Enclosure 2 – Federal Authority Advice Record – Designation Request under the IAA – Baldwin East Aerodrome Project

Response due by March 8, 2023

Department/Agency	Environment and Climate Change Canada		
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1. Has your department or agency considered whether it has an interest in the Project; exercised a power or performed a duty or function under any Act of Parliament in relation to the Project; or taken any course of action (including provision of financial assistance) that would allow the Project to proceed in whole or in part? Specify as appropriate.

ECCC has not exercised a power or performed a duty or function under any Act of Parliament in relation to the proposed Baldwin East Aerodrome Project (the Project), nor has ECCC taken any course of action that would allow the Project to proceed in whole or in part.

2. Is it probable that your department or agency may be required to exercise a power or perform a duty or function related to the Project to enable it to proceed?

If yes, please specify that power, duty or function and its legislative source.

Depending on the results of future baseline studies, there is the potential that ECCC will be required to exercise a power or perform a duty or function related to the Project to enable it to proceed (e.g., permit pursuant to the *Species at Risk Act*).

3. If your department or agency will exercise a power or perform a duty or function (including financial assistance) under any Act of Parliament in relation to the Project, will it involve public and Indigenous consultation?

If yes, please specify when and how public and Indigenous consultation would be undertaken.

If a permit from ECCC is required, Indigenous consultation would be undertaken prior to issuing a permit.

4. Is your department or agency in possession of specialist or expert information or knowledge that may be relevant to any potential adverse effects in area of federal





jurisdiction, including direct or incidental effects, stemming from the Project, as defined in the section 2 of the IAA?

Specify as appropriate.

ECCC has specialist or expert information in the areas listed below, notably with regard to establishing an adequate baseline, assessing potential effects to biophysical valued components within federal jurisdiction, effectiveness of mitigation measures, methods for monitoring and follow up, as well as information regarding federal policies, standards, and regulations that may be relevant to the assessment.

Air Quality: ambient air quality; sources of emissions; emissions estimation and measurement; atmospheric transport dispersion modelling; mitigation measures and follow-up monitoring.

Greenhouse gas (GHG) emissions and climate change: estimations of GHG emissions (net and upstream); impact on carbon sinks; GHG mitigation measures and determination of Best Available Technologies/Best Environmental practices (BAT/BEP); credible plan to achieve net-zero emissions by 2050; climate change science to inform evaluation of potential changes to the environment and project resilience to effects of climate change; climate change policies; and national GHG projections.

Water quality and quantity: surface water quality; contamination sources for surface water; water quality predictions and modelling; management of contaminated soils or sediments; hydrology; geochemistry; follow-up and monitoring.

Wildlife, Species at risk, and habitat: migratory birds, their nests, eggs, and habitat; species at risk, their habitat and critical habitat including recovery strategies and management plans; ecological function of wetlands; and ecotoxicology.

Environmental emergencies: emergency management planning and guidance; atmospheric transport and dispersion modelling of contaminants in air; fate and behaviour; and hydrologic trajectory modelling of contaminants in water.

Climate and Meteorology: long-term climate patterns and norms.

5. Has your department or agency had previous contact or involvement with the Proponent or other parties in relation to the Project?

Provide an overview of the information or advice exchanged.

ECCC has not had previous contact or involvement with the Proponent or other parties in relation to the Project.

- 6. From the perspective of the mandate and area(s) of expertise of your department or agency, does the Project have the potential to cause adverse effects within federal jurisdiction or adverse direct or incidental effects as described in section 2 of the IAA?
 - Could any of those effects be managed through legislative or regulatory mechanisms, or programs administered by your department or agency?
 - If a licence, permit, authorization or approval may be issued, could it include conditions in relation to those effects?
 - Based on the information provided by the Proponent, are the proposed mitigation measures appropriate to address the potential adverse effects?
 - Are there norms that the Proponent would be reasonably expected to follow to manage effects (such as standard design features and mitigation, and existing guidance documents)?

• If you have a permit, license or authorization that is applicable to the Project, indicate how the Duty to Consult, as set out in section 35 of the *Constitution Act*, 1982, would be implemented.

[When responding to these questions, please keep in mind the relevant factors listed in the Operational Guide: <u>Designating a Project under the Impact Assessment Act – Canada.ca</u>]

Specify as appropriate.

