Ohmics

AI ELECTRICAL REVIEW

AUTOMATED PRELIMINARY SCREENING

Label & PPE Boundary Review

Report generated August 18, 2026

Prepared for	[REDACTED]
Prepared by	Ohmics automated review, PEFG, PLLC
Job ID	SAMPLE-LB-01
Order ID	SAMPLE: anonymized production test run
Review type	Automated release

AT A GLANCE: 12 FINDINGS

2	6	4	0
CRITICAL	SIGNIFICANT	OBSERVATION	INFORMATION

EXECUTIVE SUMMARY

Findings and Recommendations Summary

This review found 12 findings: 2 critical, 6 significant and 4 observations. The critical findings concern ppe and maintenance mode. The recommendations below cover every critical and significant finding. Full detail begins on the following page.

SEVERITY DISTRIBUTION



Critical 2 Significant 6 Observation 4

RECOMMENDATIONS

Finding 1 · Critical
1. Change the text on these labels to prohibit energized work, and refer these buses back to the study for hazard-elimination review.

Finding 2 · Critical
2. Confirm from the study whether any labeled equipment has an energy-reducing setting. If any does, show both values on the label.

Finding 3 · Significant
3. Add a date and a study reference to every label.

Finding 4 · Significant
4. Correct the label and confirm the study row and one-line tag use the correct prefix.

Finding 5 · Significant
5. Have the Engineer of Record check the 72 in and 33 in values against the adopted edition.

Finding 6 · Significant
6. Add the required arc rating or reference the program document that defines it.

Finding 7 · Significant
7. Add the glove class to each label for its nominal voltage.

Finding 8 · Significant
8. Identify the service equipment and confirm it carries the separate fault current marking.

BY CATEGORY

PPE	3	Content	5
Maintenance mode	1	Coverage	1
Physical	1	Program	1

Label & PPE Boundary Review

Job SAMPLE-LB-01 · Order SAMPLE: anonymized production test run · Automated release

Anonymized sample. Client, site, people, dates, document numbers, equipment tags, part numbers and manufacturer names are removed or generalized, and identifying values are slightly modified. Findings are shortened; the engineering point of each is unchanged.

Read before relying on anything below.

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Findings are limited to what is visible in the documents submitted. Absence of a finding does not indicate compliance. All findings must be independently verified by the Engineer of Record against the code edition and local amendments adopted by the Authority Having Jurisdiction for this project.

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Submission details

Report	Label & PPE Boundary Review — Report LB-01
Submittal reviewed	[arc flash labels].pdf (33 pages, 97 labels)
Client identity	Anonymized for public release

CRITICAL (2)

LB-PPE-02-1 · PPE · issue

Critical

1. Labels above 40 cal/cm² say "Appropriate PPE Required"

Forty-one of the 97 labels show incident energy above 40 cal/cm², the highest at 130.8 cal/cm². They carry the same "Appropriate PPE Required" text as the low-energy labels. At these energies PPE is not an adequate protection strategy, so the instruction contradicts the DANGER signal word.

RECOMMENDATION

Change the text on these labels to prohibit energized work, and refer these buses back to the study for hazard-elimination review.

Source: page 5, pp. 5, 14, 15, 20 and 22, among others | Code ref: none (general observation) | Confidence: high

LB-MODE-01-8 · Maintenance mode · issue

Critical

2. No maintenance mode or dual-state values

Every label shows a single value. If any high-energy bus has an energy-reducing setting and the label shows the reduced value, a worker who does not engage it is relying on the wrong number. No study was submitted, so this cannot be ruled out.

RECOMMENDATION

Confirm from the study whether any labeled equipment has an energy-reducing setting. If any does, show both values on the label.

Source: page not applicable, all labels | Code ref: none (general observation) | Confidence: medium

SIGNIFICANT (6)

LB-CONT-06-2 · Content · issue

Significant

3. No date on any label

No label carries a label date, study date, revision or study reference, and the submittal has no cover sheet. Nothing ties a label to the calculation behind it.

