

THIS SCOPE IS PROVIDED FOR INFORMATIONAL PURPOSES ONLY AND IS NOT TO BE USED TO DEVELOP COST PROPOSALS OR TO BE INCLUDED IN REPORTS. THE ACTUAL, BRIDGE SPECIFIC, MECHANICAL AND ELECTRICAL INSPECTION SCOPE-OF-WORK WILL BE PROVIDED THROUGH THE NJDOT PROJECT MANAGER.

SCOPE OF WORK FOR CONSULTANT INSPECTIONS

Type III (Current Date)

(State or County) Bridges

Group XXXX

State Job No. XXXXXXXX

3. For Movable Bridges

a) Mechanical Inspection

Structure XXXX-XXX

For movable bridges, perform a routine inspection of the items listed below and observe (during a trial opening) for smooth operation, uniform and regular movement, heavy seating and impact, excessive vibrations and uneven wear of bearing surfaces. Reference any applicable codes that may be affected by the condition, access, or layout of the equipment.

(3.a.1) Review previous inspection reports. Obtain and/or prepare the necessary drawings and other related data and services required in the mobilization for the inspection specified herein. Include the coordination of the inspection specified herein with the U.S. Coast Guard, Department forces, and County agencies. Include the notification of local police prior to performing any inspection/testing activity that may disturb vehicular traffic on the bridge. Inspection/testing activities that disturb vehicular traffic shall only be performed during off peak hours.

FOR SECURITY REASONS, A 72-HOUR NOTIFICATION MUST BE GIVEN PRIOR TO THE START OF THE ON-SITE INSPECTION. ACCESS TO THE BRIDGE WILL NOT BE ALLOWED WITHOUT THIS ADVANCE NOTIFICATION. THE FOLLOWING AGENCIES MUST BE NOTIFIED:

Structural Evaluation	609-530-3572
Movable Bridge Engineering	609-530-2163
Drawbridge Operations	732-528-9494
Traffic Operations North	201-797-3676
- or - Traffic Operations South	856-486-6650

(3.a.2a) For **Vertical Lift Spans**, the inspection shall include the following:

- a). Operating features which support the structure's dead load; such as counterweight, counterweight ropes, sheaves, and trunnions.
- b). Span locks.
- c). Observe operation of balance chain as span travels up and down.
- d). Buffer cylinders on piers and/or abutments.
- e). Strike plates and load shoes on piers and/or abutments.

- f). Centering devices on piers and/or abutments.
- g). Vertical alignment of towers, any evidence of tilt or movements and horizontal alignment between towers during operations

(3.a.2b) For **Bascule Spans**, the inspection shall include the following:

- a). Trunnions and trunnion bearings.
- b). Buffer cylinders.
- c). Load shoes and strike plates.
- d). Tail locks.
- e). Span locks.
- f). Centering guides.

(3.a.2c) For **Swing Spans**, the inspection shall include the following:

- a). Center bearing.
- b). Balance wheels or rim bearing tapered rollers.
- c). Wedges or Jacks.
- d). Centering devices.

(3.a.3) Prepare and submit a brief report of the mechanical inspection specified herein. The report shall include:

1. A description of the structure, its mechanical operating system, and all major equipment
2. A copy of this scope of work
3. A typed copy of all field notes
4. A summary of conclusions and recommendations
5. Cost estimates for recommended repairs
6. Final Mechanical Inspection Report in electronic form

*The dismantling of equipment, except as specifically stated elsewhere in this text, is not intended as part of this scope of work. However, if during the course of this inspection the consultant believes that dismantling of equipment is warranted, the consultant shall advise the Department of this fact. No payment for the dismantling of equipment will be made without prior approval.

Note: Any condition requiring immediate corrective action or priority repair shall be promptly reported, in writing, to the Department.

CONSULTANT'S MAN-HOUR PROPOSAL PER-TASK WORKSHEET

Fill in estimated time per task, and provide for review to the
 Movable Bridge Engineering Group
 Phone 609-530-2163 – Fax 609-530-4444

BRIDGE _____ GROUP _____ JOB # _____

TYPE II MECHANICAL INSPECTION

TASK ID	TASK DESCRIPTION	CONSUL. ESTIMATED HOURS
3.a.1	Mobilization - Review previous data, prepare forms, travel to & from site	
3.a.2a	Observe Vertical Lift Bridge Components	
3.a.2b	Observe Bascule Bridge Components	
3.a.2c	Observe Swing Bridge Components	
3.a.3	Prepare Brief Report - Include brief description of structure and machinery.	

TOTAL MECHANICAL HOURS

Estimated by _____ Date _____