Based on the information provided, there is the potential for the Project to cause the following adverse effects within federal jurisdiction:

Water Quality and Quantity:

Activities linked to the construction, operation, and decommissioning of a new Aerodrome Project may have adverse effects on the quality of groundwater and surface water, as well as on the hydrological regimes of watercourses and water bodies. Should the Project involve constructing watercourse crossings, conducting hydrostatic tests, constructing and maintaining access roads, excavating or reworking of soils, sediments or rocks, and drilling and blasting (if any occurs) these activities may result in the deposit of contaminants to watercourses and water bodies and result in adverse effects on water quality. Disturbing soils, rock, and streambanks during construction activities may cause erosion and result in deposition of soils and sediments to waterbodies. Soils and sediments can also enter waterbodies through streambed disturbance. These suspended solids can have adverse effects on water quality. Disturbing soil and rock may also result in processes such as acid rock drainage, or metal leaching, which has adverse effects on water quality due to acidification and introduction of metal contaminants into the waterbody. Contaminants may be introduced into waterbodies through stormwater run-off, wastewater discharge, groundwater resurgence, or spills resulting in adverse effects on water quality. The deposition of airborne particulate matter generated by the Project could also be a source of surface water contamination. Water impoundment or withdrawals (for example, for hydrostatic tests) and disturbances to the natural flow of surface water (for example, watercourse crossings) could have effects on the quantity, availability and hydrological regimes of watercourses and waterbodies.

The federal minister of Environment and Climate Change is responsible for the administration (including the enforcement) of the pollution prevention provisions of the *Fisheries Act*, subsection 36(3), which states, unless otherwise authorized by regulations meeting specific criteria, "no person shall deposit or permit the deposit of a deleterious substance of any type in water frequented by fish or in any place under any conditions where the deleterious substances or any other deleterious substance that results from the deposit of the deleterious substance may enter any such water ". A deposit of a deleterious substance is only authorized pursuant to, and in a manner consistent with, a *Fisheries Act* regulation or by a regulation under other federal legislation. Deleterious substances can be any substance that, if added to any water would degrade or alter the water quality such that it could directly or indirectly harmful to fish, fish habitat, or the use of fish by humans. This includes any substance with a potentially harmful chemical (e.g. acutely lethal), physical (e.g. water temperature), or biological effect (e.g. deformities) on fish or fish habitat. Compliance with the terms and conditions of provincial regulatory or permitting systems does not absolve the Proponent from responsibility to comply with the requirements of the *Fisheries Act* or other federal legislation.

In the final report, the proponent indicated that aircraft de-icing fluids might be used in very low volumes. This service will be done in a designated location where pavements will slope to drain any de-icing fluids into a holding tank for collection for off-site disposal. Routine testing of the water runoff will form part of an overall environmental management plant to ensure water quality continues to meet federal guidelines. This is an important commitment as there is a potential for de-icing fluids to have an adverse effect on the receiving environment.

Also noted in the final report was reference to two concepts that ECCC's surface water engineer was not familiar with (but might be normal for aerodrome facilities). These were an MECP Reasonable Use

Concept for nitrate and the use of a bedrock aquifer for water servicing for Phase 1 of project. ECCC would require further information from the proponent in order to comment more on these concepts.

Wildlife, Species at Risk, and Habitat:

The activities linked to the construction, operation, and decommissioning of the Project could have negative effects on terrestrial wildlife resources (wildlife), including migratory birds, protected under the *Migratory Birds Convention Act, 1994* (MBCA), and non-aquatic species at risk (amphibians, arthropods, birds, lichens, terrestrial mammals, mosses, reptiles, and vascular plants) listed on the *Species at Risk Act* (SARA), their habitat. Individual mortality and the destruction of nests and eggs or any other structure necessary for the reproduction and survival of species of risk could occur during all project phases, particularly during site preparation. Mortality in migratory birds and species at risk could also occur because of collisions with vehicles or infrastructure related to the project. Oil or chemical spills could also have adverse effects if these substances make their way into the habitats of migratory birds and species at risk. There is a higher risk that these effects would be more severe for migratory birds that are also species at risk and species where habitat is sensitive to disturbance (e.g., wetlands) or where there is already a high degree of cumulative effects to habitat or individuals. Migratory birds and non-aquatic species at risk could be affected by sensory disturbances during the construction, operation, and decommissioning of the project.

