



SECTION 3.1.1
74-6 CRANE INQUIRY DATA SHEET
FIGURE 6.1

Customer _____

Spec No. _____

Date _____

1. Number Cranes Required _____.

2. Capacity: Hoist(s) _____ Tons

3. Required Hook Lift (Max. Including Pits or Wells Below Floor Elevation)

Hoist _____ Ft. _____ In.

4. Approximate Length of Runway _____ Ft.

5. Number of Cranes on Runway _____. **Number of Cranes per bay?**

6. Service Information: (Description of Use)

Hoist:

Number of Lifts per Hour _____ Hours per Day _____

Height of Lift _____

Hook _____ Magnet _____ Other _____

Give Size & Weight of Magnet or any Attachment

Trolley:

Number Moves per Hour _____ Hours per Day _____ Speed _____ fpm

Average Movement _____ Ft.

Bridge:

Number Moves per Hour _____ Hours per Day _____ Average Movement _____

What do you do with the cranes? See CMAA Crane Classes PDF, scoll to last page



7. Furnish complete information regarding special conditions such as acid fumes, steam, high temperatures, high altitudes, excessive dust or moisture, very severe duty, special or precise load handling:

8. Ambient Temperature in Building: Max. _____ Min. _____

9. Material Handled _____

10. Speeds Required: Hoist _____ fpm Bridge _____ fpm Trolley _____ fpm

11. Crane to Operate: Indoors _____ Outdoors _____ Both _____

12. Current: Volts _____ Phase _____ Hertz _____ AC Volts _____ DC

13. Method of Control: Cab _____ Floor _____ Remote _____

14. Location of Control: End of Crane _____ Center _____ On Trolley _____

Other _____

15. Type of Control (Give complete information, including number of speed points)

Full Magnetic _____ Static _____ Other _____

16. Type of Control Enclosure: _____

17. Type of Motors: (Give complete information) _____

18. Must wiring comply with Special Conditions or Codes _____

Describe briefly (See Items 7 & 8) _____

19. Are Runway Conductors to be included:

Type: Loose Wires _____ Rigid Wires _____ Angles _____

Insulated (Mfr) _____ Other _____

20. List of Special Equipment or Accessories Desired _____



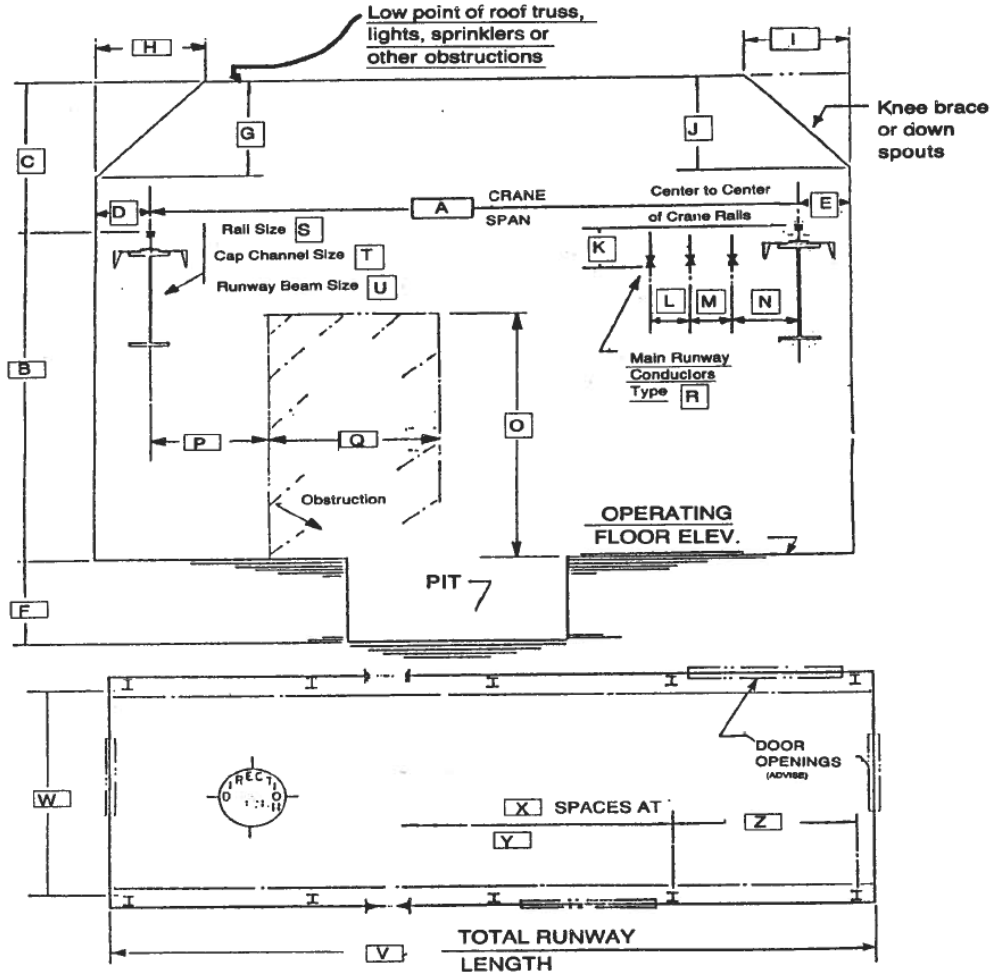
21. Specify when double hook cranes, double trolley cranes or special cranes are required giving detailed information on hook spacing, etc.

