

Builder Bulletin 19R

Condominium Projects Design and Field Review Reporting

Updates:

January 1, 2018 - RCCP

If the project is a Registered Condominium Conversion Project (RCCP), there are additional reporting requirements in Builder Bulletin 51 that must be provided as part of the Builder Bulletin 19 reporting. Please refer to Builder Bulletin 51 for details. The reporting requirements in Builder Bulletin 51 and Builder Bulletin 19 apply to all RCCPs, regardless of type.

September 1, 2020 - Module 2A Scope of Work

Builder Bulletin 19R now includes an updated Module 2A Scope of Work for use on projects with a construction start date of September 1, 2020 or later. This update requires FRC's to identify New Technologies such as the use of new materials, as well as new and unique applications of existing materials used in a major component of a project. It also includes minor layout and formatting changes.



What this Bulletin is All About

This Bulletin, Builder Bulletin 19 – Design and Field Review Reporting for Condominium Projects (BB19), sets out the requirements for reports and information that builders¹ of ‘Designated Condominiums’ enrolled under the *Ontario New Home Warranties Plan Act*, must provide to Tarion through Field Review Consultants (FRCs). Designated condominiums are Types C and D in the table on page 3. These requirements are in addition to Ontario Building Code requirements for professional design and review.

These requirements will assist builders to mitigate warranty claim risk during the design and construction of a new condominium project. By proactively identifying, reporting and resolving construction deficiencies, as outlined in this Bulletin, builders can reduce future warranty claims, higher repair costs, lengthy repairs and ultimately, better manage the associated financial liability.

If a builder does not properly comply with this Bulletin, Tarion will retain financial securities assessed under [Builder Bulletin 28 – Requirements for Receipt and Release of Security \(BB28\)](#) to manage the warranty claim risk.

Effective Date

This bulletin applies to all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Important Words and Phrases

1. **FRC** means the Field Review Consultant designated by the builder for the condominium project.
2. **BQS** is the standing given to an FRC qualified under this Bulletin to perform field review services.
3. **Design Consultant** means one or more duly qualified architects and/or engineers retained by the builder to provide services related to the design documents, construction documents and review of the construction in accordance with the Ontario Building Code and municipal requirements.

¹ In this bulletin, “builder” refers to both “vendor” and “builder”, as they are defined in the *Ontario New Home Warranties Plan Act*.

4. **Design and construction documents** include, but are not limited to print and electronic materials provided by the project's design consultants responsible for authoring shop drawings and manufacturing of components.
5. **Submit** means to deliver documents in accordance with Tarion's regulations. Acceptable methods of delivery are: uploading the documents via the FRC Connect portal, by hand, courier, e-mail to b19@tarion.com, and, except during a general interruption of postal service, regular mail or registered mail. In the case of regular mail, delivery is effective on the postmark date as long as Tarion receives it within 10 days of the expiry of the applicable filing period. Registered mail is effective on the postmark date. Delivery by hand or courier is effective on the date Tarion receives it if it is a business day and otherwise on the next business day.

Proof of Submission and Delivery

If there is a dispute concerning delivery, it is the builder's responsibility to establish when delivery occurred. To avoid confusion, builders are encouraged to use the FRC Connect portal.

Any non-electronic notices or communications with Tarion's Common Elements Group can be addressed to:

Tarion Warranty Corporation: Common Elements Group
5160 Yonge Street, 12th Floor
Toronto, Ontario M2N 6L9

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What's Different in this Edition?

This version of the Bulletin contains the following clarifications and corrections from the previous edition of BB19, effective July 1, 2010:

- Where there is more than one tower or building under a single Tarion enrolment, the FRC shall prepare separate 60-day and Milestone Reports for each tower or building. All Milestone Reports for all towers and buildings shall be included in the Final Report for the enrolled project.
- Where a Geotechnical Consultant is designing components of the project, they must be listed as part of the Project Team in the Scope of Work.
- The Scope of Work titles are changed from 'High-rise' to Type C and Type D Condominiums and from 'Townhouse' to Type A and Type B Condominiums.
- Specific Risk Factors for mid-rise wood-framed buildings are included in the Type C and Type D Condominiums Scope of Work.
- Where the builder includes a Type A or Type B condominium with a Type C or Type D condominium under a single enrolment, BB19 reporting is also required on the Type A and Type B condominium using the Type A and Type B Scope of Work.
- Acoustic review and testing requirements are grouped into a separate Risk Area to highlight the importance of the warranty claim risk associated with the acoustic qualities of the living space. Tarion expects acoustic consultants to possess recognized qualifications.
- A consultant qualified within the appropriate discipline must conduct the mock-ups and field tests required in the Scope of Work Risk Areas.
- 60-day and Milestone Reports have been simplified, but are more informative.
- Milestone Reports now consist of two parts instead of three – a brief deficiency overview in the Deficiency Summary, with more details in the Narrative.

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General

Description of Condominium Type (as described in [BB28](#))

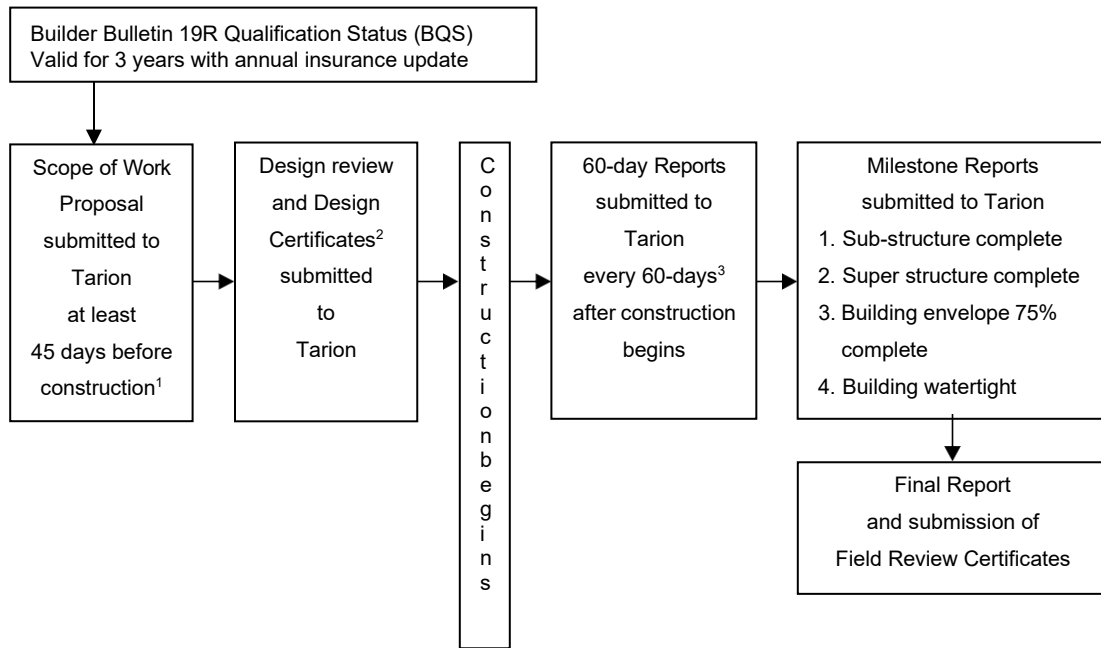
Condo Category	Description
Type A	Project has only Part 9 OBC construction requirements and is a lot-line ² condominium.
Type B	Project has only Part 9 OBC construction requirements and is NOT a lot-line ² condominium
Type C	Project has both Part 9 and Part 3 OBC construction requirements.
Type D	Project has only Part 3 OBC construction requirements.

Voluntary submissions for Type A and Type B condominiums

A builder may voluntarily use BB19 on non-designated condominium projects (Type A and Type B) to manage its own warranty claim risk. In that case, there is no need to submit reports to Tarion. However, if the builder wants Tarion to give credit for the BB19 reporting towards earlier release of security, Tarion must approve the project for BB19 reporting at the time the project is enrolled.

² Lot-line or whole-lot condominium units are so described because they usually include the land/yards associated with the dwelling units. Usually the front and back yards, the dwelling unit and its garage are all part of what is described as “the unit” in these types of condos.

THE BUILDER BULLETIN 19R PROCESS



¹ Construction is considered to have started when excavation begins.

² Design certificates may be submitted on a phased basis (see Module 4A).

³ A 60-day Report will not be required where a Milestone Report is completed within that 60-day period. Should the Final Report not be submitted within 60-days of submission of the Milestone 4 Report then a 60-day Report is required and 60-day reporting continues until the Final Report is submitted.

FRC Bulletin 19R Qualification Status (Module 1)

Tarion assumes that FRCs complying with the terms of this Bulletin have attained their BQS. Applicants for BQS must demonstrate capability to perform the documentation and field reviews within a broad-based building science background. Since both the builder and Tarion depend on the FRC to mitigate the warranty claim risk during design and construction, they must have strengths in building material/system performance evaluation. Because managing the warranty claim risk predominantly focuses on the performance of the building elements throughout the warranty period, firms must demonstrate strength in building science.

Scope of Work (Module 2)

The Scope of Work proposal is the first stage of the Bulletin 19R process and outlines the level of effort and proposed number of visits an FRC commits to as part of monitoring identified risk areas. The builder must submit the proposal at least 45 days before construction starts. Tarion will review and approve the Scope of Work proposal within 30 days of receipt or contact the builder if further information is required.

Although builders must submit the Scope of Work proposal at least 45 days before construction starts, Tarion recommends that builders engage the FRC early in the project design phase to assist in identifying and mitigating warranty claim risk while the design can be altered with minimal cost and time impact.

Risk Areas and Risk Factors within the Scope of Work were identified following review of the Tarion's claims received by Tarion, along with Tarion's dispute resolution history and practical experience within the industry as well as through consultation with representatives of the FRC community.

Design Review and Certificates (Module 4A)

Design Certificates confirm that the design complies with the Ontario Building Code and good architectural and engineering practices. Individual certificates must be completed by each Design Consultant who produces or reviews the construction documents as they relate to the identified Risk Areas in the Scope of Work Proposal. The builder must submit each certificate to Tarion at least 30 days prior to the commencement of the work covered by that portion of the design. There is a Design Certificate template in Module 4A.

60-day Reports (Module 4B)

The 60-day Reports provide a tracking mechanism to assist Tarion in assessing the progress of a project's construction without placing too large an administrative workload on the FRC. The FRC must complete the reports according to the instructions found in the report template in Module 4B.

Milestone Reports (Module 4C)

Four comprehensive Milestone Reports must be completed and submitted to Tarion as soon as possible and, in any event, within 30 days of the completion of the Milestone stages of construction. The Milestone stages are

1. Sub-structure complete
2. Super-structure complete
3. Building envelope 75% complete
4. Building watertight

The reports must contain information on all outstanding deficiencies in existence at the time the report comes due in the 60-day cycle (the definition of 'Deficiency' is in Module 4). The Milestone Report consists of two parts:

- The Deficiency Summary briefly identifies Deficiencies and gives an overview of resolution status
- The Narrative gives more detail about the Deficiency so that any warranty claim risk can be determined. It lists recommendations by the Design Consultant (where applicable) for further investigation and resolution.

Among other things, the Milestone Report shall identify all major design change orders made during the reporting period affecting the Risk Areas. The FRC shall keep copies of the design change orders on file for future use. The Milestone Report shall identify the construction details which have changed and whether the appropriate Design Consultant has authorized those changes. Tarion will review each Milestone Report and contact the builder and FRC within 30 days if further information is required.

Milestone Reports establish consistency in FRC reporting. Tarion will scrutinize the quality and content of reports and will advise builders and FRCs of shortfalls in reporting standards. More information about the quality of reports is in Module 1.

All work required to correct deficiencies noted in any of the Milestone Reports is the responsibility of the builder. The FRC must confirm that deficiencies have been satisfactorily corrected by referencing them in the next Milestone Report that comes due. Deficiencies remaining uncorrected at the submission of the Bulletin 19R Final Report may influence the amount of security released.

The Final Report (Module 4D)

The Final Report consists of a bound copy of the following documents:

- All Milestone Reports associated with the project
- The Condominium Declaration as filed with the Land Titles Office
- All Design Certificates
- Field Review Declaration
- It will also include the following documents as applicable
 - Project Architect final clearance
 - Geotechnical Consultant final clearance
 - Structural Consultant final clearance
 - Mechanical Consultant final clearance
 - Electrical Consultant final clearance
 - Interior Design Consultant final clearance
 - Acoustical Consultant final clearance
 - Site Work Consultant final clearance
 - Landscape Architect final clearance
 - Occupancy permits
- As built drawings, specifications, equipment operating manuals, and extended warranty certificates as well as balcony guard design load test reports and window test reports and Technical Standards and Safety Authority (TSSA) approvals are to be submitted directly to the elected condominium corporation board, not Tarion.

The FRC submits the Final Report to the builder and must notify Tarion as soon as this has occurred using the Notice of Completion in Module 4D. The builder submits the Final Report to:

- The elected condominium corporation board in accordance with the *Condominium Act*
- Tarion within 90 days of the registration of the condominium Declaration and Description

The *Condominium Act* states,

“Within 30 days of the turn-over meeting, the Declarant is required to deliver the documents referred to in section 43(5) of the *Condominium Act (Ontario)* to the elected board of the corporation, and in particular, if the property of the corporation is subject to the *Ontario New Home Warranties Plan Act*,

- (f)(i) proof, in the form, if any, prescribed by the Minister, that the units and common elements have been enrolled in the Plan within the meaning of that Act in accordance with the regulations made under that Act, and
- (f)(ii) a copy of all final reports on inspections that the Corporation within the meaning of that Act requires be carried out on the common elements.”

Tarion will review and accept the Final Report within 30 days of receipt or contact the builder if further information is required.

Contained within the Final Report, the Field Review Declaration confirms that review of the identified Risk Areas in the Scope of Work, as they relate to the construction project, have been completed to the satisfaction of the FRC and the Design Consultants. A Field Review Declaration template is in Module 4D.

Even if the Final Report is not available in its entirety, copies of all available documents shall be supplied to the elected board and to Tarion at the specified times. The board must confirm with a signature that it received the documents.

