

EXECUTIVE SUMMARY

HGC Engineering was retained by Union Gas Limited to update the Acoustic Assessment Report (“AAR”) for the Oil Springs East Pool Station in Enniskillen Township, Ontario. Previously, HGC Engineering prepared an AAR in 2008 [1]. This updated AAR addresses the replacement of the radiators/gas aftercoolers associated with each of the two reciprocating compressor engines on the site and has been prepared to satisfy condition 5.2 of Environmental Compliance Approval 2592-AQPSJ2, dated September 20, 2017, granted to Union Gas by the Ontario Ministry of the Environment, Conservation and Parks (“MECP”).

Sound level measurements of existing sources were conducted at the facility on June 20, 2007. Sound emissions from the replacement radiators/gas aftercoolers were based on manufacturer’s specifications. The source sound levels were used as input to a computational acoustical model to quantify the environmental sound emissions associated with the facility. Acoustic assessment criteria were established in accordance with the sound level limits in MECP guideline NPC-300.

The updated analysis indicates that the sound emissions of the Oil Springs East Pool Station remain within the sound level limits set out in MECP publication NPC-300. Given the absence of any sources of ground-borne vibration at the site, the facility also complies with the applicable vibration limits of MECP publication NPC-207.

Table A3: Acoustic Assessment Summary Table

Point of Reception	Point of Reception Description	Sound Level at Point of Reception, L_{EQ} [dBA]	Verified by Acoustic Audit	Performance Limit, L_{EQ} [dBA]	Compliance with Performance Limit	Acoustical Classification Area
R1	Single-storey home approx. 650 metres southwest of Station	37	No	40	Yes	Class 3
R1a	Outdoor amenity space of R1	38	No	40	Yes	Class 3



ACOUSTICS



NOISE



VIBRATION