



# CRITICAL LIFT PLAN

Today's Date: \_\_\_\_\_ Lift Location: \_\_\_\_\_

## PROJECT INFORMATION

CCSI Job Number: \_\_\_\_\_ Job Name: \_\_\_\_\_

Rigging Company: \_\_\_\_\_ Rigging Contact: \_\_\_\_\_

Crane Company: \_\_\_\_\_ Crane Co. Contact: \_\_\_\_\_

## CRANE INFORMATION

Make: \_\_\_\_\_ Type:  Hydraulic  Friction  
 Model: \_\_\_\_\_  Lattice  Truck  
 Serial No.: \_\_\_\_\_  All Terrain  Rough Terrain  
 Size (Tons): \_\_\_\_\_  Crawler  
 Boom Length: \_\_\_\_\_  
 Jib Length: \_\_\_\_\_  
 Offset, if used: \_\_\_\_\_  
 Load Line # of Parts: \_\_\_\_\_  
 Lift Block Capacity: \_\_\_\_\_

Will outriggers be fully extended?  Yes  No If no, explain: \_\_\_\_\_

Will Lift Plan be based on 360° chart?  Yes  No If no, explain: \_\_\_\_\_

Will this plan require more than one crane, either for a dual-lift or for material handling?  Yes  No If yes, explain: \_\_\_\_\_

Will crane(s) need to "walk" with load(s)?  Yes  No If yes, explain: \_\_\_\_\_

*For a dual-lift, an engineered composite Lift Plan (all figures, calculations and drawings for both cranes on the same Lift Plan) must be completed. For multiple cranes to be used on the same project, please complete a separate lift plan for each crane, to be submitted together.*

## LOAD CHARACTERISTICS

Will this plan cover more than one pick?  Yes  No

Describe loads: \_\_\_\_\_

Dimensions of max load (weight): \_\_\_\_\_ Weight of heaviest load: \_\_\_\_\_  
 (Attach calculations used to determine weight)

Dimensions of max load (volume): \_\_\_\_\_ Location of load center of gravity: \_\_\_\_\_  
 (Attach calculations used to determine center of gravity)

Maximum boom length required: \_\_\_\_\_

Minimum boom angle required: \_\_\_\_\_

Maximum radius required: \_\_\_\_\_

Will load be upended?  Yes  No  
 If so, explain why and how (multi-drum, dual crane, lift/block/lift, etc.) \_\_\_\_\_

## RIGGING INFORMATION

Describe rigging components: (be specific - number, type, size, length, capacity, differing pick configurations, etc.)

Describe and show minimum capacity component: \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

Worst case weight of all rigging: \_\_\_\_\_

If a lifting beam or other similar component is used, attach capacity, PE certification and drawing.

Other weights to be considered to determine gross load:

Max Load: _____	Hook Block: _____
Rigging: _____	Load Line: _____
Jib: _____	Max Gross Load: _____
Jib hook: _____	Other: _____

**CRANE LOCATION / CLEARANCE**

1. Provide a to-scale plot plan showing crane location, adjacent buildings, piperacks and other significant obstructions within load swing radius. Indicate direction and span of swing.
2. Provide a to-scale elevation depicting crane, adjacent structures and load.
3. What is horizontal distance from the crane center pin to the nearest structure? \_\_\_\_\_
4. What is minimum clearance from boom to highest point of structure during pick? \_\_\_\_\_
5. What is minimum clearance from load to highest point of structure during pick? \_\_\_\_\_
6. What is minimum distance from boom to load during pick? \_\_\_\_\_
7. If the load or any part of the crane will be over any active piping, tanks or equipment during pick, please explain: \_\_\_\_\_
8. Confirm underground site utilities have been identified. \_\_\_\_\_
9. If outriggers will be located over underground utilities, please explain.  
 \_\_\_\_\_
10. Will signaling be by hand or radio? \_\_\_\_\_
11. Who will be responsible for signaling? \_\_\_\_\_

**SUMMARY "WORST CASE LIFT SCENARIO"**

Maximum Radius: _____	Minimum Boom Angle: _____
Max Gross Load: _____	Max Chart Capacity: _____
Percentage of capacity Max Gross Load / Max Capacity: _____	