Builder Bulletin 19R and the Release of Security

All information, reports, and certificates must be submitted to Tarion within the specified time periods. The release of security is conditional upon Tarion receiving the documentation as specified in this Bulletin and in [Builder Bulletin 28](#) (which deals with such matters as unsold units and evidence of transfer of title for sold units, etc.) and is further conditional upon Tarion accepting that the contents of those documents accurately reflect the actual conditions on site.

The FRC must assess the likely costs of rectifying outstanding matters based on current sub-trade prices for such rectification and provide them to Tarion. Tarion will review the costs provided and retain an appropriate amount of the security, pursuant to Builder Bulletin 28.

As set out in Builder Bulletin 28, Tarion will consider any outstanding deficiencies and administrative or non-technical matters in determining the amount of security to be retained after the acceptance of the Final Report. Subject to the requirements set out in Builder Bulletin 28, any release of security will be completed within 45 days of receipt and acceptance of all the required documentation.

It is not unusual to have outstanding deficiencies noted in the Final Report. Indicating there are no deficiencies often sends the wrong message to the condominium corporation

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and its performance auditor, whose job it is to determine whether there are any deficiencies in the building. Builders who are transparent about the condition of the project often manage the warranty claim risk proactively by establishing a productive relationship with the condominium corporation while correcting the deficiencies early in the first year after registration.

If Tarion does not receive the Bulletin 19R Final Report, it will continue to hold the builder's security for a maximum of seven years or until such time as Tarion is satisfied that the builder's warranty obligations under section 13 of the *Ontario New Home Warranties Plan Act* have been satisfied.

For more information regarding Tarion's requirements for the receipt and retention of security, refer to Builder Bulletin 28.

Tarion reserves the right to use the builder's security to ensure that the requirements of this Bulletin are met on a continuing basis. With appropriate notice Tarion may, at its sole discretion and dependent on the situation, either recognize the original Scope of Work submission or secure the services of another qualified FRC.

This Bulletin places a number of time-based performance requirements on FRCs. In return Tarion is committed to completing elements of its administrative functions within the specified timeframes. Generally, these functions relate to the processing and review of applications and submitted reports.

Where to find the forms for Bulletin 19R

Standardized reporting formats are crucial to consistent reporting. Tarion has developed templates for all required reports and a link to these can be found at www.tarion.com.



Howard Bogach
Registrar

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Module 1

FRC Bulletin 19R Qualification Status

Who needs Bulletin 19R Qualification Status?

The requirement for Bulletin 19R Qualification Status (BQS) applies to consulting firms providing field review services for designated projects subject to the provisions of Builder Bulletin 19R e.g. Type C or Type D condominium projects. Tarion's Condominium Group will administer the application and renewal procedures for BQS.

1. Table from Builder Bulletin 28

Condominium Category	Description
Type A	Project has only Part 9 OBC construction requirements and is a lot-line ³ condominium.
Type B	Project has only Part 9 OBC construction requirements and is NOT a lot-line ³ condominium
Type C	Project has both Part 9 and Part 3 OBC construction requirements.
Type D	Project has only Part 3 OBC construction requirements.

A consulting firm will not be required to qualify on a per project basis. Once awarded, BQS remains valid for a period of three years subject to the provisions below, and is renewable. Appropriate levels of insurance coverage must be maintained throughout the period of qualification.

BQS will ensure FRCs working on Bulletin 19R condominium projects have the capacity to undertake such work and meet the requirements of Builder Bulletin 19R. Firms will need to show they retain, or have access to, technically and professionally qualified personnel certified to practice in the Province of Ontario. Because managing the warranty claim risk predominantly focuses on the performance of the building elements throughout the warranty period, firms must demonstrate strength in building science.

³ Lot-line or whole-lot condominium units are so described because they usually include the land/yards associated with the dwelling units. Usually the front and back yards, the dwelling unit and its garage are all part of what is described as "the unit" in these types of condos.

Objective Application Criteria

FRCs must show capacity and competence to achieve and retain BQS such as

- Employ or have access to the necessary professional resources to conduct Bulletin 19R work²
 - Carry sufficient insurance coverage³
 - Properly take responsibility for and sign each Bulletin 19R report⁴
 - Undertake to use only qualified agencies to conduct required testing unless qualified personnel and facilities are retained in-house
2. For Engineers this is a Certificate of Authorization issued by Professional Engineers of Ontario and for Architects, a current Certificate of Practice issued by Ontario Association of Architects. FRCs may be required to produce evidence of an established relationship between them and any sub-consultant and that sub-consultant's availability to the FRC.
 3. The minimum level of liability coverage should be consistent with the minimum limits laid out for the members of Professional Engineers of Ontario or Ontario Association of Architects as appropriate. Liability coverage should extend to sub-consultants. Alternatively, it will be acceptable to show that sub-consultants carry the same level of liability coverage.
 4. The individual consultant with overall responsibility for a project and who is in a position to legally bind the FRC firm must sign off on completed reports. Where day-to-day responsibility has been delegated to some other consultant this signature must be in addition to that of the delegated person's.

Where an FRC initially falls short of submitting the level of information required to achieve or maintain its BQS, Tarion will work with the applicant to overcome any difficulties as soon as possible.

Supplying inadequate, false or misleading information may result in BQS being denied, suspended or cancelled. Where an FRC is de-qualified and that firm is subsequently retained to provide FRC services on Type C or Type D condominium construction, Tarion will review each project on a case-by-case basis and the release of security may be affected. If de-qualification takes place during an ongoing project, Tarion will work with the builder to find the best solution to the shortfall in FRC construction review.

Because circumstances within FRC firms change, FRCs must notify Tarion of material changes to the information supplied in their current application for BQS.

For objectivity and to avoid conflicts of interest, on any designated condominium project, a consultant or consulting firm cannot perform more than one of the roles of designer, FRC or conduct the performance audit required under the *Condominium Act*, on the same project.

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Responsibilities

The FRC is responsible for mitigating warranty claim risk for the builder and Tarion. Under this Bulletin the FRC has responsibility to comprehensively review the construction project, including:

- Commenting on design/construction documents to minimize warranty claim risk in the building and its components prior to construction
- Assessing site inspection reports (including primary design team reports) as they relate to identified Risk Areas
- Verifying that specialist inspection and testing reports are in order and appropriately comment on identified issues in those reports⁵
- Providing documentation that confirms other consultants and agencies evaluating the quality of construction are appropriately certified in their area of expertise⁶
- Conducting field reviews to monitor performance and quality of workmanship in identified Risk Areas

5. Where concerns exist regarding the reports of others, the FRC is expected to notify Tarion if the matter cannot be rectified in discussion with the report's authors. Also, any construction deficiencies noted in the reports generated by others must be brought to Tarion's attention.

6. For testing agencies it is suggested that they abide by certified or registered standards e.g. DIR.011-98, a list of CSA international certified concrete testing laboratories.

THE PROCESS OF APPLICATION

Once an application form has been completed and submitted, Tarion's Common Elements Group will review it. Tarion will contact the applicant for further information or clarification and an interview may be set up with the applicant.

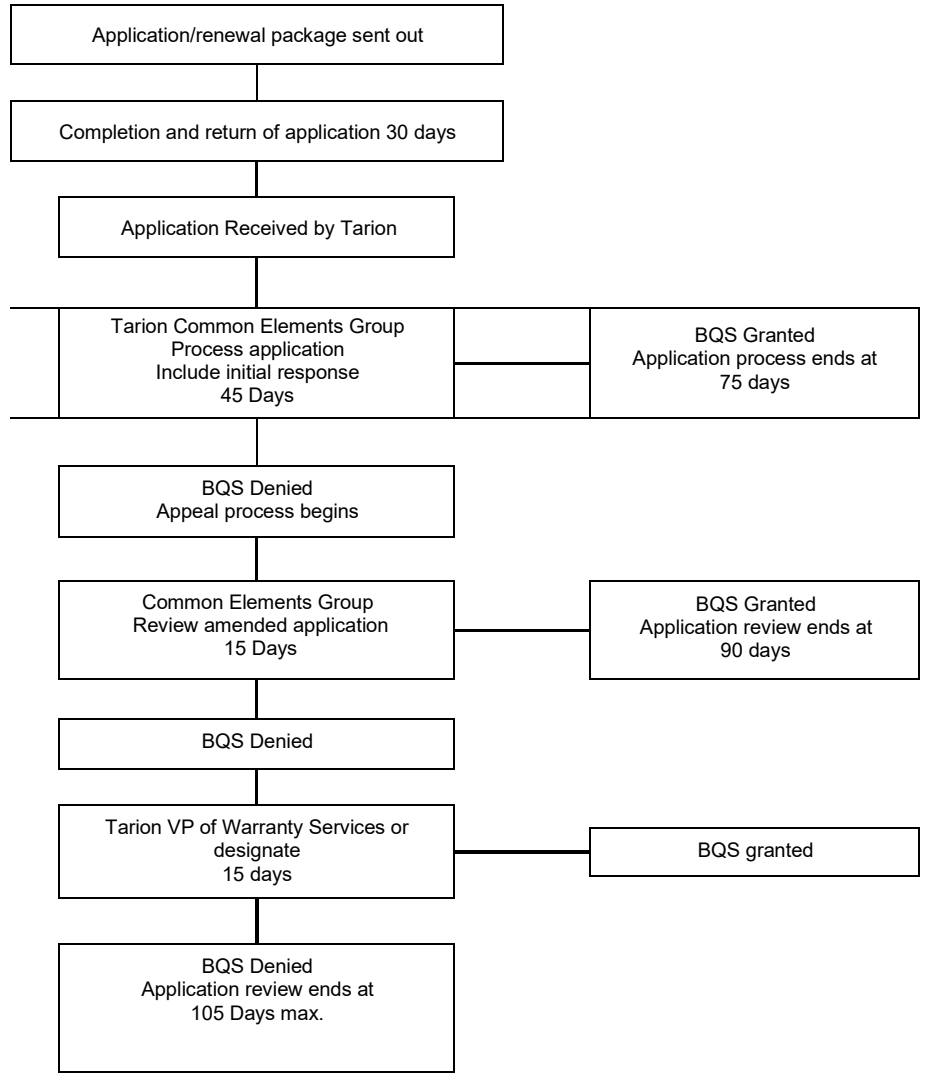
If BQS is denied, Tarion will provide written notification to the applicant giving the reasons for the decision. The applicant may appeal Tarion's decision by giving written notice to Tarion's Common Elements Group, which starts the appeal process (please refer to the following chart). The appeal must contain written details of how the applicant will resolve Tarion's concerns.

The process gives FRCs the opportunity to discuss and rectify perceived shortcomings in meeting BQS criteria. Whenever possible, the appeal process will be completed before a current BQS expires. In this way an FRC's ability to continue Bulletin 19R work is not compromised during the appeal process.

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The following chart illustrates the process and timeline for initial applications and renewals.

FRC BULLETIN 19R QUALIFICATION PROCESS



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Module 1A

FRC Application for Bulletin 19R Qualification Status (BQS)

New application

Renewal BQS Certificate Number: _____

SECTION ONE: GENERAL INFORMATION

1. Tell us about your company.

Firm Name: _____

Address: _____
NUMBER AND STREET UNIT/SUITE

_____ CITY PROVINCE POSTAL CODE

Phone Number: _____ Website: _____

1.a Other office locations included in this application. *(attach separate list if necessary)*

2. How is your business constituted? *(E.g. Incorporated, Partnership, Sole Proprietor, etc.)*

3. Who should Tarion use as the main contact at your company?

Contact Name: _____ Position/Title: _____

Phone: _____ E-mail: _____
EXTENSION

Mobile Phone: _____ Fax Number: _____

4. What type of work does your firm currently undertake? *(E.g. primary consulting, commercial, testing, residential high or low-rise)*

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Attach your firm's profile/resume.

5. How many staff do you have?

	Full time	Part time	Total
Professional			
Technical			
Administrative			
Other			

6. What are your insurance arrangements?

Name of Carrier: _____ Professional Liability Policy: YES NO

Policy Number(s): _____ Expiry Date: _____

SECTION TWO: PROJECT INFORMATION

7. How many projects is your firm involved with currently? *(Where projects consist of multiple buildings being constructed under one development name, this will be considered one project.)*

No. of Residential: _____ No. of Other: _____

8. Describe your last 6 projects:

Tarion Enrolment Number (if applicable)	Project name	City, Province	Gross Floor Area (ft ²)	Time and Duration of Involvement	Applicant's Role e.g. Architect, FRC, etc.	Project Type e.g. Low/Mid/High rise, commercial, etc.

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Note: If there are other projects that you feel would be relevant to Tarion's consideration of this application that are not listed above please attach the information on a separate sheet.

9. Have you worked in the capacity of an FRC under any other BQS-qualified organization?

(If you are new to this area of construction and as a result cannot provide the information requested below attach five construction-related, professional references.)

Number of residential condominium projects applicant has worked on the last five years: _____

10. How do you structure your project teams?

Use a separate sheet to outline any established process your firm will use to structure Bulletin 19R project teams and how quality assurance/control mechanisms are used to mitigate the firm's risk.

11. Who are the key personnel you are using on the condominium project? *(attach additional sheets if necessary)*

Name	Position/Title	Expertise/Discipline

Declaration

I understand that this information does not guarantee the availability or award of Bulletin 19R contracts. Subject to my right to exercise all available review and/or appeal rights I hereby waive all claims resulting from any errors or omissions by Tarion through this process.

I undertake to complete the work and services contemplated to be performed and to submit all reports, forms and other required information at the times and in the manner laid out in the current Builder Bulletin 19R and Scope of Work proposals submitted by this firm and approved by Tarion.

I undertake to contract and employ only those consultants and other professionals in relation to Bulletin 19R work who are certified to practice in the Province of Ontario and are members in good standing with their respective certifying authorities. Through the exercise of due diligence I undertake to ascertain that testing agencies retained by this firm in relation to Bulletin 19R projects use testing standards established by CSA International or other appropriate professional bodies.

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I will maintain all records of construction field review including correspondence with the builder, the Project Architect and all other consultants and authorized persons concerned with designated Type C and Type D condominium projects for a period of seven years following the registration of the condominium corporation. I will make these records available to Tarion at their request.

I will inform Tarion of material changes to information provided in this application that may affect the award or retention of FRC Bulletin 19R Qualification Status. I will inform Tarion within 30 days of becoming aware (or 30 days from the date when the undersigned ought to reasonably have become aware) of any such changes having taken place.

