside skirt compartment. The phone receptacles are marine grade with spring-loaded covers, Hubbell PH6595. A 50 foot pre-wired connecting cable, Hubbell PH6599, is shipped with system.

**4.2. DATA TRANSFER LINE:**

Three standard RJ45 connections, with cover, are also provided. These connections are provided for data transfer.

The customer should supply:

Weatherproof outlets (Hubbell PH6597), mounted in weatherproof boxes (Hubbell PH6619), within 50 feet of the mobile system.

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## **5.0. SITE CLEARANCE REQUIREMENTS:**

### **5.1. MOBILE UNIT CLEARANCE REQUIREMENTS:**

Refer to illustration on page 15 depicting clearance required around the mobile unit.

### **5.2. SWING DIMENSIONS OF DOORS:**

Swing dimensions are shown for all compartment doors and entrance door. Service access should be an additional 36 inches to all dimensions shown (indicated on D13144-2 on page 15). These dimensions must be considered when contemplating parking near a building or other obstruction. Patient and staff access and entrance should also be convenient to the mobile unit site.

## **6.0 RADIATION/GAUSS FIELD INFORMATION:**

### **6.1 Radiation Field Information**

It IS the responsibility of the customer to ensure a safe environment with respect to the radiation field.

Customer must contact their local Radiation Safety Operation Official for the federal, state and local guidelines and must comply with these safety requirements.

## 6.2 GAUSS FIELD INFORMATION:

Check with DMS Interim Solutions should you need to assess the possibility of a magnetic field which would create errors in the CT operation.

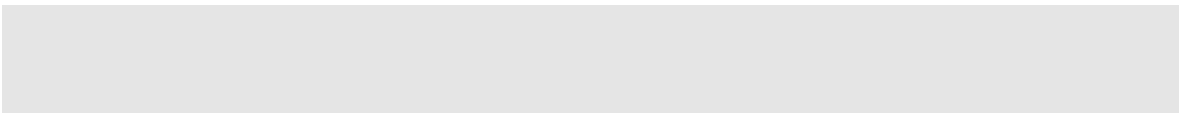
### **! CAUTION !**

To assure proper functioning of all equipment inside the trailer, the trailer can not be in a one gauss or greater magnetic field.

## 7.0. REGULATIONS:

This mobile unit has been designed to comply with Federal regulations in existence at time of manufacture. Local and State regulations may differ from site to site. It is the responsibility of each site to ensure that these regulations are met and encumber any costs associated with unique alterations or additional equipment required.

