

RW-016  
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**ENGINEERING AND OPERATIONS**  
**NORTHERN AIRPORTS**

**SPECIFICATION FOR GROUND COUNTERPOISE WIRE**  
**FOR USE IN MEDIUM INTENSITY**  
**AIRFIELD LIGHTING SYSTEMS**

Manitoba  
Transportation and  
Government Services



**TRANSPORTATION AND GOVERNMENT SERVICES  
NORTHERN AIRPORTS**

**SPECIFICATIONS FOR GROUND COUNTERPOISE WIRE  
FOR USE IN MEDIUM INTENSITY SERIES LIGHTING SYSTEMS**

**1. SCOPE**

This specification defines the general requirements applicable to ground counterpoise wire. The intent of this specification is to establish minimum acceptable electrical, mechanical, design and performance requirements, which all ground counterpoise wire must meet to ensure satisfactory and reliable operation. It is not intended to impose restrictions upon design or materials, which must conform to ANSI/ASTM Standard B3. All ANSI/ASTM specifications at time of contract, not specifically mentioned in this specification will apply. Where there is a conflict between this specification and the latest ANSI/ASTM standard, this specification will apply.

**2. REQUIREMENTS**

- 2.01 The counterpoise wires must be single conductor bare #8 AWG, solid annealed soft copper wire suitable for direct earth burial.
- 2.02 The counterpoise wire must be shipped to the Mechanical Equipment Warehouse at 1550 Dublin Avenue, Winnipeg Manitoba, on non-returnable reels of 915 metres.
- 2.03 Each cable reel must be identified with:
- the manufacturer's name
  - the date of manufacture
  - the wire specification number
  - the conductor size.

**3. WARRANTY**

- 3.01 All units must be guaranteed against failure for one year from date of acceptance by the Traffic Engineering Branch of the Department of Transportation and Government Services.

**4. INSPECTION AND ACCEPTANCE**

- 4.01 Prior to delivery the vendor must provide a 1 metre sample of the wire being supplied along with all test and technical documentation for evaluation purposes.

Ground counterpoise wire that conforms to this specification and which is not currently in use by this Department must be submitted to the Traffic Signal Workshop for a one-year evaluation period by the Department. At the end of the evaluation period the supplier will be advised by the Traffic Operations Engineer if the equipment submitted for evaluation is acceptable.

The total cost of supplying this equipment for evaluation must be borne by the supplier. The bidder must complete the attached "Specification Compliance Summary". Failure to complete the summary will result in disqualification from the bidding.

- 4.02 All shipments of ground counterpoise wire are subject to the inspection by the Traffic Engineering Branch of the Department of Transportation and Government Services.

Acceptance will be based on the supplied equipment meeting the requirements of this specification.

- 4.03 For additional technical information please contact Mark Seniuk at (204) 945-7335 office, or (204) 799-8682 cellular.