I declare that to the best of my knowledge the information contained in this application is complete and accurate. I have authority to bind the applicant.

PRINT AUTHORIZED NAME

AUTHORIZED SIGNATURE

DATE

POSITION

TELEPHONE

EMAIL

(Declaration to be signed in the presence of a witness)

PRINT WITNESS' NAME

WITNESS' SIGNATURE

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Module 2A Scope of Work

THE ROLE OF THE FIELD REVIEW CONSULTANT (FRC)

FRCs provide a layer of quality review that augments the process of ensuring that the spirit and intent of the construction documents are realized, especially with regard to mitigating the warranty claim risk. Components of this work include

- review during the design phase so that construction details that heighten warranty claim risk can be identified and mitigated prior to construction
- monitoring identified risk areas for adequate component performance
- confirming whether the quality of the finished project meets or exceeds current industry standards

FRCs also collect and review the relevant sections of reports submitted to them and confirm that identified risk areas for which they are not directly responsible have been reviewed by Design Consultants or other agencies. (For an explanation of reporting requirements see Module 4.)

WHEN TO SUBMIT A SCOPE OF WORK PROPOSAL

A Scope of Work proposal for each designated condominium construction project must be submitted to Tarion's Common Elements Group no later than 45 days prior to the beginning of construction (see page 4 for submittal options). Construction is considered to have started when excavation begins.

HOW TO COMPLETE A SCOPE OF WORK PROPOSAL

When completing a Scope of Work proposal the FRC should be mindful of the number of visits necessary to evaluate a representative sample of a building's components and its overall construction. Review sampling will need to be randomly selected and evenly distributed (e.g. if the guidelines suggest a 30% level of review of traffic coating and there are three parking levels in a building, it would not be appropriate to review only one of the three floors. Examination of a percentage of each floor is expected.)

Tarion will rely on the professionalism of the FRC in determining what level of review is necessary for a project. The FRC must commit to a level of effort that allows them comfort in commenting on the identified Risk Areas. Comfort levels may be derived from observation of statistically valid samples based on square footage, a percentage of components, a number of tests or some other industry standard. The FRC must be satisfied that the level of review will adequately address the warranty claim risk associated with the Risk Areas.

A set of guidelines designed to help the FRC and the builder understand the typical level of effort and the proposed number of visits Tarion expects can be found in Modules 3A and 3B. The guidelines should be used to determine the proposed number of visits and extent of review. The guidelines feature notional buildings and suggest target review levels for them. While it is unlikely that actual buildings will match these notional buildings, they are intended to provide a basis from which appropriate levels of effort can be extrapolated.

Sometimes large projects designated Type C or Type D condominiums also contain townhouses governed by Part 9 of the OBC. A separate Scope of Work must be completed for townhouse blocks. The Type A and Type B Scope of Work should be used for this purpose.

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To avoid a Scope of Work proposal being refused, builders should ensure the FRC is familiar with the complexity of the project and is providing to a level of review that sufficiently addresses the warranty claim risk associated with those components.

TARION'S EXPECTATIONS AND COMMITMENTS

Where circumstances require a change in the FRC's level of effort to review a project so the performance of the building's components can be monitored (e.g. originally proposed concrete cladding is substituted with EIFS), Tarion must be notified of the changes at the earliest opportunity by submitting a revised Scope of Work.

Tarion will review and approve the Scope of Work Proposal within 30 days of receipt of the Proposal or contact the builder if further information is required. Tarion will prioritize resolving any shortfalls in the Proposal. If Tarion does not contact the builder the Proposal can be considered accepted.

HOW THE SCOPE OF WORK FITS IN WITH THE REST OF BUILDER BULLETIN 19R

The Scope of Work precedes, and forms the framework for, the FRC reports that keep Tarion informed about the progress of each condominium project. It lays out the target level of review to which the FRC commits, subject to necessary changes, in the early stages of the project. Tarion refers to the Scope of Work when reviewing the subsequent 60-day, Milestone and Final reports.

How to complete a Scope of WORK (see Figure 1. on next page)

The Scope of Work Proposal provides guidance notes in relation to

- 'Documentation review' i.e. the collection and reviewing of reports created by other agencies or consultants
- 'Field review' i.e. those elements of on-site review undertaken by the FRC or their agents.

FRCs who provide a service 'in house' e.g. concrete testing, must deal with the testing reports as though it were provided by an outside agency or consultant subject to 'documentation review'. FRCs must note that a documentation review will take place with respect to those particular risk areas on Scope of Work Proposals.

Some risk areas have additional guidance notes. These are intended to alert FRCs and builders to areas that have proven problematic to Tarion in its complaints, claims and dispute resolution history.

In each Risk Area, for the 'Field Review' component only, the FRC enters the proposed number of visits using the notional buildings for guidance. 'Documentation Review' requires the FRC to notify Tarion only when specific problem areas are reported by a Design Consultant. Where nothing of concern has been identified in such a report a note to that effect shall be provided at the relevant Milestone Report stage.

Tarion will continuously monitor the relationship between review levels and construction problems and adjust its requirements as necessary. FRCs will be notified of these changes.

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Figure 1. The Type C/D Scope of Work Explained

ITEM	RISK AREAS	RISK	FACTORS	Proposed number of visits
1	BELOW GRADE/ FOUNDATIONS	Documentation Review	Field Review	
1.1	Foundation bearing	Soil investigation review, footing design		
1.2	Substructure	Reinforcing, concrete cover over steel		
1.3	Drainage systems	Materials; coverage; connection to drain; clean outs	Materials	
1.4	Damp proofing or waterproofing		Materials; surface preparation; continuity; thickness; joint /detailing/ reinforcing/ protection	
1.5	Insulation		Materials; continuity; protection	
1.6	Elevator sump pits	Drainage; access; appropriate certification		
			Total proposed number of visits:	

A WORD ABOUT ‘VISITS’

Tarion has not attempted to prescribe what amount of time or level of activity constitutes a ‘visit’. The amount of time required to inspect one component could be different from the amount of time needed to inspect another. Tarion will rely on the professionalism and due diligence of FRCs to establish the number and duration of visits that will be required to properly carry out their duties in managing the warranty claim risk. Tarion recognizes that an FRC can review more than one Risk Area during one site visit. It is acceptable for each area of review to be counted as a ‘visit’ both for the purposes of the Scope of Work Proposal and for the 60-day and Milestone Reports.

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Module 2A
Scope of Work Proposal

PROJECT DETAILS:

Project Name: _____

Common Element Enrolment Number (if available): _____

Address: _____

Vendor: _____ Vendor Reg. No.: _____

Builder: _____ Builder Reg. No.: _____

Estimated Construction Start date: _____ Estimated Completion Date: _____

Condominium Type: A B C D Mid-Rise Wood frame: YES NO

Condominium Conversion: YES NO

Number of Towers/Buildings: _____ Townhouses included: YES NO

Number of Stories (per tower): _____

Levels of Garage Parking: _____ Gross Floor area (ft²): _____

Exterior Cladding Breakdown by type (ft²):

Masonry: _____ Siding: _____ Precast: _____ EIFS: _____

Window Wall: _____ Curtain Wall: _____ Punched Window/Door: _____

ICF: _____ Other (specify): _____

Approximate total exterior cladding (ft²) (including windows and doors): _____

Roofing Assembly Type: _____ Green Roof: YES NO

Anchor Systems included as per Architectural design: YES NO

Glass Balcony Guards: YES NO Anchored to: Top of slab Face of slab

Special Features: (e.g. pools, sauna, car elevator, water features etc.)

New Technologies: (refer to page 24 for details)

New Technology:

Building materials and technology are constantly evolving. As part of B19 Reporting, Tarion requires information related to the use of new materials, as well as new and unique applications of existing materials used in a major component of a project.

Please identify these potential risks on the front page of the scope of work. Additional reporting and testing may be required depending on the risks identified. Identify and describe any appropriate testing on page 5 and identify what additional document and/or field review is appropriate under each affected Risk Areas.

As an example, a new cladding or roofing product which does not yet have proven history in Ontario, or a new approach to building vibration isolation could be considered a New Technology. Unique elements of the design or customized systems should be considered. Contact Tarion if you are unsure about what to include under this category.

PROJECT TEAM PERSONNEL:

Field Review Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Project Architect: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Geotechnical Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

Structural Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Mechanical Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Electrical Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Acoustical Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Site Work Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

Landscape Architect: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Interior Design Consultant: _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Other (ex. Building Enclosure Consultant, Building Code Consultant, Fire/Life Safety Consultant, etc)

1. _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

2. _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

3. _____

STREET ADDRESS		UNIT/SUITE
CITY	PROV	POSTAL CODE
PHONE	FAX	EMAIL

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

TESTING

Where the construction documents, specifications, Ontario Building Code or this Bulletin require tests to be completed, the testing organization must be identified.

Type of test	In House? YES/NO	If No, Name of Company Conducting the Test	Company Contact
Windows/Doors (required by B19)			
Acoustics (required by B19)			
Balcony/Terrace Guards (required by B19)			
Soils			
Footing Inspection			
Hydro-Geological			
Environmental			
Concrete			
Steel			
Membranes			
New Technology (for any unique testing based on the use on new technologies. Refer to page 2 for details)			
Other (include details on a separate sheet if needed)			

Continue to the Scope of Work Proposal Risk Areas that follow:

- Type C and Type D projects start on page 28
- Type A and Type B projects start on page 29

SCOPE OF WORK PROPOSAL – Type C and Type D PROJECTS

Level of Review/Work performed by FRC and/or Design/Review Consultant

C/D RISK AREA 1 – Below Grade/Foundations				
ITEM	RISK AREAS	RISK FACTORS		
1	BELOW GRADE/ FOUNDATIONS	Documentation Review	Field Review	Proposed number of visits
1.1	Foundation bearing	Soil investigation review, footing design		
1.2	Substructure	Reinforcing, concrete cover over steel		
1.3	Drainage systems	Materials; coverage; connection to drain; clean outs	Materials, drainage slope	
1.4	Damp proofing or waterproofing		Materials; surface preparation; continuity; thickness; joint detailing/ reinforcing/ protection	
1.5	Insulation		Materials; continuity; protection	
1.6	Elevator sump pits	Drainage; access; appropriate certification		
			Total proposed number of visits:	

C/D RISK AREA 2 – Structure				
ITEM	RISK AREAS	RISK FACTORS		
2	STRUCTURE	Documentation Review	Field Review	Proposed number of visits
2.1	Slabs; decks/beams; columns; walls	Post-tensioning/protection from moisture	Column finish	
	Additional review for Mid-Rise wood-framed buildings	Seismic loading, seismic resistance system	Seismic resistance system installation	
2.2	Expansion joints	Continuity; unimpeded movement; no binding	Materials; placement; installation	
2.3	Slab protection systems: - Parking garage - Surface	Concrete mix/admixtures; reinforcing steel- coatings; slope to drain; slope of slab-on- grade away from structural elements	Protection from corrosion problems related to de-icing salts; protection against leakage Traffic deck waterproofing system; upturns at terminations; seals at penetrations; joint sealing details; exterior ramp waterproofing/de-icing system; trench drain waterproofing; column/wall base protection at slab-on-grade	
2.4	Balcony protection systems	Concrete cover over reinforcing	Appropriate concrete mix; drainage; toppings or mortar repair; surface preparation; materials and application; sealer or waterproofing	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

2.4.1	Balcony guards	Correct materials; anchorage; anchor corrosion protection; height; maximum openings, approvals, etc. Type of glass: laminate/tempered/other (see the Field Review Declaration)	Securement of individual components in addition to securement of entire guard system Plus, field balcony guard design load test in accordance with applicable standards	
2.5	Wood/steel framing Including Mid-Rise wood-framed buildings	Materials, shrinkage control, balcony slope, differential movement with non-combustible components	Conformance to construction documents; shrinkage and differential movement control	
			Total proposed number of visits:	

C/D RISK AREA 3 – Exterior Closure

Cladding – Levels of effort depend on the type and degree of occurrence of different types of cladding e.g. areas clad in EIFS typically require greater attention than areas clad in pre-cast concrete.

Windows – Air leakage and water penetration tests shall be conducted on a representative sample of each window system type installed in the building. Testing of window systems includes hinged and sliding **patio doors** that are exposed (e.g. unprotected by a balcony above).

ITEM	RISK AREAS	RISK FACTORS		
3	EXTERIOR CLOSURE	Documentation Review	Field Review	Proposed number of visits
3.1	Back-up wall; substrate		Materials; thicknesses; dimensions; corrosion protection; anchorage to structure; deflection/expansion/control joint details; clear widths	
3.2	Masonry veneer	Shelf angles; corrosion protection	Shelf angles; corrosion protection; securement; masonry units; connectors; control joints; locations; clear widths	
3.2.1	Precast concrete	Embedded anchors; corrosion protection; concrete quality	Shop and site review for anchorage; corrosion protection; joint widths; repairs	
3.2.2	Cast-in-place concrete	Control and expansion joints; concrete quality; concrete placement; curing; freeze protection; application	Treatment of honeycombing, cracks and form tie holes	
3.2.3	Siding (excluding components that are only decorative)	Finishes; coatings; substrate; fasteners; corrosion protection	Materials; movement allowances	
	Additional review for Mid-Rise wood-framed buildings	Non-combustible cladding	Non-combustible cladding	
3.2.4	Exterior Insulated Finish system (EIFS)	Review of shop drawings and details respecting drainage and prevention of ingress of uncontrolled water and precipitation through the building envelope as required in the OBC	Shop and site review for adhesives; fasteners; surface preparation; reinforcing; detailing; joint details; finish materials; application; drainage. Provide field mock-up of EIFS for review prior to installation.	