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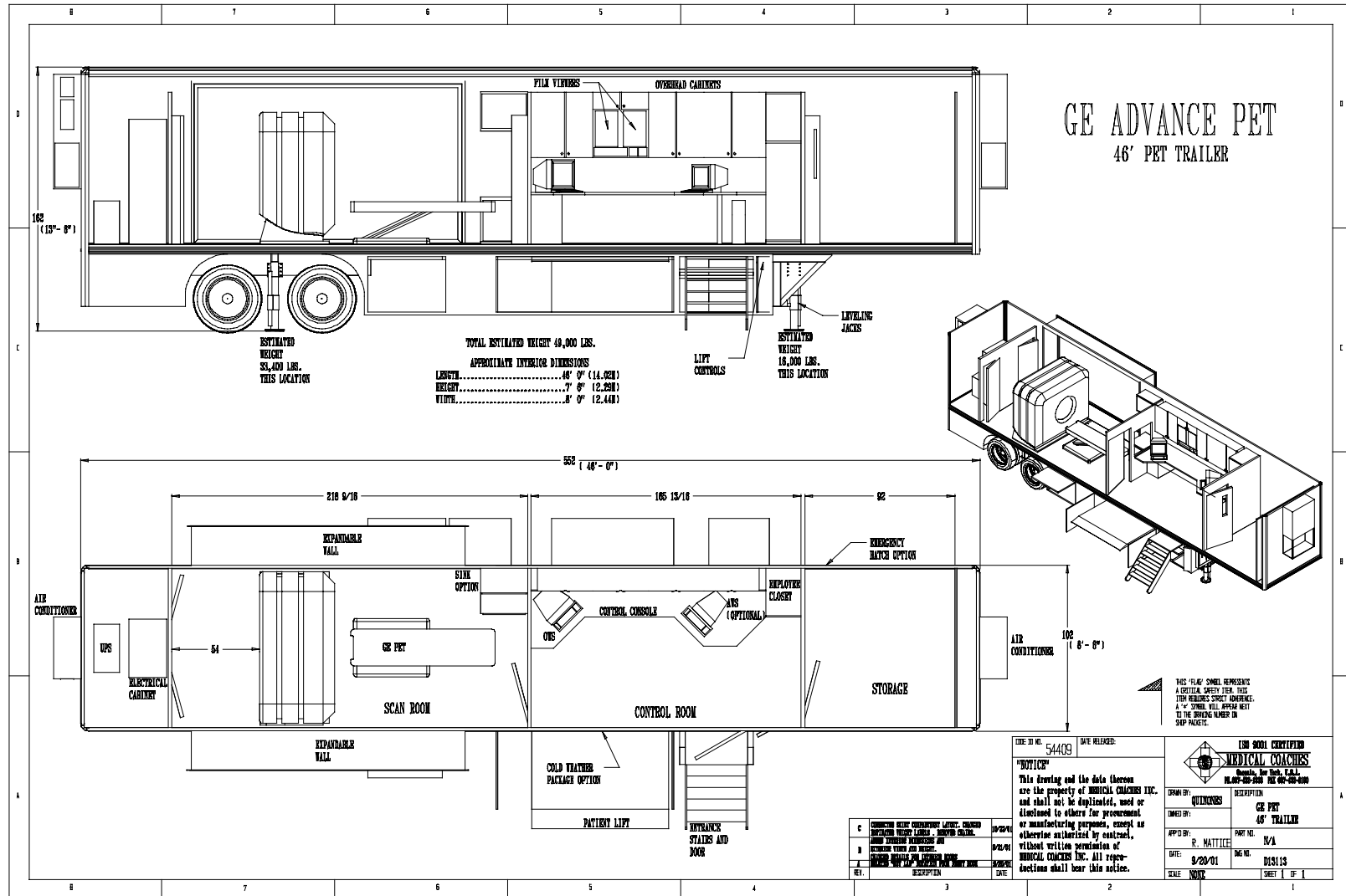
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## **Drawing List**

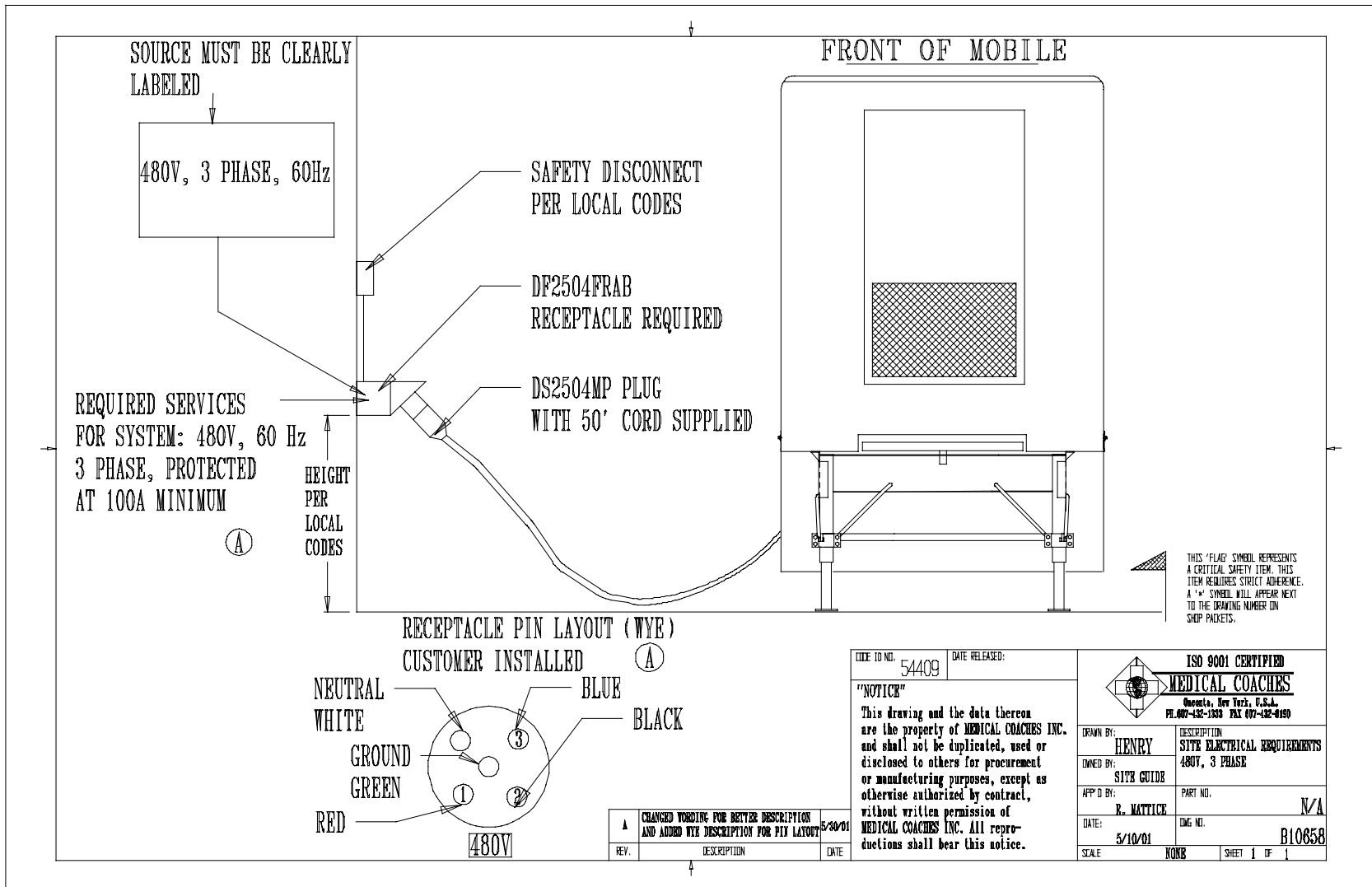
The following pages contain drawings used by DMS Interim Solutions for a site planning guide. These drawings serve as a visual aide for reference only. Understanding or use of these prints is not necessary for the use of this unit.