22. Complete attached building clearance drawing, making special note of any obstructions which may interfere with the crane, including special clearance conditions underneath the girders or cab.

CRANE INQUIRY DATA SHEET

**BUILDING CLEARANCES
FOR TOP RUNNING SINGLE GIRDER CRANES**

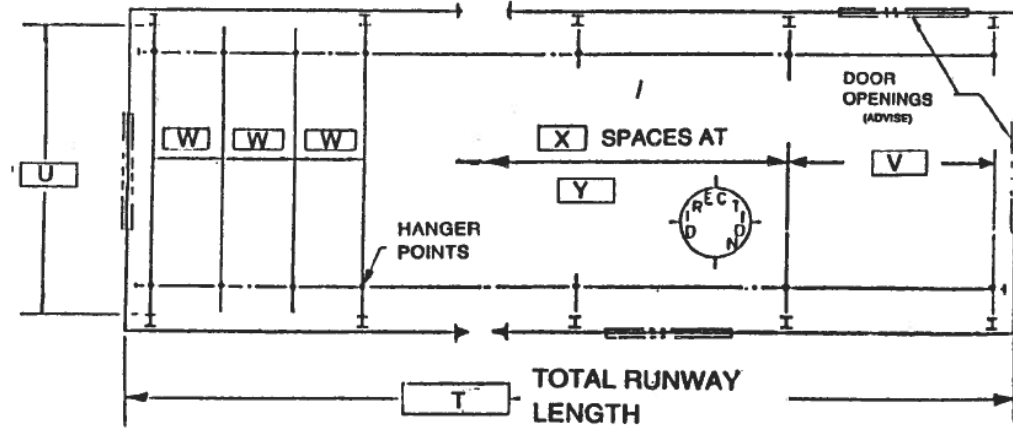
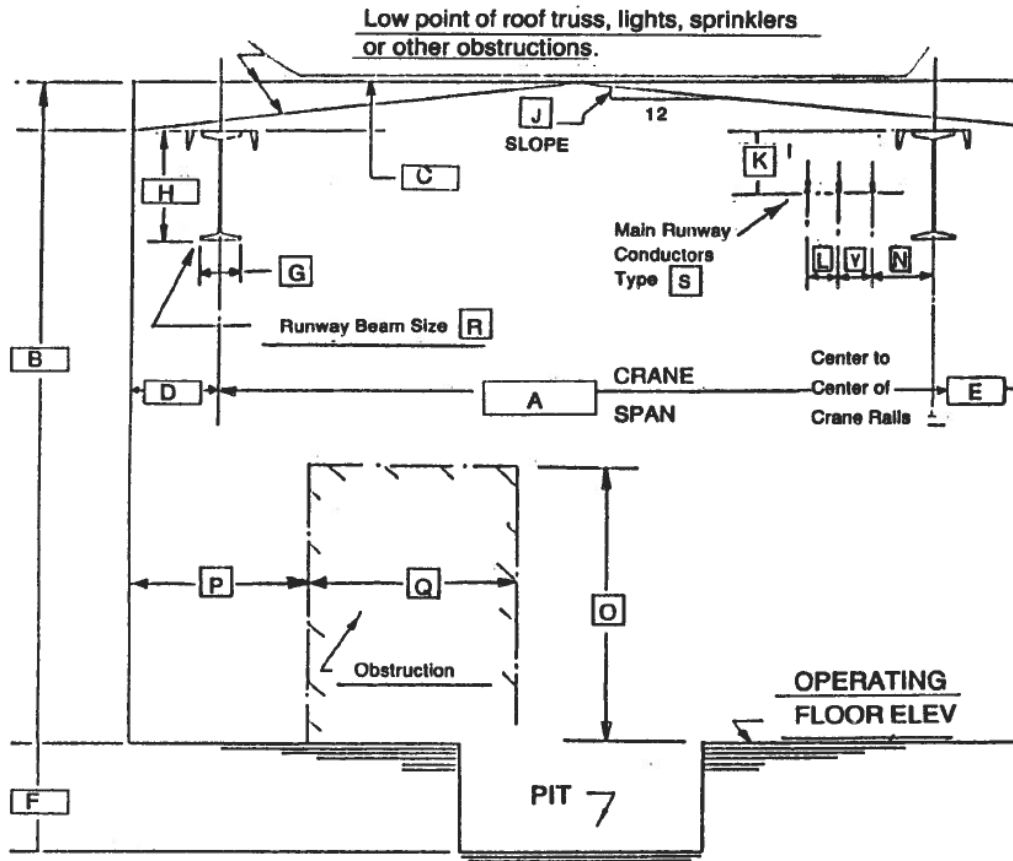
**BUILDING CLEARANCES
FOR TOP RUNNING SINGLE GIRDER CRANES**