3.2.5	Insulated Concrete Forms (ICF)	Review manufacturer's performance and installation specifications respecting drainage and prevention of ingress of uncontrolled water and precipitation through the building envelope as required in the OBC	Adhesives; fasteners; surface preparation; reinforcing; detailing; joint details; finish materials; application. Provide field mock-up of ICF for review prior to installation.	
3.2.6	Window wall	Review of shop drawings and details respecting drainage and prevention of ingress of uncontrolled water and precipitation through the building envelope as required in the OBC	Adhesives; fasteners; surface preparation; reinforcing; detailing; joint details; finish materials; application. Provide field mock-up of window wall for review prior to installation.	
3.2.7	Load bearing masonry	Shelf angles; corrosion protection	Shelf angles; corrosion protection; securement; masonry units; connectors; control joints; locations; clear widths	
3.2.8	Curtain Wall	Review of shop drawings and details respecting drainage and prevention of ingress of uncontrolled water and precipitation through the building envelope as required in the OBC	Shelf angles; corrosion protection; securement; connectors; control joints; locations	
3.2.9	Other cladding systems	Contact Tarion		
3.3	Concealed protections		External flashings; sills Impermeable exterior components; continuity of external seals between components and at all joints Internal flashings; joint seals; end dams; moisture barriers; clear drainage to exterior; venting	
3.3.1	External sealants		Materials; surface preparation	
3.3.2	Soffits		Materials; thicknesses; dimensions; corrosion protection; anchorage to structure; deflection/expansion/control joint details	
3.3.3	Architectural coatings, finishes, paint	Materials; surface preparation; priming; application	Materials; surface preparation; priming; application	
3.4	Windows, glazing and exterior doors	Review of shop drawings and lab test reports of window systems	Air leakage and water penetration field testing ; as well as anchorage, operation, hardware	
3.5	Thermal insulation		Materials; securement; continuity, limit thermal bridges	
3.6	Air barrier; vapour retarder		Materials; securement; continuity; seals at slabs, interior walls, seals at all penetrations; windows; doors	
			Total proposed number of visits:	

C/D RISK AREA 4 – Roofing				
ITEM	RISK AREAS	RISK FACTORS		
4	ROOFING	Documentation Review	Field Review	Proposed number of visits
4.1	Membrane; shingles or sloped metal	Ventilation (if provided)	Materials; joint details/reinforcing; securement/adhesion; underlayment; ice damming protection; flashings; penetration seals	
4.2	Insulation; ballast		Materials; installation; continuity	
4.3	Vapour retarder; air barrier; ventilation		Materials; adhesion (if required); continuity, seals at walls and penetrations; ventilation (if provided)	
4.4	Drainage		Slope to drain	
4.5	Snow and ice control		Snow/ice guards	
4.6	Safety tie-back anchors for building maintenance	Locations; anchorage; corrosion protection; rope steps; sleeves	Pitch pockets – materials and application	
4.7	Green Roof Intensive, extensive	Review design documents and specifications	Materials; installation; in accordance with applicable law	
			Total proposed number of visits:	

C/D RISK AREA 5 – Fire Safety Systems				
ITEM	RISK AREAS	RISK FACTORS		
5	FIRE SAFETY SYSTEMS	Documentation Review	Field Review	Proposed number of visits
5.1	Containment	Review design documents and specifications	Fire separations; materials; thicknesses; assembly; fastening; continuity; fire stopping; smoke seals; closures	
5.2	Egress	Corridors; stairwells; stairwell guards; pressurization systems (lighting – see 9.2); Review design documents and specifications	Fire separations; materials; thicknesses; assembly; fastening; continuity; fire stopping; smoke seals; closures	
5.3	Suppression	Stand pipes; fire hose cabinets; booster pumps; sprinkler systems		
	Additional review for Mid-Rise wood-framed buildings	Balcony sprinkler protection	Balcony sprinkler protection	
5.4	Detection and alarm	Control panel and annunciator; heat, smoke and flow detectors; bells and horns; emergency voice communication		
			Total proposed number of visits:	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

C/D RISK AREA 6 – Interior Finish				
ITEM	RISK AREAS	RISK FACTORS		
6	INTERIOR FINISH – COMMON AREAS	Documentation Review	Field Review	Proposed number of visits
6.1	Corridors and stairwells		Condition of flooring and walls, lighting fixtures and ceilings	
6.2	Party/common rooms		Condition of flooring, walls, ceilings, lighting fixtures and cabinetry	
6.3	Sauna, whirlpool, fitness amenities. Barrier; ventilation	Function; equipment	Condition of finishes; functions; equipment	
6.4	Swimming pool	Function; equipment	Condition of finishes, function; equipment	
			Total proposed number of visits:	

C/D RISK AREA 7 – Elevators				
ITEM	RISK AREAS	RISK FACTORS		
7	CONVEYING SYSTEMS (ELEVATORS)	Documentation Review	Field Review	Proposed number of visits
7.1	Finishes	Condition of finishes; appropriate certification	Condition of finishes	
			Total proposed number of visits:	

C/D RISK AREA 8 – Mechanical				
Acoustics and labeling – Acoustic performance and labeling are sources of regular complaints and should receive additional attention.				
ITEM	RISK AREAS	RISK FACTORS		
8	MECHANICAL	Documentation Review	Field Review	Proposed number of visits
8.1	Heating; ventilation; air conditioning	Central boilers; heat pumps; chiller; cooling tower; make-up air units; distribution piping; ductwork; insulation; exhaust systems; suite distribution; controls; labeling.	Labeling	
8.2	Plumbing – supply	Water service; metering; booster pumps; distribution piping; expansion joints; valves; securement; insulation; boilers; storage tanks; re-circulation pumps; labeling.	Labeling	
8.3	Plumbing – drainage	Storm and sanitary drains; sump pumps; clean-outs; labeling.	Labeling	
8.4	Waste disposal	Garbage chutes; chute doors; wash-down facilities; compactor; labeling.	Labeling	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

8.5	Fire stopping	Materials, fire stopping, smoke seal	Materials, fire stopping, smoke seal	
8.6	Emergency power (see also 9.3)	Fuel storage design	Labelling, approvals and variances posted in the fuel storage room	
			Total proposed number of visits:	

C/D RISK AREA 9 – Electrical				
Acoustics and labeling – Acoustic performance and labeling are sources of regular complaints and should receive additional attention.				
ITEM	RISK AREAS	RISK FACTORS		
9	ELECTRICAL	Documentation Review	Field Review	Proposed number of visits
9.1	Distribution systems	Switchgear; transformers; labeling and sound rating of transformers (in accordance with OBC/ASHRAE)	Labeling	
9.2	Lighting	Corridor; lobby; stairwells; parking garage; intensity levels; emergency power supply; labeling	Labeling and lighting levels	
9.3	Emergency power (see also 8.6)	Generator; fuel storage; controls; ventilation	Labeling	
9.4	Intercom and security systems	Installation; function	Function	
9.5	Fire stopping	Materials; fire stopping and smoke seals	Materials; fire stopping and smoke seal	
			Total proposed number of visits:	

C/D RISK AREA 10 – Site Work & Landscaping				
ITEM	RISK AREAS	RISK FACTORS		
10	SITE WORK & LANDSCAPING	Documentation Review	Field Review	Proposed number of visits
10.1	Pavements; curbs	Materials; sub-base materials; thicknesses; compaction; drainage	Materials; sub-base materials; thicknesses; compaction; drainage	
10.2	Retaining walls	In conformance to design or manufacturer's drawings		
10.3	Landscape structures; (gazebos, decks)	Materials; foundations; construction; moisture protection; corrosion protection		
10.4	Fences	Materials; frost protection	Materials; frost protection	
10.5	Irrigation systems	In conformance to design and drawings		
10.6	Sod, trees and shrubs	Top soil	Topsoil	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

10.7	Site services	In conformance to design and drawings	Location, accessibility, labelling	
			Total proposed number of visits:	

C/D RISK AREA 11 – Acoustics
Acoustics – Acoustics must be reviewed from both an installation and a performance perspective. Design consultants must work in conjunction with the acoustic consultant to ensure the components are specified and installed to achieve their intended performance. For example, the project architect may specify an assembly but the acoustic consultant would be responsible to test it for performance.

ITEM	RISK AREAS	RISK FACTORS		
11	ACOUSTICS	Documentation Review	Field Review	Proposed number of visits
11.1	Sound transmission - Suite to Suite	Review design documents, sound transmission class rating of vertical and horizontal separating assemblies	Material; thickness; arrangement of components; continuity; acoustic caulking/seals. Flanking transmission path(s); separating assemblies subject to field testing and evaluation by a qualified acoustic consultant	
11.2	Sound transmission - Suite to Interior common areas including elevator shafts, service areas (chutes, shafts and spaces) and amenity areas	Review design documents, sound transmission class rating of vertical and horizontal separating assemblies	Material; thickness; arrangement of components; continuity; acoustic caulking/seals. Flanking transmission path(s); separating assemblies subject to field testing and evaluation by a qualified acoustic consultant (except where the space or area is not amenable to recognized testing procedure)	
11.3	Sound transmission - Elevator equipment	Review design documents for elevator equipment sound/vibration transmission, acoustic isolation	Conformance to permit documents and the acoustic report forming the basis of the Design Certificate	
11.4	Mechanical sound/vibration transmission	Review design documents for central (excluding private in-suite equipment) HVAC, plumbing and waste collection equipment sound/vibrations plus suite equipment impacts on the building and respective suites; acoustic isolation; pumps; garbage chutes and compaction; plumbing piping; acoustic insulation materials; acoustic louvers; conformance to OBC/ASHRAE and permit documents	Conformance to permit documents and the acoustic report forming the basis of the Design Certificate	
11.5	Emergency electrical power, noise rating of transformers	Acoustic treatment/finishes of generator room building components; acoustic louvers; silencers; mufflers; acoustic isolation; labeling; sound transmission through the structure and openings to the outside; vibration isolation; conformance to OBC/ASHRAE and permit documents.	Conformance to permit documents and the acoustic report forming the basis of the Design Certificate	
			Total proposed number of visits:	

Declaration

I undertake to carry out the documentation and field reviews at the time and in the manner outlined above. I will provide all documents and reports to Tarion in accordance with the terms attached to this firm's application for Bulletin 19R Qualification Status approved by Tarion under Certificate No. _____.

PRINT NAME OF FRC AUTHOURIZED TO BIND FIRM

SIGNATURE OF FRC AUTHOURIZED TO BIND FIRM

DATE

POSITION

PRINT NAME OF VENDOR/BUILDER REPRESENTATIVE

VENDOR/BUILDER'S REPRESENTATIVE SIGNATURE

DATE

COMPANY

PHONE

EMAIL

**SCOPE OF WORK PROPOSAL – Type A and Type B PROJECTS
(including Townhouses within a predominantly Type C or Type D project)**

Level of Review/Work performed by FRC and/or Design/Review Consultant

A/B RISK AREA 1 – Below Grade/Foundations				
ITEM	RISK AREAS	RISK FACTORS		
1	BELOW GRADE/ FOUNDATIONS (for buildings over parkade)	Documentation Review	Field Review	Proposed number of visits
1.1	Foundation bearing	Soil investigation review, footing design		
1.2	Substructure	Reinforcing, concrete cover over steel		
1.3	Drainage systems - Parkade	Materials; coverage; connection to drain; clean outs	Materials, drainage slope	
1.4	Damp proofing or waterproofing		Materials; surface preparation; continuity; thickness; joint detailing/ reinforcing/ protection	
1.5	Insulation - Parkade - On Grade		Materials; continuity; protection	
1.6	Elevator sump pits	Drainage; access; appropriate certification		
			Total proposed number of visits:	

A/B RISK AREA 2 – Structure				
ITEM	RISK AREAS	RISK FACTORS		
2	STRUCTURE	Documentation Review	Field Review	Proposed number of visits
2.1	Slabs; decks/beams; columns; walls	Post-tensioning/protection from moisture	Column finish	
2.2	Expansion joints	Continuity; unimpeded movement; no binding	Materials; placement; installation	
2.3	Slab protection systems: - Parkade - Surface	Concrete mix/admixtures; reinforcing steel-coatings; slope to drain; slope of slab-on- grade away from structural elements	Protection from corrosion problems related to de-icing salts; protection against leakage Traffic deck waterproofing system; upturns at terminations; seals at penetrations; joint sealing details; exterior ramp waterproofing/de-icing system; trench drain waterproofing; column/wall base protection at slab-on-grade	
2.4	Balcony protection systems	Concrete cover over reinforcing	Appropriate concrete mix; drainage; toppings or mortar repair; surface preparation; materials and application; sealer or waterproofing	

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2.4.1	Balcony guards	Correct materials; anchorage; anchor corrosion protection; height; maximum openings, etc.	Design load securement	
2.5	Wood/steel framing	Headers, built up beams and columns, spacing, grading of materials	Securement and conformance to construction documents	
			Total proposed number of visits:	

A/B RISK AREA 3 – Exterior Closure

Cladding – Levels of effort depend on the type and degree of occurrence of different types of cladding e.g. areas clad in EIFS typically require greater attention than areas clad in pre-cast concrete.

Windows – Air leakage and water penetration tests shall be conducted on a representative sample of each window system type installed in the building. Testing of window systems includes hinged and sliding **patio doors** that are exposed (e.g. unprotected by a balcony above).