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<b>Lettering Guide</b>	<b>14</b>
<b>Exterior Clearance Requirements</b>	<b>15</b>
<b>Exterior Views</b>	<b>16</b>
<b>Pad Requirements</b>	<b>17</b>
<b>Swing Radius</b>	<b>18</b>

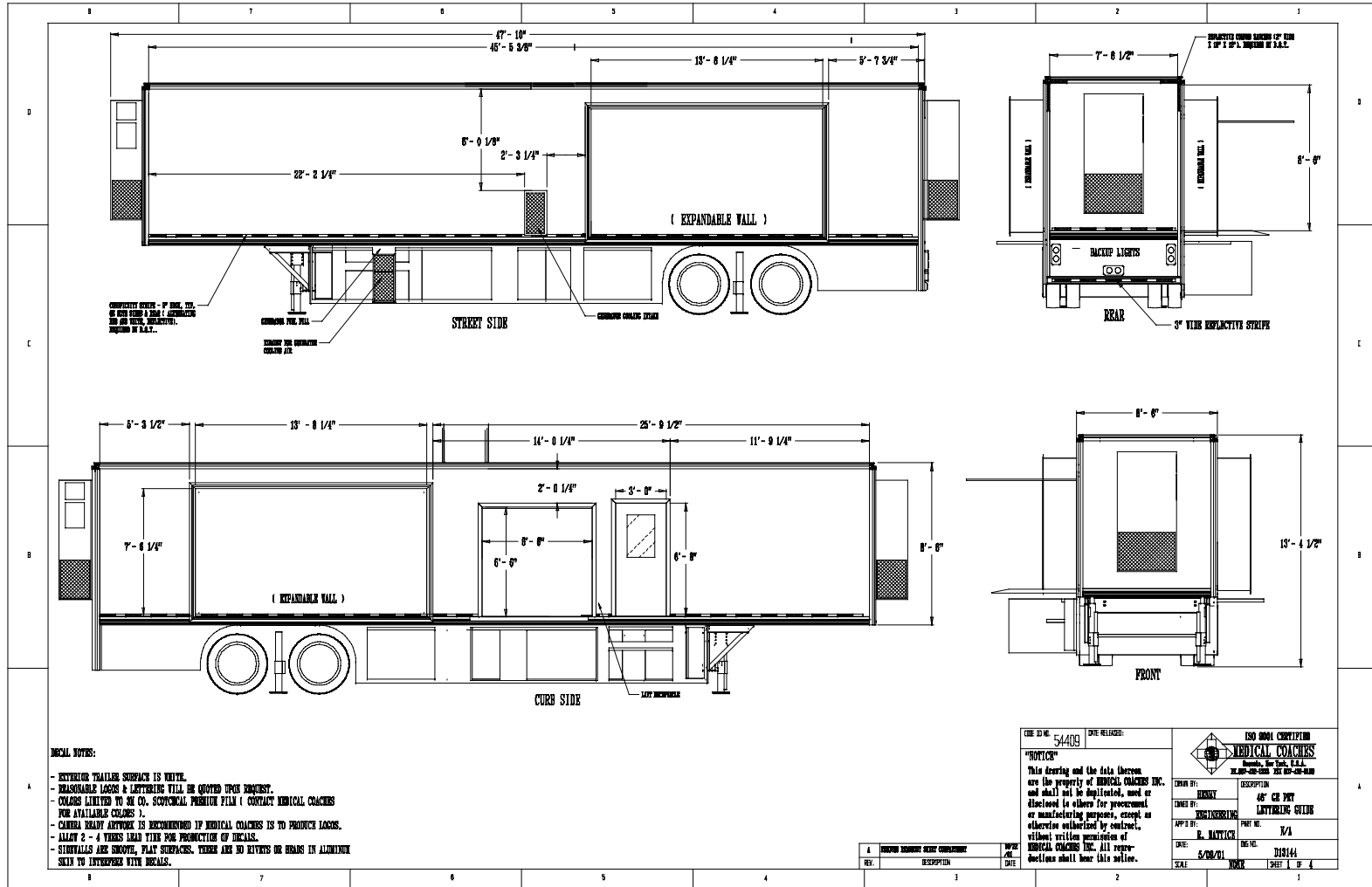
D13113

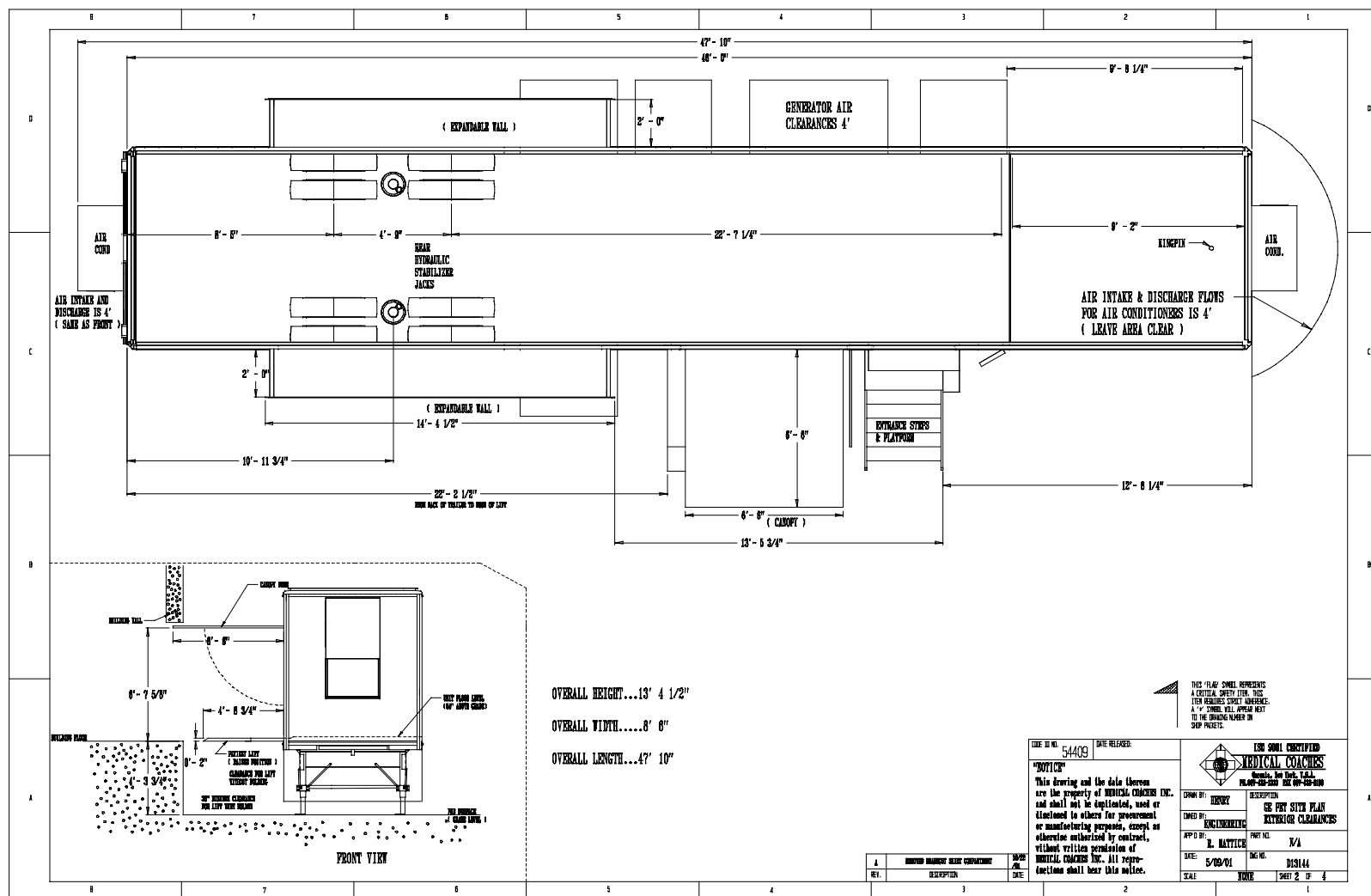


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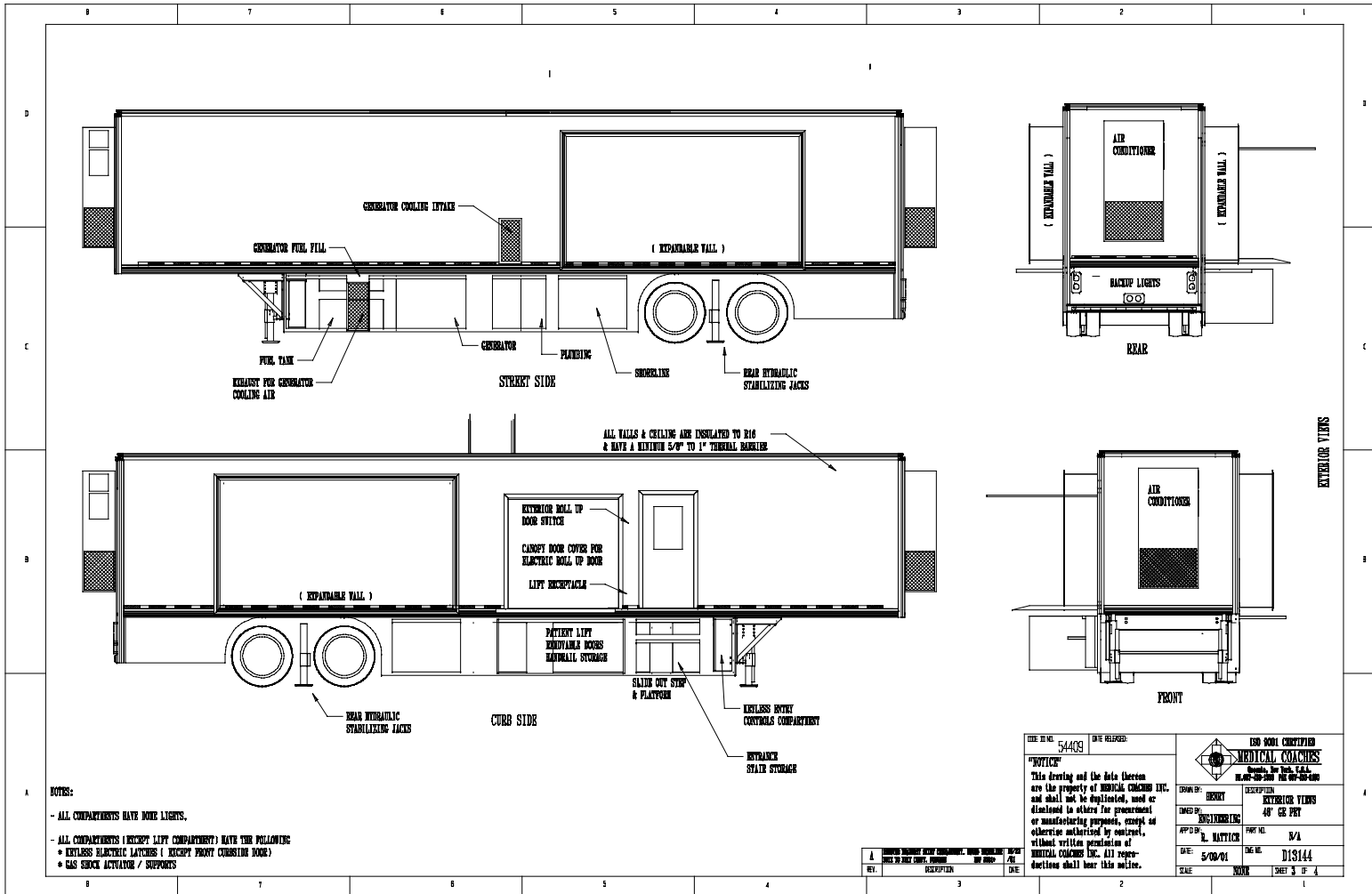
D13144-1