**ATTACHMENTS**

These attachments must be present to have a complete critical lift plan:

- |  |              |
|--|--------------|
| <input type="checkbox"/> Plot plan with crane location | Notes: _____ |
| <input type="checkbox"/> Elevation Plan                | Notes: _____ |
| <input type="checkbox"/> Load Calculations             | Notes: _____ |
| <input type="checkbox"/> Rigging Lists                 | Notes: _____ |
| <input type="checkbox"/> Crane Charts                  | Notes: _____ |

**ADDENDUM / ADDITIONAL CONSIDERATIONS**

Be prepared to confirm the following additional items:

1. Crane configuration in compliance with Lift Plan
2. Maximum radius confirmed (MEASURED) without load
3. Maximum load confirmed prior to achieving maximum radius
4. All pick points vertically above load center of gravity (NO SIDE LOADS)
5. Taglines to be used
6. Outrigger floats and dunnage installed (minimum 3'x3'x4') and size \_\_\_\_\_

- 7. Outriggers fully extended Position: \_\_\_\_\_ Computer set at: \_\_\_\_\_
- 8. Lift area and equipment inspected
- 9. Counterweight swing radius barricaded
- 10. Load swing radius barricaded
- 11. Copy of Demolition Plan in cab of crane (if applicable)
- 12. Lift Plan and Crane Permit in cab of crane
- 13. Lift Plan and Crane Permit with erection or demolition crew

The following items are required to be in the Crane Cab:

- |   |                          |  |                          |
|---|--------------------------|--|--------------------------|
| 1. Hand Signal Chart                        | <input type="checkbox"/> | 6. Last three Monthly Inspection Reports   | <input type="checkbox"/> |
| 2. Fire Extinguisher                        | <input type="checkbox"/> | 7. Operator's Manual                       | <input type="checkbox"/> |
| 3. Complete load capacity charts with notes | <input type="checkbox"/> | 8. State crane registration                | <input type="checkbox"/> |
| 4. 3rd party inspection report              | <input type="checkbox"/> | 9. All other required paperwork, PPE, etc. | <input type="checkbox"/> |
| 5. Completed Daily Inspection Sheet         | <input type="checkbox"/> |  |                          |

ALWAYS double-check the following:

- |   |                          |  |                          |
|---|--------------------------|--|--------------------------|
| 1. Anti-two block operational                         | <input type="checkbox"/> | 12. Chains and chain slings have capacity tags   | <input type="checkbox"/> |
| 2. Overhaul ball capacity marked                      | <input type="checkbox"/> | 13. All hooks inspected for wear and deformation   | <input type="checkbox"/> |
| 3. Wedge sock/becket properly installed               | <input type="checkbox"/> | 14. Safety latches in place  | <input type="checkbox"/> |
| 4. Backup alarm working                               | <input type="checkbox"/> | 15. Dunnage / blocking available to secure loads   | <input type="checkbox"/> |
| 5. All warning placards in place                      | <input type="checkbox"/> | 16. Demolition Plan submitted and reviewed (if applicable)   | <input type="checkbox"/> |
| 6. Boom angle indicator functioning properly          | <input type="checkbox"/> | 17. Bracing / temporary supports available for use (if loads need to be secured during demolition) | <input type="checkbox"/> |
| 7. Boom high limit functioning properly(lattice boom) | <input type="checkbox"/> |  |                          |
| 8. No broken or fogged glass                          | <input type="checkbox"/> |  |                          |
| 9. Boom light/beacon if boom is higher than 200'      | <input type="checkbox"/> |  |                          |
| 10. Slings and rigging inspected                      | <input type="checkbox"/> |  |                          |
| 11. All wire rope inspected                           | <input type="checkbox"/> |  |                          |

**This Critical Lift Plan is prepared by:**

**Company:** Composite Construction Systems, Inc.  
**By:** \_\_\_\_\_  
**Print Name:** \_\_\_\_\_  
**Title:** \_\_\_\_\_  
**Date:** \_\_\_\_\_

**The Critical Lift Plan is submitted to:**

**Company:** \_\_\_\_\_  
**Contact Name:** \_\_\_\_\_  
**Contact Title:** \_\_\_\_\_  
**Project Name:** \_\_\_\_\_  
**Project Location:** \_\_\_\_\_