ITEM	RISK AREAS	RISK FACTORS		Proposed number of visits
		Documentation Review	Field Review	
3	EXTERIOR CLOSURE			
3.1	Back-up wall; substrate		Materials; thicknesses; dimensions; corrosion protection; anchorage to structure; deflection/expansion/control joint details; clear widths	
3.2	Masonry veneer	Shelf angles; corrosion protection	Shelf angles; corrosion protection; securement; masonry units; connectors; control joints; locations; clear widths	
3.2.1	Precast concrete	Embedded anchors; corrosion protection; concrete quality	Shop and site review for anchorage; corrosion protection; joint widths; repairs	
3.2.2	Cast-in-place concrete	Control and expansion joints; concrete quality; concrete placement; curing; freeze protection; application	Treatment of honeycombing, cracks and form tie holes	
3.2.3	Siding (excluding components that are only decorative)	Finishes; coatings; substrate; fasteners; corrosion protection	Materials; movement allowances	
3.2.4	Exterior Insulated Finish system (EIFS)		Shop and site review for adhesives; fasteners; surface preparation; reinforcing; detailing; joint details; finish materials; application; drainage	
3.2.5	Insulated Concrete Forms (ICF)	Manufacturer's performance and installation specifications	Insulation continuity, limit thermal bridges	
3.2.6	Window wall	Manufacturer's performance and installation specifications	Shelf angles; corrosion protection; securement; connectors; control joints; locations	
3.2.7	Load bearing masonry	Shelf angles; corrosion protection	Shelf angles; corrosion protection; securement; masonry units; connectors; control joints; locations; clear widths	
3.2.8	Curtain Wall	Review of shop drawings and details respecting drainage and prevention of ingress of uncontrolled water and precipitation through the building envelope as required in the OBC	Shelf angles; corrosion protection; securement; connectors; control joints; locations	

3.2.9	Other cladding systems	Contact Tarion		
3.3	Concealed protections		External flashings; sills Impermeable exterior components; continuity of external seals between components and at all joints Internal flashings; joint seals; end dams; moisture barriers; clear drainage to exterior; venting	
3.3.1	External sealants		Materials; surface preparation	
3.3.2	Soffits		Materials; thicknesses; dimensions; corrosion protection; anchorage to structure; deflection/expansion/control joint details	
3.3.3	Architectural coatings, finishes, paint	Materials; surface preparation; priming; application	Materials; surface preparation; priming; application	
3.4	Windows, glazing and exterior doors		Air leakage and water penetration field testing ; anchorage; operation; hardware	
3.5	Thermal insulation		Materials; securement; continuity; limit thermal bridges	
3.6	Air barrier; vapour retarder		Materials; securement; continuity; seals at slabs; interior walls; seals at all penetrations; windows; doors.	
			Total proposed number of visits:	

A/B RISK AREA 4 – Roofing				
ITEM	RISK AREAS	RISK FACTORS		
4	ROOFING	Documentation Review	Field Review	Proposed number of visits
4.1	Membrane; shingles or sloped metal	Ventilation (if provided)	Materials; joint details/reinforcing; securement/adhesion; underlayment; ice damming protection; flashings; penetration seals	
4.2	Insulation; ballast		Materials; installation; continuity	
4.3	Vapour retarder; air barrier; ventilation		Materials; adhesion (if required); continuity, seals at walls and penetrations; ventilation (if provided)	
4.4	Drainage		Slope to drain	
4.5	Snow and ice control		Snow/ice guards	

4.6	Safety tie-back anchors for building maintenance	Locations; anchorage; corrosion protection; rope steps; sleeves	Pitch pockets – materials and application	
4.7	Green Roof Intensive, extensive	Manufacturer's performance and installation specifications.	Materials; installation; in accordance with applicable law	
			Total proposed number of visits:	

A/B RISK AREA 5 – Fire Safety Systems				
ITEM	RISK AREAS	RISK FACTORS		
5	FIRE SAFETY SYSTEMS	Documentation Review	Field Review	Proposed number of visits
5.1	Containment	Fire separations; materials; thicknesses; assembly; fastening; continuity; fire stopping; smoke seals; closures	Fire separations; materials; thicknesses; assembly; fastening; continuity; fire stopping; smoke seals; closures	
5.2	Egress		Fire separations; materials; thicknesses; assembly; fastening; continuity; fire stopping; smoke seals; closures	
5.3	Suppression	Stand pipes; fire hose cabinets; booster pumps; sprinkler systems		
5.4	Detection and alarm	Control panel and annunciator; heat, smoke and flow detectors; bells and horns; emergency voice communication		
			Total proposed number of visits:	

RISK AREA 6 – Interior Finish				
ITEM	RISK AREAS	RISK FACTORS		
6	Interior Finish, Common Areas	Documentation Review	Field Review	Proposed number of visits
6.1	Corridors and stairwells		Condition of flooring and walls, lighting fixtures and ceilings	
6.2	Party/common rooms		Condition of flooring, walls, ceilings, lighting fixtures and cabinetry	
6.3	Sauna, whirlpool, fitness amenities. Barrier; ventilation	Function; equipment	Condition of finishes; functions; equipment	
6.4	Swimming pool	Function; equipment	Condition of finishes, function; equipment	
			Total proposed number of visits:	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

A/B RISK AREA 7 – Elevators				
ITEM	RISK AREAS	RISK FACTORS		
7	CONVEYING SYSTEMS (ELEVATORS)	Documentation Review	Field Review	Proposed number of visits
7.1	Finishes	Condition of finishes; appropriate certification	Condition of finishes	
			Total proposed number of visits:	

A/B RISK AREA 8 – Mechanical				
Acoustics and labeling – Acoustic performance and labeling are sources of regular complaints and should receive additional attention.				
ITEM	RISK AREAS	RISK FACTORS		
8	MECHANICAL	Documentation Review	Field Review	Proposed number of visits
8.1	Heating; ventilation; air conditioning	All-in-ones; heat pumps; make-up air units; distribution piping; ductwork; insulation; acoustic isolation; exhaust systems; suite distribution; controls. Acoustics; labeling.	Labeling	
8.2	Plumbing – supply	Water service; metering; booster pumps; distribution piping; expansion joints; valves; securement; insulation; boilers; storage tanks; re-circulation pumps. Acoustics; labeling.	Labeling	
8.3	Plumbing – drainage			
8.4	Waste disposal (where applicable)	Garbage chutes; chute doors; wash-down facilities; compactor; labeling.	Labeling	
8.5	Fire stopping	Materials, fire stopping, smoke seal	Materials, fire stopping, smoke seal	
8.6	Emergency power (see also 9.3)	Fuel storage design	Labelling, approvals and variances posted in the fuel storage room	
			Total proposed number of visits:	

A/B RISK AREA 9 – Electrical				
Acoustics and labeling – Acoustic performance and labeling are sources of regular complaints and should receive additional attention.				
ITEM	RISK AREAS	RISK FACTORS		
9	Electrical	Documentation Review	Field Review	Proposed number of visits
9.1	Distribution systems	Switchgear; transformers; labeling	Labeling	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

9.2	Lighting	Corridor; lobby; stairwells; parking garage; intensity levels; emergency power supply; labeling	Labeling	
9.3	Emergency power (see also 8.6)	Generator; fuel storage; controls; ventilation; acoustic isolation; labeling	Labeling	
9.4	Intercom and security systems	Installation; function	Function	
9.5	Fire stopping	Materials; fire stopping and smoke seals	Materials; fire stopping and smoke seal	
			Total proposed number of visits:	

A/B RISK AREA 10 – Site Work & Landscaping				
ITEM	RISK AREAS	RISK FACTORS		
10	SITE WORK & LANDSCAPING	Documentation Review	Field Review	Proposed number of visits
10.1	Pavements; curbs	Materials; sub-base materials; thicknesses; compaction; drainage	Materials; sub-base materials; thicknesses; compaction; drainage	
10.2	Retaining walls	In conformance to design or manufacturer's drawings		
10.3	Landscape structures; (gazebos, decks)	Materials; foundations; construction; moisture protection; corrosion protection		
10.4	Fences	Materials; frost protection	Materials; frost protection	
10.5	Irrigation systems	In conformance to design and drawings		
10.6	Sod, trees and shrubs	Top soil	Top soil	
10.7	Site services	In conformance to design and drawings	Location, accessibility, labelling	
			Total proposed number of visits:	

A/B RISK AREA 11 – Acoustics				
Acoustics – Acoustics must be reviewed from both an installation and a performance perspective. Design consultants must work in conjunction with the acoustic consultant to ensure the components are specified and installed to achieve their intended performance. For example, the project architect may specify an assembly but the acoustic consultant would be responsible to test it for performance.				
ITEM	RISK AREAS	RISK FACTORS		
11	ACOUSTICS	Documentation Review	Field Review	Proposed number of visits
11.1	Sound transmission – Suite to Suite	Review design documents, sound transmission class rating of vertical and horizontal separating assemblies	Material; thickness; arrangement of components; continuity; acoustic caulking/seals. Flanking transmission path(s); separating assemblies subject to field testing and evaluation by a qualified acoustic consultant	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

11.2	Sound transmission – Suite to Interior common areas including elevator shafts, service areas (chutes, shafts and spaces) and amenity areas	Review design documents, sound transmission class rating of vertical and horizontal separating assemblies	Material; thickness; arrangement of components; continuity; acoustic caulking/seals. Flanking transmission path(s); separating assemblies subject to field testing and evaluation by a qualified acoustic consultant (except where the space or area is not amenable to recognized testing procedure)	
11.3	Sound transmission - Elevator equipment	Review design documents for elevator equipment sound/vibration transmission, acoustic isolation	Conformance to permit documents and the acoustic report forming the basis of the Design Certificate	
11.4	Mechanical sound/vibration transmission	Review design documents for central (excluding private in-suite equipment) HVAC, plumbing and waste collection equipment sound/vibrations plus suite equipment impacts on the building and respective suites; acoustic isolation; pumps; garbage chutes and compaction; plumbing piping; acoustic insulation materials; acoustic louvers; conformance to OBC/ASHRAE and permit documents	Conformance to permit documents and the acoustic report forming the basis of the Design Certificate	
11.5	Emergency electrical power, noise rating of transformers	Acoustic treatment/finishes of generator room building components; acoustic louvers; silencers; mufflers; acoustic isolation; labeling; sound transmission through the structure and openings to the outside; vibration isolation; conformance to OBC/ASHRAE and permit documents.	Conformance to permit documents and the acoustic report forming the basis of the Design Certificate	
			Total proposed number of visits:	

Update to Scope of Work Effective: September 1, 2020, for all new projects with a construction start date of September 1, 2020 or later. Construction is considered to have started when the excavation begins.

Declaration

I undertake to carry out the documentation and field reviews at the time and in the manner outlined above. I will provide all documents and reports to Tarion in accordance with the terms attached to this firm's application for Bulletin 19R Qualification Status approved by Tarion under Certificate No. _____.

PRINT NAME OF FRC AUTHOURIZED TO BIND FIRM

SIGNATURE OF FRC AUTHOURIZED TO BIND FIRM

DATE

POSITION

PRINT NAME OF VENDOR/BUILDER REPRESENTATIVE

VENDOR/BUILDER'S REPRESENTATIVE SIGNATURE

DATE

COMPANY

PHONE

EMAIL

Scope of Work - Notional Building Guidelines for Level of Effort

The following five notional buildings help FRCs determine the appropriate level of effort for reviewing condominium projects and provide an example of Tarion's expectations. While it is unlikely that actual buildings will match these notional buildings, they are intended to provide a basis from which appropriate levels of effort can be extrapolated.

10- STOREY BUILDING

- Typical 6,000 ft² gross floor area per floor plus a 1,000 ft² mechanical/elevator room on the roof level
- 2 levels of underground parking with 9,000 ft² per level
- 6 units per typical floor and 5 units on the main floor for a total of 59 residential units
- Building height is approx. 95 feet from ground level based on a floor-to-floor height of 8.5 ft and a 9 ft mechanical room (floor to floor height is the same for all buildings)
- Concrete structure, building envelope components, and interior partitions

20- STOREY BUILDING

- Typical 6,000 ft² gross floor area per floor plus a 1,000 ft² mechanical/elevator room on the roof level
- 3 levels of underground parking with 9,000 ft² per level
- 6 units per typical floor and 5 units on the main floor for a total of 119 residential units
- Building height is 180 feet from ground level
- Concrete structure, building envelope components, and interior partitions

30- STOREY BUILDING

- Typical 6,000 ft² gross floor area per floor plus a 1,000 ft² mechanical/elevator room on the roof level
- 4 levels of underground parking with 9,000 ft² per level
- 6 units per floor 5 units on the main floor for a total of 179 residential units
- Building height is 270 feet from ground level
- Concrete structure, building envelope components, and interior partitions

MULTI-TOWNHOUSE (no parkade)

(use Type A and Type B Scope of Work)

Each structure contains eight townhouse units of approximately 1,500 ft² each. The townhouse units are accessible from grade level and have an on-grade integral garage. The structural system for each building consists of Part 9 OBC light wood frame construction with concrete foundations. Building envelope consists of masonry veneer with punched windows and a deck balcony for each unit.

MULTI-TOWNHOUSE (OVER PARKADE)

(use Type A and Type B Scope of Work)

Consists of a townhouse building on an underground parkade. The townhouse building contains eight units.

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Each townhouse unit is approximately 1,500 ft² in size. The underground parkade is on one level and approximately 5,000 ft² in size. The residential buildings utilize Part 9 OBC light wood frame construction for the structure. The parkade structure consists of concrete foundation walls and a concrete slab supporting the residential units above. Building envelope consists of masonry veneer with punched windows and a deck or balcony for each unit.

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Module 3A

Scope of Work - Notional Building Guidelines for Level of Effort

TYPE C AND TYPE D PROJECTS *(Type A and type B Projects start on page 46)*

Note 1: Wall cladding area excludes area for window openings, etc.

Note 2: Where visit numbers within these guidelines are determined by area and an actual project's floor or cladding area is less than the figure quoted for a particular Risk Area sub-category, the FRC should assume the minimal level of effort to be equivalent to the proposed number of visits given for a ten storey notional building. Where visit levels are still felt to be too high the FRC should contact Tarion's Condominium Group.

