

FIELD TESTING CHECKLIST USER GUIDE



Objective:

The launch of the **Concrete Ontario Field Testing Checklist** is in response to numerous concerns raised by members about inadequate concrete sampling and testing on various job sites. With support from both CCIL and ACI International, Concrete Ontario is pleased to roll out this new initiative to ensure that all necessary procedures related to concrete cylinders are strictly followed, and that test results will be representative of the in-spec concrete that was delivered to the site. This checklist can be distributed to QC personnel, ready-mix truck drivers or supervisors as an essential tool to document and/or report in the event of poor concrete sampling and/or testing on job sites.

Procedure:

1. Distribute copies of the checklist to QC personnel and/or ready-mix drivers.
2. Fill out the checklist.

FRONT




- Identify the inadequate concrete sampling and/or testing procedure(s)

BACK

- Fill in the Date, Project Name or Location, and Tester/Lab name
- Circle the Issue(s) identified on the front
- Write down all issue(s) observed in the Notes section. Pictures and videos can be taken as additional information

FIELD TESTING CHECKLIST

TOOLS FOR CONCRETE CYLINDER SUCCESS!

- 1. CERTIFICATION**

Field testing personnel has a valid ID card of either:

 - a. CCIL Certified Field Testing Technician
 - b. ACI Concrete Field Testing Technician-Grade 1
- 2. CONCRETE SAMPLING & CYLINDER MOULDING**

 - A) The concrete is sampled according to CSA A23.2-1C and the specimens are cast in as close proximity as is practicable to the place where they are to be stored during the first 28 h ± 8 h.
 - B) The specimens are moulded as per CSA A23.2-3C on a level, rigid, horizontal surface free from vibration and other disturbances.
- 3. PROTECTION**

After casting, the specimens are immediately covered with a non-absorptive, non-reactive plate or placed in an impervious plastic bag to prevent evaporation of water from the unhardened concrete.
- 4. MOVING CYLINDERS**

When moving the specimens, avoid all jarring, striking, tilting, and deformation of the concrete specimens or scarring of the surface.
- 5. INITIAL CURING**

Store the specimens in a controlled environment that will maintain the temperature between 15°C and 25°C for the first 20 hours.
- 6. TRANSPORTATION**

Transport the test specimens from the field to the laboratory only after curing for a minimum of 20 hours and protect the test specimens during transportation, from any shocks or exposure to adverse conditions.

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DATE (dd/mm/yy)

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Project/Location:
ABC Condo, Toronto

Tester/Lab:
John Doe, XYZ Lab

Identify Issue (circle all that apply):

1 2A **2B** 3 4 **5** 6

NOTES

The cylinders were moulded on uneven surface and were stored under the site trailer.

IMPORTANT

Unless otherwise agreed, test results shall be provided to the owner, contractor, and concrete supplier within five working days, as per the requirements of CSA A23.1 clause 4.4.1.7.1.

3. Scan or make a copy of both the front and the back of the checklist and send to the QC/Driver supervisor.
4. Send or provide a copy of the checklist to the project site supervisor for comment about the identified issues.

PLEASE NOTE: The provided steps for the usage of the checklist are entirely optional for members. Members are encouraged to tailor the steps of the checklist to suit their operation, as well as to ensure efficiency and to minimize liability through its use.

DISCLAIMER

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