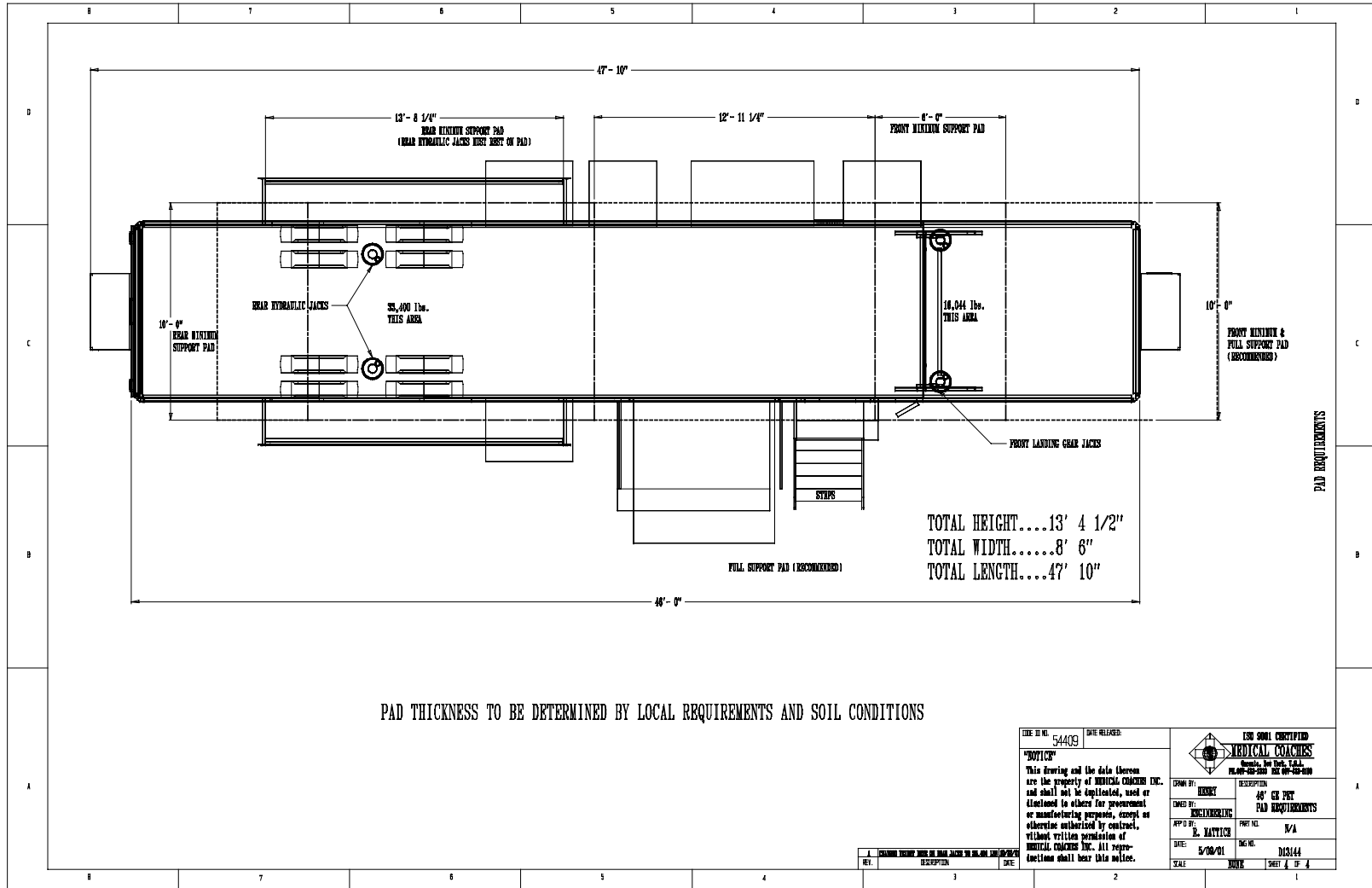




D13144-3



D13144-4



D13109

