

**From:** [Henk de Haan](#)  
**To:** [Joan Yu](#)  
**Subject:** Re: Consultation specifically on ambient sound level and A2 adjustments (blackline Section 2.6)  
**Date:** Sunday, September 24, 2023 11:40:41 AM

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Hello Ms. Yu,

In response to the AUC's request for additional comments for the review of Rule 12 we submit the following, in addition to the comments we submitted earlier:

1. First and foremost, we would like to have witnessed a science-based wholistic approach, based on research conducted by the AUC, leading to a review and consistent changes throughout Rule 12, instead of the piecemeal approach now followed, off-loading the effort and associated cost of Rule 12 reviews to the Albertan acoustical community. We are a for-profit organization, and derive our income from acoustical consulting. While we welcome the chance to comment on proposed changes, we regret the lack of context, motivation and research presented with the proposed changes. dBA Noise Consultants Ltd. would like to receive a reply from the Commission to this.
2. The request lacks context, references to background material etc. It is therefore not clear what the problem is that the AUC is trying to fix. What is the purpose of this review?
  1. The purpose of the Rule is (or should be) to protect Albertan's health from undue noise, considering that noise is a health issue according to Health Canada. Considering that Rule 12 saw its origins in Directive 038, we encourage the commission to include section 1.4 of Directive 038 into section 1.2 of the Rule, and specifically include the reference to health.
  2. The above leads to a target for maximum allowable noise, the permissible sound level PSL. Typically, if the PSL is met, the Commission considers that the noise from a facility has been reasonable restricted to protect Albertans from undue noise. Important is that the PSL is a cumulative value, that requires the combined effects of the existing ambient sound levels, cumulated with existing noise from energy-related facilities and the proposed facilities to not exceed the PSL. The PSL is specifically based on the existing ambient sound levels. Therefore, the existing ambient sound level is important, as the following examples will illustrate:
    1. Assuming an ambient sound level of 35 dBA, a new facility causing noise levels of 38.3 dBA will result in noise impact of 40 dBA, just compliant with a PSL of 40 dBA. The 3 dB increase in broadband sound levels is not expected to be clearly audible;
    2. If the ambient sound level however is 38 dBA, the same facility would cause a noise impact of 41 dBA, resulting in non-compliance;
    3. If the ambient sound level is lower, e.g. 30 dBA, 5 dB lower than the assumed ambient sound level of 35 dBA, the Rule 12 system would lead to a PSL of 35 dBA and not 40 dBA. The applicant would have to reduce noise levels from the proposed facility to 33 dBA. Again the 3 dB increase in broadband sound levels is

not expected to be clearly audible.

4. In the same case, assuming an ambient sound level however of 30 dBA, and facility noise of 38 dBA would lead to a noise impact of 39 dBA, an increase with 9 dB and experienced by the external stakeholders as approximately twice as loud and completely dominating the soundscape. The facility however would be compliant with a theoretical PSL of 40 dBA, so the residents would be left without an avenue to restore noise levels to reasonable values. They would be denied the level of health protection that the Rule intends to offer.
3. To protect the health of Albertans and strike a balance between the interests of external stakeholders and proponents (whose interests may not align with those of stakeholders), the AUC follows a balanced approach, as witnessed in the procedure and the use of topical experts in hearings.
4. The now proposed changes, by and large abandon the principles outlined above, tilts the playing field towards proponents and are therefore not in line with the AUC's mission to protect the health of Albertans and follow a balanced approach in assessing the noise impacts from proposed facilities. Specifically:
  1. Section 2.6.1 is unnecessary and should be scrapped; the ambient sound level is already defined in the glossary to the rule.
  2. It is with regret that we see you proposing to scrap the required motivation of the use of the assumed ambient sound level (section 2.6, under 2). As we have often argued, the assumed value of 35 dBA is typically not representative, no studies have been conducted or are available to back up this decades-old assumption, nor has the Commission voiced any intention to conduct such a study. We assume that over the years many ambient sound level surveys have been submitted to the Commission. The Commission is therefore in a unique position to assess the unvalidated assumption of an ambient sound level of 35 dBA in rural Alberta by analyzing those studies;
  3. Assuming that an urban, sub-urban or industrial area PSL (as we have proposed) will not be defined in Rule 12, section 2.6.3 under c now opens up the possibility for proponents of facilities in populated or commercial areas to conduct an ambient sound level survey and apply for an A2 adjustment. In practice, it will force many of them to do so. While we applaud this possibility when dwellings are present and potentially affected by noise from a proposed facility, we do regret that, in the absence of dwellings, facilities would still be required to show compliance with a rural PSL;
  4. This section (2.6.3. under c) creates an imbalance between proponents in a rural area who are not required to conduct an ambient sound level survey, and proponents of infrastructure in (sub) urban settings (e.g. substations) who in practice will have to conduct an ASL survey.
  5. We strongly oppose section 2.6.4. It should be scrapped for the following reasons:
    1. Where the A2 adjustment can be both positive and negative, this leaves the impression that a downward adjustment is unwanted by the AUC. We recognize that a downward adjustment will typically not be pursued by proponents but most likely by external stakeholders, but Rule 12 should maintain a balanced approach between the interests of external stakeholders and facilities;
    2. The requirement to ask for permission from the AUC to pursue a downward A2 adjustment does not include any criteria and may therefore lead to arbitrary and random decisions. What would a decision be based upon? It also interferes with a fair process of recourse of external stakeholders if

