



Renfrew
Bridging Charm and Convenience

Town of Renfrew
127 Raglan Street South
Renfrew, Ontario
K7V 1P8

Addendum No. 1

Date: August 21, 2025

Project No. 2025-10-LCRS

Project: Ma-te-way Park Power Supplies - Phase 1

To: All Bidders

Pre-Bid Questions

1. **Question:** Can we confirm that the wire size is large enough for the branch circuit wiring (3% voltage drop) to all the fixtures. Example LS-T05. 1 of 3 circuits will have 27amps on it at 120v 460ft I get 1awg copper.

The drawing does not specify the light fixture, and ESA has been quite particular on this point lately. Normally—though not always—HID lighting is designed with a voltage tolerance of $\pm 10\%$. If that is the case here, then a voltage drop in the range of 5–8% could be acceptable. However, since the fixture details are not indicated, this remains uncertain.

Could you confirm if there is a shop drawing available for the fixture so we can verify the voltage tolerance and ensure compliance?

Answer: Existing fixtures are 1,080W ea. based on best information available. Unfortunately, the existing fixture shop drawing are not available, voltage tolerance is unknown. We will have to target 3% voltage drop, reducing conductor sizing can be further discussed with successful bidder when fixture details are known after investigation phase.

Voltage Drop:

LS-T05 example (worst cast furthest away with most quantity of fixtures)

Light standard fixture quantity: 7 fixtures (1,080W ea.)

Estimated distance: 120m (measured on the CAD) 110m horizontal then added 10m for verticals

Total load:

Phase A (120V), 2lgts, $2160W/120V = 18Amps$,

Phase B (120V), 2lgts, $2160W/120V = 18Amps$,

Phase C (120V), 3lgts, $3240W/120V = 27Amps$.

Agree with the above #1AWG CU would be required to maintain voltage drop below 3%, calculated 2.77%.

#3AWG CU would be required to maintain voltage drop below 5% allowed form source. Source is adjacent to panel.



Renfrew
Bridging Charm and Convenience

Town of Renfrew
127 Raglan Street South
Renfrew, Ontario
K7V 1P8

See attached SKE-201.1 single line new work showing updated conductor size and conduit quantity.

Revise duct bank quantity to route dedicated 53mm (2") to each light standard. Provide new in-line fuses and terminations in existing pole handhole.

- 2. Question:** Panel LPT shows 30amp 3p breakers. There are 4 light standards that one circuit will have 27amp load on it. Assuming the light will be on longer than 3 hours (continuous load) A 40amp breaker will be required. A continuous load (expected to run 3 hours or more) cannot exceed 80% of the breaker rating.

Answer: Refer to attached sketch SKE-201.1 single line diagram new work. Revise four (4) circuit breakers in Panel LPT from 30A,3P to 40A,3P (feed light standards with 7 fixtures).

- 3. Question:** Just wanted to ask if directional boring is an option for the conduit feed to the lights in the ball field?

Answer: No, due to compliant installation challenges directional boring creates; consistent burial depth (IEEE calculations required when varying from standard burial depth and duct bank formations, conduit spacing, warning tape etc.).

Please attach this addendum to your proposal document and be governed accordingly. Bidders must acknowledge receipt of all addenda.

One copy of this Addendum is to be SIGNED and SUBMITTED with the Proposal

Proponent's Name (Company)