RECOMMENDATION

Add a date and a study reference to every label.

Source: page not applicable, all labels, lower portion | Code ref: none (general observation) | Confidence: high

LB-CONT-05-3 · Content · issue

Significant

4. One equipment tag uses a different site prefix

One label's site prefix differs by one character from the prefix on the other 96. Its position in the sequence shows it b elongs to the same equipment family, so a search for the correct tag will not find it.

RECOMMENDATION

Correct the label and confirm the study row and one-line tag use the correct prefix.

Source: page 24, p. 24, left column, Location field | Code ref: none (general observation) | Confidence: high

LB-CONT-04-5 · Content · issue

Significant

5. 25 kV approach boundaries need verification

The 25 kV labels show 72 in limited and 33 in restricted approach. No code text was supplied, so this review cannot verify these values against the adopted edition.

RECOMMENDATION

Have the Engineer of Record check the 72 in and 33 in values against the adopted edition.

Source: page 6, p. 6 and the other 25 kV labels | Code ref: none (general observation) | Confidence: medium

LB-PPE-04-6 · PPE · issue

Significant

6. No PPE specification on any label

Every label says "Appropriate PPE Required" and gives no arc rating, category, glove class or reference to a program document that defines "appropriate".

RECOMMENDATION

Add the required arc rating or reference the program document that defines it.

Source: page not applicable, all labels, PPE line | Code ref: none (general observation) | Confidence: high

LB-PPE-03-7 · PPE · issue

Significant

7. No glove class on a set spanning 208 V to 25 kV

The shock section gives voltage and approach boundaries but no glove class. Glove class is the shock PPE parameter that changes with voltage.

RECOMMENDATION

Add the glove class to each label for its nominal voltage.

Source: page not applicable, all labels, shock hazard block | Code ref: none (general observation) | Confidence: high

LB-COV-04-9 · Coverage · issue

Significant

8. Service equipment and fault current marking not assessable

There is no one-line and no available fault current marking on any label, so service equipment cannot be identified. That marking is a separate requirement from the arc flash label.

RECOMMENDATION

Identify the service equipment and confirm it carries the separate fault current marking.

Source: page not applicable, the label set as a whole | Code ref: none (general observation) | Confidence: high

OBSERVATION (4)

LB-CONT-05-4 · Content · issue

Observation

9. Extra space in two equipment tags

Two tags contain an internal space that their sibling tags do not. A person reading the label will not be misled, but an exact-match lookup against the study or asset register will fail.

RECOMMENDATION

Normalize the tags.

Source: page 25, p. 25, two Location fields | Code ref: none (general observation) | Confidence: medium

LB-PHYS-01-10 · Physical · issue

Observation

10. Label material, environment and placement not identified

No label material, service environment or placement is given. The set includes chillers and generator switchboards, where material affects how long a label stays legible.

RECOMMENDATION

Provide the label specification and a placement schedule.

Source: page not applicable, the submittal as a whole | Code ref: none (general observation) | Confidence: high

LB-PROG-01-11 · Program · issue

Observation

11. No responsible party or update trigger

Nothing identifies who keeps the labels current or what triggers relabeling, and the labels carry no warning that system changes invalidate them.

RECOMMENDATION

Name the responsible party and add an invalidation warning to the label template.

Source: page not applicable, the submittal as a whole; label footers | Code ref: none (general observation) | Confidence: high

LB-CONT-07-12 · Content · issue

Observation

12. DANGER threshold applied consistently but not stated

Signal words follow incident energy consistently. From the data, the DANGER threshold lies between 30.6 cal/cm² (WARNING) and 47.3 cal/cm² (DANGER), but it is not stated anywhere.

RECOMMENDATION

State the signal-word threshold in the labeling program document.

Source: page 4, p. 4 (WARNING) and p. 12 (DANGER) | Code ref: none (general observation) | Confidence: high