Some examples of potential sources of sensory disturbance include noise from various project activities, lights, vibrations from excavation and the operation of machinery. The amount, duration, frequency, and timing of noise are important to understand potential effects. Sensory disturbance may make adjacent habitats unsuitable for use by wildlife and cause avoidance effects in many species. The majority of SARA-listed species that have potential or confirmed presence in the Project area are also listed under *Ontario's Endangered Species Act* (ESA) and are subject to protection provisions under that Act, with the exception of the Western Chorus Frog, Great Lakes / St. Lawrence - Canadian Shield population. Based on limited data provided, there is a potential for Western Chorus Frog, which is listed as Threatened under SARA, but not currently listed at risk under the provincial legislation, to be present on the project site

ECCC administers and enforces the MBCA, which prohibits the harming of migratory birds, the nests of migratory birds and/or their eggs. ECCC's Guidelines to Reduce Risk to Migratory Birds can be found at https://www.canada.ca/en/environment-climate-change/services/avoiding-harm-migratory-birds.html for more information. It is the responsibility of the Proponent to comply with the requirements of the MBCA.

ECCC is responsible for the overall administration and enforcement of the SARA. The federal Minister of Environment and Climate Change is responsible for non-aquatic species listed on Schedule 1 of the Act (please see table provided in Annex I). The federal Minister of Fisheries and Oceans is responsible for aquatic species at risk.

The proposed Project is located on non-federal lands; therefore, under section 2 of IAA, only migratory bird species at risk may be considered by ECCC as "within federal jurisdiction." It is important to note that, on non-federal lands, listed species that are not an aquatic species or a migratory bird protected by the MBCA can only be protected under SARA by an order made by the Governor in Council (GIC), on the recommendation of the Minister. The Minister must recommend that such an order be made if the Minister is of the opinion that the laws of the province or territory do not effectively protect the species or the residences of its individuals.

Compliance with the terms and conditions of provincial regulatory or permitting systems does not absolve the Proponent from responsibility to comply with the MBCA and SARA requirements.

Greenhouse Gas (GHG) Emissions and Climate Change:

The construction, operation, and decommissioning of the proposed Project may result in GHG emissions or impact on carbon sinks, and may hinder or contribute to the Government of Canada's ability to meet its commitments in respect of Climate change.

The <u>Strategic Assessment of Climate Change (SACC)</u> (published in October 2020) provides guidance related to climate change throughout the impact assessment process. The SACC outlines information that the proponent should provide during the impact assessment process on GHG emissions, impact of the project on carbon sinks, impact of the project on federal emissions reduction efforts and on global GHG emissions, GHG mitigation measures, and climate change resilience; the circumstances in which an upstream GHG assessment will be required; and the circumstances in which a credible plan for achieving net-zero GHG emissions by 2050 will be required.

More details are provided in the <u>draft Technical Guide Related to the Strategic Assessment of Climate Change: Guidance on quantification of net GHG emissions, impact on carbon sinks, mitigation measures, net-zero plan and upstream GHG assessment published in August 2021.</u>

Environmental Emergencies:

The Project, as proposed, could result in spills or bypasses from the aerodrome project. There is the potential for adverse environmental and human health effects from accidents and malfunctions from the Project. Optimized prevention, preparedness and response measures and systems will be important given the risk of spills of deleterious substances to water.

7. Does your department or agency have an oversight mechanism, policy, guidance, program or additional authority (or know of any) that may be relevant and could serve as a means to address the concerns expressed about the Project?

In particular, consider ways to address any of the following issues that have been raised by the requestor, that fall within your mandate:

- Potential impacts to fish and fish habitat (e.g., surface water contamination from runoff into Lake Simcoe via the Burnie Creek);
- Potential impacts to species at risk and/or their habitat (e.g., from changes to, or loss of, critical habitat);
- Potential impacts to migratory birds and/or their habitat (e.g., from changes to, or loss of, habitat);
- Potential impacts to wetlands and wetland function;
- Potential impacts to surface water and/or groundwater quality, including drinking water:
- Potential impacts from the use of contaminated soil fill, including on human health;
- Potential impacts on air quality, including on human health; and
- Potential impacts on Indigenous peoples on the following:
 - o health, social or economic conditions;
 - current use of lands and resources for traditional purposes (e.g. hunting, fishing, trapping, gathering); and
 - any structure, site or thing that is of historical, archaeological, paleontological or architectural significance.

If yes, please specify the oversight mechanism, policy, guidance, program or authority and how it could be applied to the Project.