Date of Issue – August 11, 2025

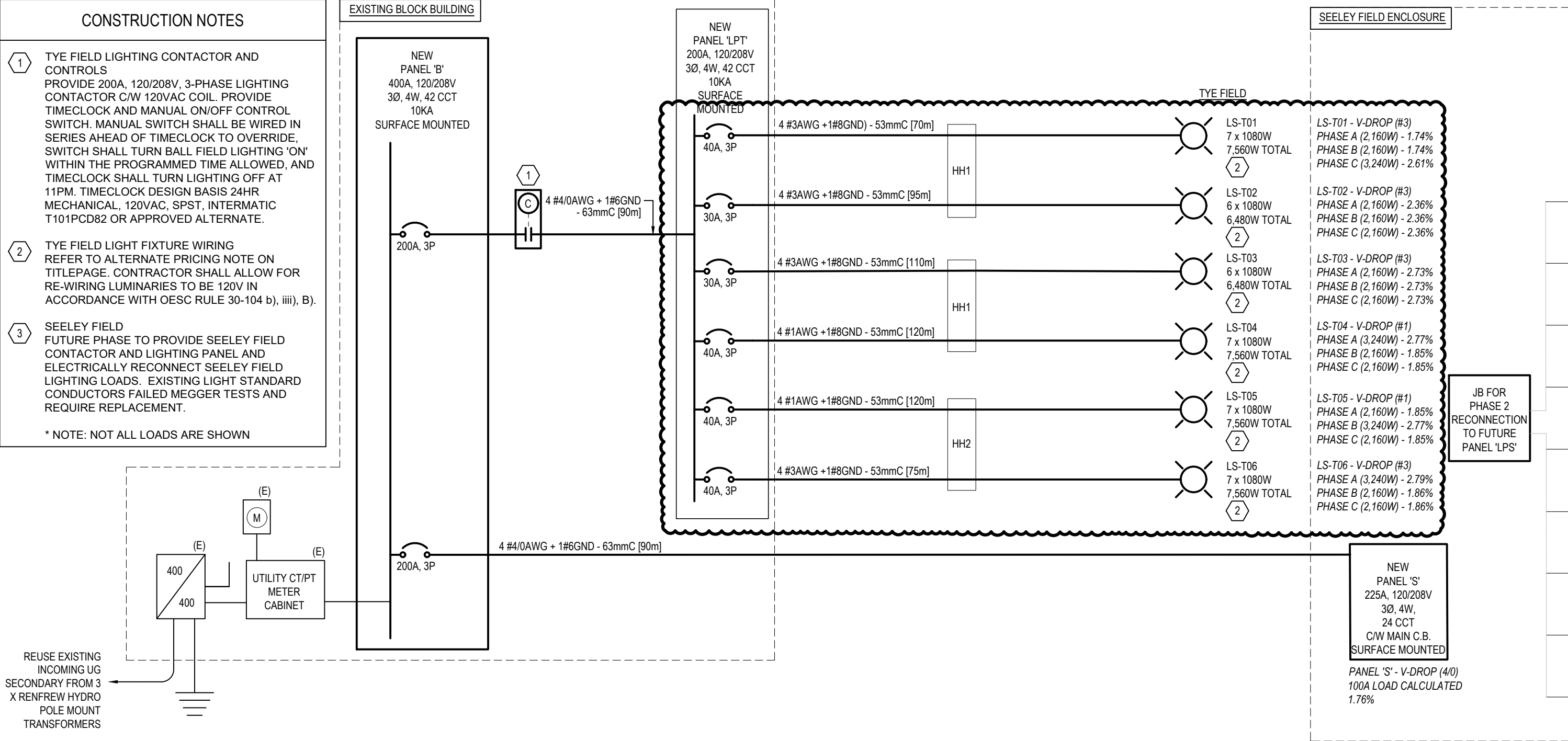
Closing Date – August 26, 2025

Signature

Closing Time – 2:00 PM

Name (Please Print)

Date



2

SINGLE LINE DIAGRAM - NEW WORK

E-201

SCALE: N.T.S



Project:

**TOWN OF RENFREW
MATEWAY PARK
BALL DIAMONDS**

Drawing:

SINGLE LINE DIAGRAM - NEW WORK

DESIGNED BY: P.SCISSONS	PROJECT No.: 25-4029A
DRAWN BY: P.SCISSONS	ISSUE DATE: 08/20/2025
CHECKED BY: R.KONG	ISSUED FOR: ADD-01
APPROVED BY: R.KONG	SHEET No.: SKE-201.1