they are not allowed to pursue a point of view that is important to them and which gets judged outside of the legal framework. Would such a separate decision be open for a separate hearing? If not, this would prevent external stakeholders from recourse within the normal AUC process. If it is open to a separate hearing, it adds significantly to the regulatory burden.

3. It will add to the regulatory burden for stakeholders, for the AUC and for proponents;
  4. The AUC does not conduct field surveys, does not conduct sound measurements, does not own or operate sound measuring instrumentation, nor retains external parties to conduct ambient sound levels surveys. The AUC is therefore not equipped to assess if a downward adjustment is justified. Only a site visit, combined with an ambient sound level survey will reveal the actual ambient sound levels.
  5. We recognize that, if the Commission wants to keep the AUC PSL coordinated with AER PSL, in cases where the actual soundscape is dominated by AER regulated facilities, a downward adjustment of the PSL may be unwarranted. We suggest to limit those cases to where the noise effects from AER regulated facilities are e.g. 34 dBA or more.
  6. We suggest to publish a separate technical document, spelling out the technical requirements for an ambient sound level survey. A well-researched and technically coherent document would help prevent discussions
6. Under 2.6.5, (a) Please change the section between brackets to include “noisy or” before “quiet”;
  7. Please restore now scrapped last two paragraphs original 2.6.5 and 2.6.6.
  8. Where the word “applicant” is used in relation to ambient sound level surveys, please replace with “stakeholder” to make clear that ambient sound level surveys may also be pursued by stakeholders.

We would like to point out that a typical ASL survey would be in the realm of (very roughly) \$10,000 to \$20,000 - very small beer indeed when compared to the investments made in typical projects before the AUC. Frequently, external stakeholders would like to see an ambient sound level survey as part of an application. It would go a long way to alleviate noise concerns.

We would like the point the AUC to the expectation of greater peace and quiet in quiet rural areas as documented in Health Canada documents, as well as standards, as well as the greater annoyance in newly created situations, as documented in standard ANSI S12.9-2005, part 4 (and the latest version). We would also like to point out that the changes the AUC now proposed are not consistent with the Alberta government ordered review of renewable applications for both the use of agricultural lands and their views scapes. A pursuit of actual ambient sound levels in applications and PSLs derived from that would be consistent with that review.

We also feel that a joint database with PSL’s determined in the past by AUC and AER combined would be very helpful, as would access to accepted NIAs to help assess 3rd party noise contributions at dwellings. A useful interface could be map-based, such as a GIS system. An example would be the One-stop AER system.

Noise Assessment Summary form, as referenced in section 3.1, under 5. The use of such a form should be restricted to situations where noise mitigation is not included in the assessment, and there is sufficient margin (at least 3 dB) between the noise impact and the PSL. Another reason could be if external stakeholders demand access to a full NIA report, meeting the requirements in Rule 12. They should be entitled to that.

Our latest contribution to the current review process of Rule 12 was submitted by my colleague Ms. Virgini Senden. She did not receive an invite to this round of the current review process. Why was that?

The single meeting to discuss potential changes with stakeholders was conducted on July 21, during holiday season. This prevented us from participation in that meeting. May we suggest future meetings to be held on multiple days, outside the holiday season and multiple locations?

Sincerely,

Henk de Haan

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On Sep 12, 2023, at 16:46, Joan Yu <[Joan.Yu@auc.ab.ca](mailto:Joan.Yu@auc.ab.ca)> wrote:

Hello,

The Commission has decided to conduct a consultation process specifically with stakeholders who commented on ambient sound level and A2 adjustments during the current Rule 012 revision project.

After considering comments you submitted on ambient sound level and A2 adjustments during the written consultation process and during the technical meeting, the Commission proposes to revise Section 2.6 of Rule 012. A blackline version of the revised Section 2.6 is attached in this email.

If you have comments on the proposed changes to Section 2.6, please email them to Joan Yu at [joan.yu@auc.ab.ca](mailto:joan.yu@auc.ab.ca) by **September 26, 2023**. The Commission requests your comments/edits be focused exclusively on the proposed changes to Section 2.6.

Thank you and best regards.

Joan

**Joan Yu, P.Eng.**

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