It is the responsibility of the Proponent to comply with the following requirements:

 Migratory Birds Convention Act, 1994 requires the owner/operator to ensure all phases of the project are carried out in a manner that protects migratory birds and avoids harming, killing or disturbing migratory birds or destroying, disturbing or taking their nests or eggs.

- Furthermore, migratory birds listed on Schedule 1 of Species at Risk Act (SARA) may have additional protection considerations. For some migratory bird species listed under the SARA, the residence prohibition will protect nests that are not active, but are re-used in subsequent years. Critical habitat of species-at-risk provisions are described under section 58 of the SARA. For more information about SARA S. 58 and migratory birds, please consult: Protection statement for the habitat to which the Migratory Birds Convention Act, 1994 applies for migratory birds listed under the Species at Risk: https://www.canada.ca/en/environment-climate-change/services/species-risk-public-registry/critical-habitat-statements/protection-statement-habitat-mbca-1994-applies-migratory-birds-listed-under-sara.html
- For more information on migratory bird residences and protection requirements, please refer to
 the Species at Risk Registry https://www.canada.ca/en/environment-climate-change/services/species-risk-public-registry/residence-descriptions.html. Given the potential for Red-headed Woodpecker and Chimney Swift to be present on the project site, the proponent should contact ECCC-CWS regarding potential SARA permitting requirements if residences may be destroyed during site clearing.
- Environment and Climate Change Canada administers Section 36(3) of the Fisheries Act, which prohibits the deposit of deleterious substances into waters frequented by fish, unless the deposit is authorized by regulations. The owner/operator will be required to ensure there are no deposits of deleterious substances that would degrade or alter or form part of a process of degradation or alteration of the quality of that water so that it is rendered or is likely to be rendered deleterious to fish.

Please see Annex I (after the signature line), for questions directed to your specific federal department.

8. Does your department or agency have information knowledge of any applicable oversight mechanism, policy, guidance, or programs for this Project administered by any other levels of government?

If yes, please specify.

ECCC acknowledges that the province has expertise and oversight in numerous value components (e.g. water quality and quantity, air quality and wildlife management). In particular ECCC would like to flag that the majority of SARA-listed species that have potential or confirmed presence in the Project area are also listed under Ontario's Endangered Species Act (ESA) and are subject to protection provisions under that Act, with the exception of the Western Chorus Frog, Great Lakes / St. Lawrence - Canadian Shield population.

9. If your department has guidance material that would be helpful to the Proponent or the Agency, please include these as attachments or hyperlinks in your response.

ECCC's Guidelines to Reduce Risk to Migratory Birds https://www.canada.ca/en/environment-climate-change/services/avoiding-harm-migratory-birds/reduce-risk-migratory-birds.html

Pollution prevention planning provisions of part 4 of the Canadian Environmental Protection Act, 1999: Guidelines, Third edition https://www.canada.ca/en/environment-climate-change/services/pollutionprevention/planning-notices/guidelines.html

Federal Sustainable Development Strategy

 https://www.canada.ca/en/services/environment/conservation/sustainability/federal sustainable-development-strategy.html

Air Quality:

Date

Cheminfo Services Inc., 2005. "Best Practices for the Reduction of Air Emissions From Construction and Demolition Activities".

http://bieapfremp.org/Toolbox%20pdfs/EC%20-%20Final%20Code%20of%20Practice%20-%20Construction%20%20Demolition.pdf

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Name of departmental / agency responder

Acting Regional Director, EPOD, Ontario

Title of responder

March 6, 2023

ANNEX I - ADDITIONAL FEDERAL AUTHORITY SPECIFC QUESTIONS

Environment and Climate Change Canada:

1) The requester indicated (Enclosure 1) that there are federally listed species at risk. Please confirm the presence or absence of critical habitat for species at risk, and identify the specific species at risk of concern. Discuss the specific actions, or policies and guidance administered by your department, if any, pursuant to the Species at Risk Act to address any potential effects of the Project to federal species at risk.

ECCC has been notified that the proponent's planned 2022 terrestrial baseline studies were not completed. This data would have provided key information about the proposed project site and the wildlife present on the site, specifically federally listed species at risk. Without this information, ECCC can only confirm that currently there is no overlap with critical habitat units for federal species at risk; however, future baseline surveys could provide important information on species at risk presence.

Further information related to ECCC's mandate and obligations under the *Species at Risk Act* can be found in Enclosure 2 – Federal Authority Advice Record (FAAR).