A	_____	E	_____	I	_____	Q	_____	U	_____	Y	_____				
B	_____	F	_____	J	_____	R	_____	V	_____	Z	_____				
C	_____	G	_____	K	_____	S	_____	W	_____						
D	_____	H	_____	L	_____	T	_____	X	_____						
		A	_____	E	_____	I	_____	M	_____	Q	_____	U	_____	Y	_____
		B	_____	F	_____	J	_____	N	_____	R	_____	V	_____	Z	_____
		C	_____	G	_____	K	_____	O	_____	S	_____	W	_____		
		D	_____	H	_____	L	_____	P	_____	T	_____	X	_____		

CRANE INQUIRY DATA SHEET

**BUILDING CLEARANCES
FOR UNDER RUNNING SINGLE GIRDER CRANES**



A _____	E _____	I _____	N _____	R _____	V _____
B _____	F _____	J _____	O _____	S _____	W _____
C _____	G _____	K _____	P _____	T _____	X _____
D _____	H _____	L _____	Q _____	U _____	Y _____

Section 2.1.2

74-2 CRANE CLASSIFICATIONS

CMAA Crane Service Classes

CMAA has established crane service classes so that the most economical crane for a particular installation may be specified in accordance with *Specifications for Top Running Bridge & Gantry Type Multiple Girder Electric Overhead Traveling Cranes-No. 70* or *Specifications for Top Running and Under Running Single Girder Electric Overhead Cranes Utilizing Under Running Trolley Hoist-No. 74*. The crane service classification is based on the load spectrum reflecting the actual service conditions as closely as possible. The CMAA Crane Service Classes are as follows:

CLASS A (STANDBY OR INFREQUENT SERVICE)

This service class covers cranes which may be used in installations such as power houses, public utilities, turbine rooms, motor rooms and transformer stations where precise handling of equipment at slow speeds with long, idle periods between lifts are required. Capacity loads may be handled for initial installation of equipment and for infrequent maintenance.

CLASS B (LIGHT SERVICE)

This service covers cranes which may be used in repair shops, light assembly operations, service buildings, light warehousing, etc. where service requirements are light and the speed is slow. Loads may vary from no load to occasional full rated loads with two to five lifts per hour, averaging ten feet per lift.

CLASS C (MODERATE SERVICE)

This service covers cranes which may be used in machine shops or paper mill machine rooms, etc., where service requirements are moderate. In this type of service the crane will handle loads which average 50 percent of the rated capacity with 5 to 10 lifts per hour, averaging 15 feet, not over 50 percent of the lift at rated capacity.

CLASS D (HEAVY SERVICE)

This service covers cranes which may be used in heavy machine shops, foundries, fabricating plants, steel warehouses, container yards, lumber mills, etc., and standard duty bucket and magnet operations where heavy duty production is required. In this type of service, loads approaching 50 percent of the rated capacity will be handled constantly during the working period. High speeds are desirable for this type of service with 10 to 20 lifts per hour averaging 15 feet, not over 65 percent of the lifts at rated capacity.

This information has been presented for reference purposes only. For more information regarding load spectrum, mean effective load factors, load classes, load cycles and how these relate to the determination of crane service classes, please refer to *Specifications for Top Running Bridge & Gantry Type Multiple Girder Electric Overhead Traveling Cranes-No. 70* or *Specifications for Top Running and Under Running Single Girder Electric Overhead Cranes Utilizing Under Running Trolley Hoist-No. 74*. These documents are available for purchase online at <http://www.mhia.org/bookstore> or through the Literature Department at 704-676-1190.