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
			10 STY	20 STY	30 STY
1	BELOW GRADE/ FOUNDATIONS		10 STY	20 STY	30 STY
1.1	Foundation bearing	Documentation Review			
1.2	Substructure	Documentation Review			
1.3	Drainage systems	Documentation Review PLUS Two visits per underground parkade. One visit to ensure structure adequately sloped and one to visit to confirm drainage after all appliances installed.	4	6	8
1.4	Damp proofing or waterproofing	Two visits per 6,000 ft ²	6	8	12
1.5	Insulation				
1.6	Elevator sump pits	Documentation Review			

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
			10 STY	20 STY	30 STY
2	STRUCTURE		10 STY	20 STY	30 STY
2.1	Slabs; decks; beams; columns walls	Documentation Review PLUS 1 visit per project for review of finish Mid-Rise wood-framed buildings (6-storey maximum) Documentation Review PLUS 1 visit per project for review of seismic protection installation	1 1	1 n/a	1 n/a
2.2	Expansion joints	Documentation Review PLUS 2 visits per underground parkade. 1 visit to review prep-work and 1 visit to review application.	4	6	8
2.3	Slab protection systems • Parking garage • Surface	Documentation Review PLUS 2 visits per 20,000 ft ² of traffic coating. 1 visit to review slab prep and 1 visit to review application. <i>(see Note 2 above)</i>	2	3	4
2.4	Balcony protection systems	Documentation Review PLUS 1 visit per 4 floors to review preparation work, 1 visit per 4 floors to review finish work, and balcony guard design load field test in accordance with applicable standards, 1 test per guard configuration	4	8	12
2.4.1	Balcony guards				

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

2.5	Wood/Steel Framing	Mid-Rise wood-framed buildings (6-storey maximum) Documentation Review PLUS 1 visit per 2 floors	3	n/a	n/a
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ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
			10 STY	20 STY	30 STY
3	EXTERIOR CLOSURE		10 STY	20 STY	30 STY
3.1	Back up wall; substrate	1 visit per 2 floors	5	10	15
3.2	Masonry veneer	Documentation Review PLUS Greater of 1 visit per every 2 floors or 1 visit per 8,000 ft ² of masonry area. This will give the FRC the ability to review each of the required items simultaneously.	4	8	12
3.2.1	Precast concrete	Documentation Review PLUS Shop review – greater of 1 visit per 5 floors of pre-cast or 1 visit per 17,500 ft ² of pre-cast. This is based on the assumption the plant produces one floor of panels every two days.	2	4	6
		Site review – greater of 1 visit per 2 floors of pre-cast or 8,000 ft ² of pre-cast (<i>see Note 1 above</i>). The builder shall ensure that panels remain open for inspection as needed.	4	8	12
3.2.2	Cast-in-place concrete	Documentation Review PLUS Greater of 1 visit per every 5 floors or 1 visit per 16,000 ft ² of cast-in-place concrete. This will provide the FRC the ability to review each of the required items simultaneously. (<i>see Note 2 above</i>)	2	4	6
3.2.3	Siding (excluding components that are only decorative)	Documentation Review PLUS 1 visit per 1,000 ft ² to examine preparation PLUS 1 visit to examine finished installation. (<i>see Note 2 above</i>)	As required		
3.2.4	Exterior Insulated Finish System (EIFS)	Documentation Review PLUS Shop review – greater of 1 visit per 5 floors of EIFS or 1 visit per 17,500 ft ² of EIFS (<i>see Note 1 above</i>). This is based on the assumption the plant produces one floor of panels every 2 days.	7	14	21
		Site review – greater of 1 visit per 1.5 floors of EIFS or 5,000 ft ² of EIFS (<i>see Note 1 above</i>). The builder shall ensure that panels remain open for inspection as needed. Additionally, this will permit the simultaneous inspection of in-situ works. Provide field mock-up of EIFS for review prior to installation.	2	4	6
3.2.5	Insulated Concrete Forms (ICF)	Documentation Review PLUS Site review – greater of 1 visit per 1.5 floors of ICF or 5,000 ft ² of ICF (<i>see Note 1 above</i>). This based on the assumption that the typical construction cycle of a tower will leave the panels exposed for inspection from within the building for 2 to 3 successor activities. Additionally, this will permit the simultaneous inspection of in-situ works. Provide field mock-up of ICF for review prior to installation.	7	14	21
			2	4	6
3.2.6	Window wall	Documentation Review PLUS Shop review – greater of 1 visit per 5 floors of window wall or 1 visit per 17,500 ft ² of Window Wall (<i>see Note 1 above</i>). This is based on the assumption the plant produces one floor of panels every two days. Site review – greater of 1 visit per 1.5 floors of window wall or 5,000 ft ² of window wall (<i>see Note 1 above</i>). The builder shall ensure that panels remain open for inspection as needed. Additionally, this will permit the simultaneous inspection of in-situ works. Provide field mock-up of window wall for review prior to installation.	7	14	21

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

3.2.7	Load-bearing masonry	Documentation Review PLUS Greater of 1 visit per every second floor or 1 visit per 8,000 ft ² of load-bearing veneer. This will provide the inspector the ability to review each of the required items simultaneously.	4	8	12
3.2.8	Curtain wall	Documentation Review PLUS Erection – greater of 1 visit per 2 floors or 7,000 ft ² of curtain wall. The builder shall ensure the curtain wall remains exposed for inspection as needed.	5	10	15
		Finishing – 1 visit per 50,000 ft ² of curtain wall building envelope area. This is the maximum amount of building envelope area that can be reviewed in one visit (<i>see Note 2</i>).	As required		
3.2.9	Other cladding systems	Contact Tarion			
3.3	Concealed protections	1 visit per 2 floors	5	10	15
3.3.1	External sealants	For EIFS – 1 visit per 50,000 ft ² . Other systems – 1 visit per 75,000 ft ² . (<i>see Note 2 above</i>)	6 8	4 18	12 12
3.3.2	Soffits	1 visit per 500 ft ² to examine preparation PLUS 1 visit per 500 ft ² to examine finish (<i>see Note 2 above</i>)	As required		
3.3.3	Architectural coatings, finishes, paint.	Documentation Review PLUS 1 visit per 1,000 ft ² for preparation PLUS 1 visit per 1,000 ft ² for finish. (<i>see Note 2 above</i>)	As required		
3.4	Windows, glazing and exterior doors.	Documentation Review of shop drawings and lab test reports of window and door systems PLUS Greater of 1 visit per 2 floors or 1 visit per 15,000 ft ² of floor area. The builder will leave the window and patio door fastening method exposed for inspection as needed. Minimum of 4 field tests for water penetration resistance.	5	10	15
3.5	Thermal insulation	1 visit per every 3 floors	3	7	10
3.6	Air barrier; vapour retarder				

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
4	ROOFING		10 STY	20 STY	30 STY
4.1	Membrane; shingles or sloped metal	Documentation Review PLUS 1 pre-application and flashing visit PLUS 1 visit per 1,500 ft ² . Assumptions based on daily inspections for a roofing crew completing 1,500 ft ² per day. (<i>see Note 2 above</i>)	5	5	5
4.2	Insulation; ballast.	1 visit per 6,000 ft ² of roof. Based on a roofing crew capacity of 6,000 ft ² per day. (<i>see Note 2 above</i>)	1	1	1
4.3	Vapour retarder; air barrier; ventilation	1 visit per 3,000 ft ² (<i>see Note 2 above</i>)	2	2	2
4.4	Drainage	1 visit per project	1	1	1
4.5	Snow and ice control	1 visit per project	1	1	1
4.6	Safety tie-back anchors for building maintenance	Documentation Review PLUS 1 visit to review materials and application for pitch pockets	1	1	1

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

4.7	Green roof intensive/extensive	Documentation Review PLUS 1 visit to confirm materials and application comply with approved construction documents			
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ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
5	FIRE SAFETY SYSTEMS		10 STY	20 STY	30 STY
5.1	Containment	Documentation Review PLUS The greater of 1 visit per every 2 floors or 20,000 ft ² (see Note 2 above)			
5.2	Egress	Documentation Review PLUS The greater of 1 visit per every 2 floors or 20,000 ft ² . (see Note 2 above)			
5.3	Suppression				
5.4	Detection and alarm				

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
6	INTERIOR FINISHES, COMMON AREAS		10 STY	20 STY	30 STY
6.1	Corridors and stairwells	Documentation Review for 6.3 and 6.4 PLUS Number of visits required to complete walkthrough of all areas			
6.2	Party/common rooms				
6.3	Sauna/whirlpool/Fitness				
6.4	Swimming pool				

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
7	CONVEYING SYSTEMS (ELEVATORS)		10 STY	20 STY	30 STY
7.1	Finishes	Documentation Review PLUS 1 visit for inspection of finishes	1	1	1

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
8	MECHANICAL		10 STY	20 STY	30 STY
8.1	Heating; ventilation; air conditioning	Documentation Review PLUS 1 visit per parkade and 1 visit per every 4 floors to confirm labeling	4	8	12
8.2	Plumbing supply				
8.3	Plumbing drainage				

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

8.4	Waste disposal				
8.5	Fire stopping				
8.6	Emergency power	Documentation Review PLUS 1 visit to confirm labeling and TSSA approval for fuel storage posted			

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
			10 STY	20 STY	30 STY
9	ELECTRICAL				
9.1	Distribution systems	Documentation Review PLUS 1 visit per parkade and 1 visit per every 4 floors to confirm labelling	4	8	12
9.2	Lighting	Documentation Review PLUS 1 visit to confirm labelling and lighting levels	1	1	1
9.3	Emergency power (see also 8.6)		1	1	1
9.4	Intercom and security systems		1	1	1
9.5	Fire stopping	Documentation Review PLUS 1 visit per every 4 floors	3	5	7

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
			10 STY	20 STY	30 STY
10	SITE WORK				
10.1	Pavements; curbs	Documentation Review PLUS 1 visit to confirm sub-grade preparation PLUS 1 visit during installation PLUS one visit on completion	3	3	3
10.2	Retaining walls				
10.3	Landscape structures (gazebos, decks)				
10.4	Fences				
10.5	Irrigation systems	Documentation Review			
10.6	Sod, trees and shrubs	Documentation Review PLUS 1 visit to confirm top-soil	1	1	1
10.7	Site Services	Documentation Review PLUS 1 visit on completion	1	1	1

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING		
			10 STY	20 STY	30 STY
11	ACOUSTICS Review by Qualified Consultant				

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

11.1	Sound transmission – Suite to Suite	Documentation Review PLUS Schedule of partitions/suites/units to be subject to field testing and evaluation by a qualified acoustical consultant.	4	5	6
11.2	Sound transmission – Suite to Interior common areas including elevator shafts, service areas (chutes, shafts and spaces) and amenity areas		4	5	6
11.3	Sound transmission – Elevator equipment	Documentation Review PLUS Number of visits required to confirm permit conformance	1	1	1
11.4	Mechanical sound/vibration transmission	Documentation Review PLUS Number of visits required to confirm permit conformance	1	1	1
11.5	Mechanical sound/vibration transmission	Documentation Review PLUS Number of visits required to confirm permit conformance	1	1	1

Type A and Type B PROJECTS

(including Townhouses within a predominantly Type C or Type D project)

The recommended visit levels for Type A and Type B projects have been calculated on the basis that construction consists of a single block. Where multiple blocks are being constructed one visit can be used to review a representative sample of the same risk area in multiple blocks. The representative sample must provide a level of review that is sufficient to ensure the spirit and intent of the construction documents is being realized and that component performance meets or exceeds current construction standards.

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING	BUILDING
1	BELOW GRADE/ FOUNDATIONS		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
1.1	Foundation bearing	Documentation Review		
1.2	Substructure	Documentation Review		
1.3	Drainage systems	Documentation Review PLUS No parkade – 1 visit to review foundation drains Over parkade – 2 visits to underground parkade; 1 visit to ensure structure adequately sloped and 1 visit to confirm drainage after all appliances are installed.	1	2
1.4	Damp proofing or waterproofing	2 visits per 6,000 ft ²		2
1.5	Insulation	No parkade – 1 visit per block Over parkade – 2 visits per 6,000 ft ²	1	2
1.6	Elevator sump pits	Documentation Review		

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING	
			TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
2	STRUCTURE			
2.1	Slabs; decks; beams; columns; walls	Documentation Review PLUS 1 visit per project for review of finish		1
2.2	Expansion joints	Documentation Review PLUS 1 visit to review preparation and 1 visit to review application		2
2.3	Slab protection systems	Documentation Review PLUS 2 visits per 5,000 ft ² of traffic coating – 1 visit to review slab prep and 1 visit to review application		2
2.4	Balcony protection systems	Documentation Review PLUS 1 visit to review preparation and 1 visit to review application	2	2
2.4.1	Balcony guards	Documentation Review PLUS 1 visit to review preparation work and 1 visit to review completed installation and confirm OBC conformance	2	2
2.5	Wood framing	Documentation Review PLUS 2 visits to review installation	2	2

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL BUILDING	
			TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
3	EXTERIOR CLOSURE			
3.1	Back-up wall; substrate	1 visit per block	1	1
3.2	Masonry veneer	Documentation Review PLUS 1 visit per block	1	1
3.2.1	Precast concrete	Documentation Review PLUS Shop review and Site review – 1 visit each per block. The builder shall ensure that panels remain open for inspection as needed.	2	2
3.2.2	Cast-in-place concrete	Documentation Review PLUS 1 visit per block	1	1
3.2.3	Siding (excluding components that are only decorative)	Documentation Review PLUS 1 visit per block	1	1
3.2.4	Exterior Insulated Finish System (EIFS)	Shop Review – 1 visit per block	1	1
		Site Review – 2 visits per block	2	2
3.2.5	Insulated Concrete Forms (ICF)	Documentation Review PLUS 1 visit per block	1	1
3.2.6	Window wall	Documentation Review PLUS 1 visit per block	1	1
3.2.7	Load bearing masonry	Documentation Review PLUS 1 visit per block	1	1
3.2.8	Curtain wall	Documentation Review PLUS Installation – 1 visit per block	1	1
		Completion – 2 visits per block	2	2

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

3.2.9	Other cladding systems	Contact Tarion	As required	As required
3.3	Concealed protections	1 visit per block	1	1
3.3.1	External sealants	For EIFS – 2 visits per block Other Systems – 1 visit per block	2 1	2 1
3.3.2	Soffits	1 visit per 1,000 ft ² of soffit to allow viewing of ongoing installation	As required	As required
3.3.3	Architectural coatings, finishes, paint	Documentation Review PLUS 1 visit per 1,000 ft ² for preparation and 1 visit per 1,000 ft ² for finish. (see Note 2 above)	As required	
3.4	Windows, glazing and exterior doors	1 visit per block The builder will leave the window and patio door fastening method exposed for inspection as needed. Minimum of 2 field tests for water penetration resistance.	1	1
3.5	Thermal Insulation	1 visit per block	1	1
3.6	Air barrier, vapour retarder			

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL TOWN HOUSE (no parkade)	BUILDING TOWN HOUSE (over parkade)
4	ROOFING		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
4.1	Membrane, shingles or sloped metal	Documentation Review PLUS 3 visits per block – 1 visit each for review of preparation, application and finishing/flashing	3	3
4.2	Insulation; ballast	1 visit per block	1	1
4.3	Vapour retarder; air barrier; ventilation	1 visit per block	1	1
4.4	Drainage	1 visit per block	1	1
4.5	Snow and ice control	1 visit per project	1	1
4.6	Safety tie-back anchor for building maintenance	Documentation Review PLUS 1 visit to review installation (if applicable)	1	1
4.7	Green roof Intensive, extensive	Documentation review PLUS 1 visit to confirm materials and application comply with approved construction documents	1	1