Based on a desktop search, the following species at risk have the potential to be present or have been confirmed on the Project site:

Common Name	SARA Status	ESA Status	<u>Confirmed</u> (C) -SARA CH or NatureServe – Ontario Natural Heritage Information Center, 2021 or <u>Potential</u> (P) Presence *Preliminary List
Reptiles			
Blanding's Turtle	END	THR	(P) Potentially suitable habitat located on site as indicated by proponent
Snapping Turtle	SC	SC	(C) Confirmed observation within 1km of site as per NHIC
Midland Painted Turtle	SC	NAR	(C) Confirmed observation within 1km of site as per NHIC
Mammals			
Little Brown Myotis	END	END	(P) Potentially suitable habitat located on site as indicated by proponent
Northern Myotis	END	END	(P) Potentially suitable habitat located on site as indicated by proponent
Tri-colored Bat	END	END	(P) Potentially suitable habitat located on site as indicated by proponent
Migratory Birds			
Bank Swallow	THR	THR	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Barn Swallow	THR	THR	(P) Potentially suitable habitat located on site as indicated by proponent
Bobolink	THR	THR	(C) Confirmed observation within 1km of site as per NHIC
			(P) Potentially suitable habitat located on site as indicated by proponent
Canada Warbler	THR	SC	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Chimney Swift	END	THR	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Eastern	THR	THR	(C) Confirmed observation within 1km of site as per NHIC
Meadowlark			(P) Potentially suitable habitat located on site as indicated by proponent
Eastern Wood Pewee	SC	SC	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Grasshopper Sparrow	SC	SC	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Red-Headed Woodpecker	END	END	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Wood Thrush	THR	SC	(P) Potential for SAR Migratory bird as per OBBA (10 x 10 km)
Amphibian			

Western Chorus	THR	NAR	(P) Potentially suitable habitat located on site as indicated by
Frog, Great Lakes			requestor
/ St. Lawrence -			
Canadian Shield			
population			
Plants			
	ENID	EVID	(D) Detected a State of the left of the set
Butternut	END	END	(P) Potentially suitable habitat located on site as indicated by
			LSRCA

2) The requester indicated (Enclosure 1) that there are federally listed migratory birds. Please confirm the presence or absence of migration routes and/or habitat for migratory birds, and identify the specific migratory birds of concern. Discuss the specific actions, or policies and guidance administered by your department, if any, pursuant to the *Migratory Birds Convention Act, 1994 or the Migratory Bird Regulations, 2022* to address any potential effects of the Project to migratory birds.

Similar to the question above, as noted by the proponent the 2022 terrestrial baseline studies were not completed which would have helped inform ECCC's advice. ECCC can confirm that currently there is no overlap with critical habitat units for migratory birds, however, baseline surveys would provide important information on the potential risk of harm to migratory birds, their nest and eggs. However, baseline surveys would provide important information on the potential risk of harm to migratory birds, their nest and eggs, or potential to affect the residence of SAR migratory birds.

Further information related to ECCC's mandate and obligations under the *Migratory Birds Convention Act,* 1994 and *Migratory Bird Regulations,* 2022 can be found in Enclosure 2 – FAAR.

Based on a desktop search, the following migratory birds (including species at risk migratory birds) have the potential to be present or have been confirmed on the Project site:

- Bank Swallow
- Barn Swallow
- Bobolink
- Canada Goose
- Canada Warbler
- Chimney Swift
- Bufflehead
- Eastern Meadowlark
- Eastern Wood Pewee
- Grasshopper Sparrow
- Great Crested Flycatcher
- Mourning warbler
- Merganser
- Ovenbird
- Redhead
- Red-headed Woodpecker
- Trumpeter swan
- Tundra swan
- Wood Thrush

Fisheries and Oceans Canada:

1) Based on the proponent's information¹, clarify any concerns with any potential impacts to fish and fish habitat in waterbodies on the Proponent's project site and surrounding water bodies.

Transport Canada:

1) The Agency understands that the Proponent's revised summary report dated May 2022 (Version 3), underwent Transport Canada's regulatory review and the report was determined to be compliant with applicable requirements of the Canadian Aviation Regulations 307 on July 6, 2022. Please reconfirm this statement? Please indicate if there are any additional requirements under Transport Canada's mandate that the Proponent must follow?

Discuss any role that Transport Canada would have during the life of the Project, including in addressing any comments or concerns by members of the Public or Indigenous communities

¹ Information regarding he Proponent's final summary report submitted to Transport Canada can be found at the following link: https://www.newaerodromeontario2021.ca/