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL TOWN HOUSE (no parkade)	BUILDING TOWN HOUSE (over parkade)
5	FIRE SAFETY SYSTEMS		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
5.1	Containment	Documentation Review PLUS 1 visit per block	1	1
5.2	Egress	No requirements		
5.3	Suppression	Documentation Review		
5.4	Detection & alarm			

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ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL	BUILDING
6	INTERIOR FINISHES, COMMON AREAS		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
6.1	Corridors & Stairwells	Documentation Review of 6.3 and 6.4 PLUS Number of visits to complete walkthrough of all areas (as applicable)	As required	
6.2	Party/common rooms			
6.3	Sauna/whirlpool/ Fitness			
6.4	Swimming pool			

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL	BUILDING
7	CONVEYING SYSTEMS		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
7.1	Finishes	Documentation review PLUS one visit for inspection of finishes		1

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL	BUILDING
8	MECHANICAL		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
8.1	Heating; ventilation; air conditioning	Documentation Review PLUS 1 visit per block and 1 visit to parkade to review labeling	1	2
8.2	Plumbing – supply	Documentation Review PLUS 1 visit per block to review labeling	1	1
8.3	Plumbing – drainage	No requirements		
8.4	Waste disposal	Documentation Review PLUS 1 visit per block to review labeling	1	1
8.5	Fire stopping	Documentation Review PLUS 1 visit per block	1	1
8.6	Emergency power (see also 9.3)	Documentation Review PLUS 1 visit to confirm labeling and TSSA approval for fuel storage posted (as applicable)		1

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL	BUILDING
9	ELECTRICAL		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
9.1	Distribution systems	Documentation Review PLUS 1 visit to parkade to review labeling and function		
9.2	Lighting			
9.3	Emergency power			
9.4	Intercom and security systems			
9.5	Fire stopping	Documentation review PLUS 1 visit per block	1	1

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ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL	BUILDING
10	SITE WORK		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
10.1	Pavement, Curbs	Documentation Review PLUS For 10.1 and 10.4, 1 visit to confirm sub-grade preparation, 1 visit during installation, 1 visit on completion	3	3
10.2	Retaining walls			
10.3	Landscape structures (gazebos, decks)			
10.4	Fences			
10.5	Irrigation systems	Documentation Review		
10.6	Sod, trees and shrubs	Documentation Review PLUS 1 visit to confirm top soil	1	1
10.7	Site services	Documentation review PLUS 1 visit to review installation including labeling and accessibility of valves and other related fixtures	1	1

ITEM	RISK AREAS	REQUIREMENT FOR TOTAL PROPOSED NUMBER OF VISITS	NOTIONAL	BUILDING
11	ACOUSTICS Review by Qualified Consultant		TOWN HOUSE (no parkade)	TOWN HOUSE (over parkade)
11.1	Sound transmission – Suite to Suite	Documentation Review PLUS Schedule of partitions/suites/units to be subject to field testing and certification by qualified acoustical consultant (except where the space or area is not amenable to recognized testing procedure).	1	1
11.2	Sound transmission – Suite to Interior common areas including elevator shafts, service areas (chutes, shafts and spaces) and amenity areas			
11.3	Sound transmission – Elevator equipment	Documentation Review PLUS Number of visits required to confirm permit and Design Certificate conformance	1	1
11.4	Mechanical sound/vibration transmission	Documentation Review PLUS Number of visits required to confirm permit and Design Certificate conformance	1	1
11.5	Emergency electrical power, noise rating of transformers	Documentation Review PLUS Number of visits required to confirm permit and Design Certificate conformance	1	1

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Module 4

Field Review Consultant Reporting Requirements

This Module contains information about 60-day and Milestone Reports. Information about other reporting requirements and a full set of report templates are in sub-Modules 4A through 4D. Using standardized report templates establishes consistency in the quality and content of the reports.

Where there is more than one tower or building under a single Tarion enrolment, the FRC shall prepare separate 60-day and Milestone Reports for each tower or building. All Milestone reports for all towers and buildings shall be included in the Final Report for the enrolled project.

60-DAY REPORTS (MODULE 4B)

60-day reports provide Tarion with brief information about the progress of a project. They provide FRCs with an early opportunity to bring any project deficiencies to the attention of Tarion if it is felt necessary to do so.

MILESTONE REPORTS

Milestone Reports provide Tarion with detailed information about the progress of a project. They indicate Risk Areas are being monitored and that deficiencies are being appropriately dealt with. A report indicating no deficiencies may give rise to concern that the B19 review is not being adequately completed.

Builders and FRCs often work together to rectify outstanding issues without the need to resort to formal reporting procedures. Outstanding issues/deficiencies will remain matters for practical resolution by agreement between the FRC and builder until they cannot be, or have not been, rectified and a Milestone Report is due. Every effort should be made to rectify deficiencies reported in one Milestone Report before the next Milestone Report due date.

For an explanation of deficiencies as they relate to Bulletin 19R and when they become reportable, see the explanation entitled "What a 'Deficiency' is and When to Report One" appended to the end of this module.

WHEN TO SUBMIT A MILESTONE REPORT

Milestone Reports become due at the stages of construction specified below. Tarion's Common Elements Group must receive the reports no later than 30 days after the specified Milestone is reached. Milestone Reports are due at:

1. Sub-structure complete including completion of the at-grade slab over the underground parking (if applicable)
2. Super structure complete
3. Building envelope 75% complete including completion of cladding and roofing
4. Building substantially watertight

Where the event based Milestone trigger points fail to provide a sufficient flow of information, Tarion reserves the right to request time based Milestone Reports. An example of where such a request might be made is

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where long construction delays lead to a marked extension of the construction schedule. In determining when it is appropriate to request a time-based Milestone Report, Tarion will consider each case on its merits. Tarion will review the Milestone Report within 30 days of receipt and notify the FRC and builder of anything that requires further discussion or investigation.

Tarion recommends that the builder and/or FRC submit a copy of the construction schedule and its updates (as available) with each Milestone Report, providing Tarion with an overview of the duration of construction and required reporting documents.

Nothing in the Milestone Reporting mechanism is intended to replace the FRC's internal project tracking systems. Tarion will continue to expect full access to these records when necessary.

HOW TO SUBMIT A MILESTONE REPORT

The Milestone Report is a two-part report:

- The Deficiency Tracking Summary gives summary information about new deficiencies that are in existence at the time the Milestone Report is due.
- The Narrative provides additional space to enter information relating to any issue already referenced on the Tracking Summary

Copies of the templates follow.

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Module 4 - Appendix

What a 'Deficiency' is and When to Report One

OUTLINE

This guideline provides an objective method to help FRCs and builders decide when an outstanding construction issue becomes reportable as a deficiency by using trigger points that convert outstanding issues or defects into 'reportable deficiencies'. This removes subjectivity when deciding whether to 'report' or 'not to report' deficiencies. Reporting of deficiencies will be done at the Milestone Report stages.

STANDARDIZING TERMINOLOGY

The generally accepted term in the construction industry for quality and conformance problems is 'deficiency'. Use of the term appears to have been avoided in dealings with Tarion because of the perceived potential for creating delays in the release of security. The trigger points address these concerns and should remove the understandable reluctance of builders to have day-to-day construction problems called deficiencies.

Tarion encourages the use of standardized language to remove potential for confusion between agencies concerned with monitoring of identified risk areas. However, Tarion respects the right of FRC firms to use whatever terms they wish when recording construction problems for internal tracking purposes.

WHAT IS A DEFICIENCY?

For the purposes of Bulletin 19R, a deficiency can exist in functional performance or in physical characteristics; it can arise from design, faulty manufacture, assembly or installation. A deficiency may be established by

- physical evidence
- proof of a functional failure of a product while in use
- in the professional opinion of an FRC, the likely functional failure of a product at some future date
- any matter which exposes Tarion to a potential claim under the warranty provisions of the *Ontario New Home Warranties Plan Act*

TRIGGER POINTS

All deficiencies/outstanding issues/defects (see 'Standardizing Terminology' above) become 'reportable' in any of the following circumstances:

1. When a Milestone Report comes due
2. When the Final Report comes due
3. When one or more of the project consultants reports something they describe as a deficiency

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4. When an FRC has reason to believe that a contractor responsible for completion of a given task has permanently left the site and work on that task remains to be done
5. When a contractor claims completion of a task but, in the opinion of the FRC, that task is not satisfactorily completed
6. When a change to, or the intent to change, the approved construction documents (including supplementary documents e.g. site instructions, change notices, etc.), by the Design Consultant is noted and the change has not been properly approved
7. When a contractor accepts work done on a substrate by another contractor and that contractor knew, or ought reasonably to have known, that the quality of the substrate work could adversely affect the performance of his or her own work.
8. Any other event or issue that, in the opinion of the FRC, is included in the description of the term 'deficiency' and should be reported because of the potential exposure of Tarion to a warranty claim with respect to the identified Risk Areas.

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Module 4 – Appendix Design Review

TIMING

Not less than 30 days prior to the commencement of construction of the condominium project the builder must deliver copies of each of the Design Certificates to Tarion. Design Certificates may be provided on a phased basis but the builder must submit each to Tarion at least 30 days prior to the commencement of the work covered by that portion of the design.

Construction is considered to have started when the excavation begins.

Design Certificates confirm that the consultant responsible for that portion of the design of the condominium project has reviewed the design of those elements of the construction for which they are responsible. Design Certificates must identify the related Risk Areas in the Scope of Work.

Unlike the FRC, the Design Consultants are not required to provide periodic reports to Tarion. However, the FRC requires ongoing assistance from them during the design and construction to maintain a clear understanding and interpretation of the design documents. Builders who recognize the importance of managing warranty claim risk will encourage a cooperative relationship between the Design Consultants and the FRC.

This Bulletin is not intended to replace or offset the requirements of Part 2 of the Ontario Building Code which sets out specific requirements for design general review by architects and professional engineers. The provisions of this Bulletin are in addition to those requirements. Architects and engineers remain obligated to fulfill their obligations to municipal building departments under the Ontario Building Code.

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Module 4A – Appendix Design Certificate

Each Design Consultant listed in the Scope of Work must complete a Design Certificate for the Risk Areas that relate to the design documents they prepared or reviewed. Builders must submit these Design Certificates to Tarion not less than 30 days prior to the commencement of construction of the part(s) of the project that relate to the Risk Areas initialed below. Each Design Certificate must be accompanied by:

- A copy of the Design Consultant’s Certificate of Authorization or Practice as applicable, and
- Proof of current professional liability insurance in accordance with the requirements their professional association.

Name of Project: _____

Enrolment No.: _____

Project Address: _____

Vendor/Builder Name: _____

Vendor/Builder Registration No.: _____

RISK AREAS

Each Design Consultant shall initial the Risk Areas related to the design documents that they have designed or reviewed and that are the subject of this declaration. Draw a line through Risk Areas that are the responsibility of others.

ITEM	RISK AREAS	INITIAL	ITEM	RISK AREAS	INITIAL
1	BELOW GRADE/FOUNDATIONS		3.2.5	Insulated Concrete Forms (ICF)	
1.1	Foundation bearing		3.2.6	Window wall	
1.2	Substructure		3.2.7	Load bearing masonry	
1.3	Drainage systems		3.2.8	Curtain wall	
1.4	Damp proofing or waterproofing		3.2.9	Other cladding systems	
1.5	Insulation		3.3	Concealed protections	
1.6	Elevator Sump Pits		3.3.1	External sealants	
2	STRUCTURE		3.3.2	Soffits	
2.1	Slabs; decks; beams; columns; walls		3.3.3	Architectural coatings; finishes; paint	
2.2	Expansion joints		3.4	Windows; glazing and exterior doors	
2.3	Slab protection systems		3.5	Thermal insulation	
2.4	Balcony protection systems		3.6	Air barrier; vapour retarder	
2.4.1	Balcony guards		4	ROOFING	
2.5	Wood/steel framing		4.1	Membrane; shingles or sloped metal	
3	EXTERIOR CLOSURE		4.2	Insulation; ballast	
3.1	Back-up wall; substrate		4.3	Vapour retarder; air barrier; ventilation	
3.2	Masonry veneer		4.4	Drainage	
3.2.1	Precast concrete		4.5	Snow and ice control	
3.2.2	Cast-in-place concrete		4.6	Safety tie-back anchors for building maintenance	
3.2.3	Siding (non-decorative)		4.7	Green Roof Intensive, extensive	
3.2.4	Exterior Insulated Finish System (EIFS)				

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5	FIRE SAFETY SYSTEMS		9	ELECTRICAL	
5.1	Containment		9.1	Distribution systems	
5.2	Egress		9.2	Lighting	
5.3	Suppression		9.3	Emergency power (see also 8.6)	
5.4	Detection and alarm		9.4	Intercom and security systems	
6	INTERIOR FINISH, COMMON AREAS		9.5	Fire stopping	
6.1	Corridors and stairwells		10	SITE WORK	
6.2	Party/common rooms		10.1	Pavements; curbs	
6.3	Sauna, whirlpool, fitness amenities		10.2	Retaining walls	
6.4	Swimming pool		10.3	Landscape structures (gazebos, decks)	
7	CONVEYING SYSTEMS (ELEVATORS)		10.4	Fences	
7.1	Finishes		10.5	Irrigation systems	
8	MECHANICAL		10.6	Sod, trees and shrubs	
8.1	Heating; ventilation; air conditioning		10.7	Site services (as applicable)	
8.2	Plumbing – supply		11	ACOUSTICAL REVIEW by Qualified Consultant	
8.3	Plumbing – drainage		11.1	Sound transmission – Suite to suite	
8.4	Waste disposal		11.2	Sound transmission – Interior common areas (including elevator shafts and all service spaces)	
8.5	Fire stopping		11.3	Sound transmission – Elevator equipment	
8.6	Emergency power (see also 9.3)		11.4	Mechanical sound/vibration transmission	
			11.5	Emergency electrical power, noise rating of transformers	

DECLARATION

I, _____, the undersigned, being authorized in the Province of Ontario to provide professional services by virtue of

- a Certificate of Authorization (as issued by the Professional Engineers of Ontario),
- a Certificate of Practice (as issued by the Ontario Association of Architects), or
- a Certificate of Practice (as issued by the Ontario Association of Landscape Architects)

hereby declare that I have read and understand the requirements under Builder Bulletin 19R for design review and certification for this condominium project.

I confirm that I have initialed the Risk Areas above that relate to the design documents I provided or reviewed while engaged to provide professional services to the above referenced Vendor/Builder in connection with the above referenced condominium project.

Specifically, I am responsible for the production, or review, of all relevant construction documents included in my scope of services for the above noted condominium project. I shall provide copies of all applicable and significant change orders, reports and inspections to the FRC.

I further declare that to the best of my knowledge and information that my portion of the design/review complies with the Ontario Building Code and good design practice and in my view contains reasonable and sufficient detail to enable work to be completed in keeping with the general intent of the design. This declaration is being provided with respect to the specific scope of services in my retainer.

PRINT NAME OF DESIGN FIRM

ADDRESS CITY POSTAL CODE

PHONE EMAIL

PRINT NAME OF PERSON AUTHORIZED TO BIND FIRM SIGNATURE OF PERSON AUTHORIZED TO BIND FIRM

POSITION DATE

PRINT NAME OF VENDOR/BUILDER REPRESENTATIVE VENDOR/BUILDER REPRESENTATIVE'S SIGNATURE

VENDOR/BUILDER COMPANY DATE

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Module 4B 60-day Report

60-day Report No:

For the period from _____ to _____
MM/DD/YY MM/DD/YY

60-day Reports are numbered from the start of construction and are due no later than 14 days after each successive 60-day period ends. Vendor/Builders must submit these reports to Tarion's Condominium Group. A 60-day Report will not be required where a Milestone Report becomes due during any 60-day period.

Project Address: _____

Common Element Enrolment No.: _____

Vendor/Builder Registration No.: _____

FRC Name and BQS Certificate No.: _____

Risk Area	Reviewed Y / N	Deficiency to be followed <small>(indicate either 'not applicable', 'no deficiency', or briefly describe the deficiency; do not leave blank spaces)</small>	Approx % Complete
Below grade, Foundations			
Structure			
Exterior Closure			
Roofing			
Fire safety systems			
Interior finishes, Common areas			
Conveying Systems (Elevators)			
Mechanical			

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Electrical			
ACOUSTICS Review by Qualified Consultant			
Site work			

ADDITIONAL COMMENTS:

FRCs shall provide information as part of Tarion's ongoing quality assurance program under Builder Bulletin 19R. Deficiencies must be noted in the third column of the above table with brief details here under Additional Comments. Any items that remain outstanding when a Milestone Report becomes due must be included in that report.

Where activity in a Risk Area is evidently falling behind schedule the extent of the delay and its likely impact on the project (e.g. delaying of Milestone Reports, extending of the construction schedule, etc.) must be also be noted here under Additional Comments.

PRINT NAME OF PERSON AUTHOURIZED TO BIND FIRM _____

SIGNATURE OF PERSON AUTHOURIZED TO BIND FIRM _____

POSITION _____

DATE _____

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Module 4C Milestone Report – Deficiency Summary

Milestone Report No: M

Project Address: _____

Common Element Enrolment No.: _____

Vendor/Builder Registration No.: _____

FRC Name and BQS Certificate No.: _____

List all Deficiencies that were outstanding when this Milestone Report came due. Further details about the nature of the deficiency and the warranty claim risk, and what is being done to resolve it, must be included in the attached Narrative. In subsequent Milestone Reports, update the Narrative describing if the situation is resolved or why it isn't resolved. Refer to any consultant reports that pertain to the deficiency or its resolution.

Milestone Ref. No. <small>(e.g. M1/01)</small>	Risk Area Reference <small>(e.g. 3.2.5.)</small>	Brief description of the Deficiency	Has the Deficiency been resolved? <small>(Y/N)</small>	Warranty claim risk <small>(Low, Med or High)</small>	Is there a plan to resolve? <small>(Y/N)</small>

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**Module 4C
Milestone Report – Narrative**

Milestone Report No:

M

Attach this Narrative to the Deficiency Summary and provide details about the Deficiencies listed in the Deficiency Summary.

Milestone Ref No.:	Risk Area:
Narrative: (continue into next box if necessary)	
Milestone reference No.:	Risk Area:
Narrative: (continue into next box if necessary)	
Name of Person completing this Report:	

PRINT NAME OF PERSON AUTHOURIZED TO BIND FIRM _____

SIGNATURE OF PERSON AUTHOURIZED TO BIND FIRM _____

POSITION _____

DATE _____

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Builder Bulletin 19R - Module 4D The Final Report

EFFECT OF SUBMISSION

Submission of the Final Report is notice to Tarion that the project has been properly completed except for minor, outstanding deficiencies. FRCs must inform Tarion when the Final Report has been submitted to the builder using the Notice of Completion form.

Where there is more than one tower or building under a single Tarion enrolment, the FRC shall prepare separate 60-day and Milestone Reports for each tower or building. All Milestone Reports for all towers and buildings shall be included in the Final Report for the enrolled project.

The Final Report follows the submission of all required 60-day and other Milestone Reports. The builder must submit it to Tarion at the completion of the project but not later than 90 days from the date of registration of the Declaration and Description. The Bulletin 19R Final Report forms part of the consideration for release of security.

CONTENT

The Final Report must be a bound copy of the following documents:

- All Milestone Reports associated with the project
- The Condominium Declaration as filed with the Land Titles Office
- All Design Certificates
- Field Review Declaration
- It will also include the following documents as applicable
 - Project Architect final clearance
 - Geotechnical Consultant final clearance
 - Structural Consultant final clearance
 - Mechanical Consultant final clearance
 - Electrical Consultant final clearance
 - Interior Design Consultant final clearance
 - Acoustical Consultant final clearance
 - Site Work Consultant final clearance
 - Landscape Architect final clearance
 - Occupancy permits

Note: As built drawings, specifications, equipment operating manuals, and extended warranty certificates as well as balcony guard load test, window test reports and Technical Standards and Safety Authority (TSSA) approvals are to be submitted directly to the elected condominium corporation board, not Tarion.

Even if the Final Report is not available in its entirety, copies of all available documents shall be supplied to the elected board and to Tarion at the specified times. The board must confirm with a signature that it received the documents. The FRC must also provide a written explanation to Tarion describing why the report is incomplete.

REPORT REVIEW

Tarion will review the Bulletin 19R Final Report within 30 days of receipt and then notify the builder of any further technical requirements or adjustments to the required security, depending on the extent of any outstanding defects or deficiencies, and any outstanding administrative or non-technical matters. Subject to the requirements set out in Builder Bulletin 28, any release of security will be completed within 45 days of receipt and acceptance of all of the required documentation.

The FRC will assess the likely costs of rectifying outstanding matters based on current sub-trade prices for such rectification and provide them to Tarion. Tarion will then review the costs provided and retain an appropriate amount of the security pursuant to Builder Bulletin 28.

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Module 4D Field Review Declaration

The Field Review Declaration is part of the Bulletin 19R Final Report and the Vendor/Builder must submit it to Tarion.

Project Address: _____

Common Element Enrolment No.: _____

Vendor/Builder Registration No.: _____

FRC Name and BQS Certificate No.: _____

Report references are from the Milestone Reports followed by the item number in the Milestone Report e.g. if the deficiency is noted in the second Milestone Report (M2) and the item number is 25 the reference would be M2/25. Draw a line through any Risk Areas that are not applicable.

ITEM	RISK AREAS	DEFICIENCY OUTSTANDING? Y/N	IF OUTSTANDING, MILESTONE REPORT REFERENCE	COST TO CORRECT	INITIAL IF CLEAR
1	BELOW GRADE/ FOUNDATIONS				
1.1	Foundation bearing				
1.2	Substructure				
1.3	Drainage systems				
1.4	Damp proofing or waterproofing				
1.5	Insulation				
1.6	Elevator sump pits				
2	STRUCTURE				
2.1	Slabs; decks; beams; columns; walls				
2.2	Expansion joints				
2.3	Slab protection systems				
2.4	Balcony protection systems				
2.4.1	Balcony guards (also Table at end)				
2.5	Wood/steel framing				
3	EXTERIOR CLOSURE				
3.1	Back-up wall; substrate				
3.2	Masonry veneer				

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3.2.1	Precast concrete				
3.2.2	Cast-in-place concrete				
3.2.3	Siding (non-decorative)				
3.2.4	Exterior Insulated Finish System (EIFS)				
3.2.5	Insulated Concrete Forms (ICF)				
3.2.6	Window wall				
3.2.7	Load bearing masonry				
3.2.8	Curtain wall				
3.2.9	Other cladding systems				
3.3	Concealed protections				
3.3.1	External sealants				
3.3.2	Soffits				
3.3.3	Architectural coatings; finishes; paint				
3.4	Windows, glazing and exterior doors				
3.5	Thermal insulation				
3.6	Air barrier; vapour retarder				
4	ROOFING				
4.1	Membrane; shingles or sloped metal				
4.2	Insulation; ballast				
4.3	Vapour retarder; air barrier; ventilation				
4.4	Drainage				
4.5	Snow and ice control				
4.6	Safety tie-back anchors for building maintenance				
4.7	Green Roof intensive/extensive				
5	FIRE SAFETY SYSTEMS				
5.1	Containment				
5.2	Egress				
5.3	Suppression				
5.4	Detection and alarm				
6	INTERIOR FINISHES, COMMON AREAS				
6.1	Corridors and stairwells				
6.2	Party/common rooms				
6.3	Sauna/whirlpool/fitness				

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6.4	Swimming pool				
7	CONVEYING SYSTEMS (ELEVATORS)				
7.1	Finishes				
8	MECHANICAL				
8.1	Heating; ventilation; air conditioning				
8.2	Plumbing supply				
8.3	Plumbing drainage				
8.4	Waste disposal				
8.5	Fire stopping				
8.6	Emergency power				
9	ELECTRICAL				
9.1	Distribution systems				
9.2	Lighting				
9.3	Emergency power				
9.4	Intercom and security systems				
9.5	Fire stopping				
10	SITE WORK				
10.1	Pavements; curbs				
10.2	Retaining walls				
10.3	Landscape structures (gazebos, decks)				
10.4	Fences				
10.5	Irrigation systems				
10.6	Sod, trees and shrubs				
10.7	Site services (if applicable)				
11	ACOUSTICS				
11.1	Sound transmission – Suite to Suite				
11.2	Sound transmission – Suite to Interior common areas				
11.3	Sound transmission – Elevator equipment				
11.4	Mechanical sound/vibration transmission				
11.5	Emergency electrical power, noise rating of transformers				
TOTAL ESTIMATED CORRECTION/COMPLETION COSTS				\$	

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

Exterior Guard Systems containing Glass (effective April 17, 2014)

Where Vendor/Builders install exterior guard systems containing glass the FRC must complete the following table for each guard type (note that this does not apply to glass guards located inside dwelling units).

Guard Characteristics		
Installation	Glass Panel Type	Support
Glass located more than 150mm inward from the edge of a floor	<input type="checkbox"/> Tempered not more than 6mm thick <input type="checkbox"/> Tempered, Heat Soaked <input type="checkbox"/> Laminated	<input type="checkbox"/> All edges supported <input type="checkbox"/> Top and bottom edges supported <input type="checkbox"/> Top and side edges supported <input type="checkbox"/> Side and bottom edges supported <input type="checkbox"/> Side edges supported <input type="checkbox"/> Designed so that laminated glass is retained in frames in the event of breakage
Glass located more than 50mm and less than 150mm inward from the edge of a floor	<input type="checkbox"/> Tempered, Heat Soaked <input type="checkbox"/> Heat Strengthened, Laminated	
Glass located beyond the edge of a floor or within 50mm of the edge	<input type="checkbox"/> Heat Strengthened, Laminated	

Manufacturer/Installer Information	
Guard Manufacturer's Name:	
Manufacturer Certification:	<input type="checkbox"/> Glass panel <u>manufacturer</u> certified in accordance with (specify standard and certification number): <input type="checkbox"/> Glass panel <u>treatment</u> certified in accordance with (specify standard and certification number):
P.Eng. Name: (shop drawings)	
Shop Drawings:	<input type="checkbox"/> Stamped Drawings (P.Eng. stamp and signature) <input type="checkbox"/> All design loads considered (reference/specify): <input type="checkbox"/> Design wind loads considered (reference/specify): <input type="checkbox"/> Design live loads considered (reference/specify): <input type="checkbox"/> Material Standards (reference for glass and railing material):
Installer's Name:	

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Field Review Consultant – Comments

Please note any information/characteristics not addressed above.

DECLARATION

I, _____, the undersigned, being authorized in the Province of Ontario to provide professional services by virtue of a Certificate of Authorization (as issued by the Professional Engineers of Ontario) or a Certificate of Practice (as issued by the Ontario Association of Architects) hereby declare I have read and understand the requirements of Builder Bulletin 19R and, with reference to the identified risk areas contained in the approved Scope of Work proposal for this project, that I have performed documentation and field reviews as required by Builder Bulletin 19R and the Scope of Work Proposal dated _____.

I declare that I have sent the required reports to both the Vendor/Builder and Tarion Warranty Corporation. To the best of my knowledge the condominium project has been constructed in a workmanlike manner, in general conformity with all design and construction documents for this project, and the relevant sections of the Ontario Building Code and good construction practice.

I declare that I shall conduct a follow up review to determine any/all outstanding issues identified in the Final Report have been completed and accepted by the applicable consultant.

I am in a position to bind this firm.

PRINT NAME OF PERSON AUTHOURIZED TO BIND FRC FIRM

SIGNATURE OF PERSON AUTHOURIZED TO BIND FRC FIRM

POSITION

DATE

PHONE

EMAIL

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.

B19R Final Report Notice of Completion

Tarion Warranty Corporation
Condominium Group
5160 Yonge Street, 12th Floor
TORONTO ON M2N 6L9

Project Address: _____

Common Element Enrolment No.: _____

Vendor/Builder Registration No.: _____

FRC Name and BQS Certificate
No.: _____

This letter informs Tarion Warranty Corporation that I completed the Final Report for the above project according to requirements of Builder Bulletin 19R and delivered it to the Vendor/Builder on

_____.

PRINT NAME OF PERSON AUTHOURIZED TO BIND FRC FIRM

SIGNATURE OF PERSON AUTHOURIZED TO BIND FRC FIRM

POSITION

DATE

PHONE

EMAIL

Effective: January 1, 2017, for all projects with a construction start date of January 1, 2017 or later. Construction is considered to have started when the excavation begins.