December 2, 2022

Billy Nolen
Acting Administrator
Federal Aviation Administration

The attached letter from the NTSB Chair provides information about the December 1, 2022, report *Require Immediate Inspection of Bell 407 Tail Boom Attachment Hardware and Fittings* (NTSB/AIR-22-10). The details of this accident investigation and the resulting safety recommendations may be found in the attached report, which can also be accessed at http://www.ntsb.gov.

The NTSB is vitally interested in these recommendations because they are designed to prevent accidents and save lives. We would appreciate a response within 90 days of the date of this letter, detailing the actions you have taken or intend to take to implement these recommendations. When replying, please refer to the safety recommendations by number (for example, A-22-28 and -29). We encourage you to submit your response to ExecutiveSecretariat@ntsb.gov. If your reply exceeds 20 megabytes, including attachments, please e-mail us at the same address for instructions on how to send larger documents. Please do not submit both an electronic copy and a hard copy of the same response.

Executive Secretariat-CRB
Office of the Managing Director
National Transportation Safety Board
490 L'Enfant Plaza SW
Washington, DC 20594
Email: ExecutiveSecretariat@ntsb.gov

National Transportation Safety Board

Office of the Chair

Washington, DC 20594

December 2, 2022

Mr. Billy Nolen
Acting Administrator
Federal Aviation Administration
Washington, DC 20591

Dear Mr. Nolen:

This letter provides information about the National Transportation Safety Board's (NTSB) December 1, 2022, report *Require Immediate Inspection of Bell 407 Tail Boom Attachment Hardware and Fittings* (NTSB/AIR-22-10). The details of this ongoing accident investigation and the resulting urgent safety recommendations may be found in the attached report, which can also be accessed at http://www.ntsb.gov.

As a result of the NTSB's preliminary findings in this investigation, we identified the following safety issues:

- Need to perform an immediate torque check of the tail boom attachment hardware and visual inspection of the attachment fittings for evidence of cracks and fractures.

- Need to conduct more frequent torque checks of the tail boom attachment hardware and visual inspections of the attachment fittings for evidence of cracks and fractures to provide multiple opportunities to identify potential failures.

Accordingly, the NTSB makes the following urgent safety recommendations to the Federal Aviation Administration (FAA):

- Require operators of Bell 407 helicopters to conduct an immediate torque check of the tail boom attachment hardware, as well as a visual inspection of the tail boom attachment fittings for evidence of cracks and fractures, and report findings to the FAA. (A-22-28) (Urgent)

- Require operators of Bell 407 helicopters to conduct subsequent torque checks of the tail boom attachment hardware and visual inspection of the tail boom attachment fittings as referenced in Safety Recommendation A-22-28 at an interval significantly less than the

currently required interval to provide multiple opportunities for detecting any improperly installed or fractured attachment hardware or fittings. Require operators to report findings to the FAA. (A-22-29) (Urgent)

The NTSB is vitally interested in these urgent recommendations because they are designed to prevent accidents and save lives. We would appreciate a response within 30 days of the date of this letter, detailing the actions you have taken or intend to take to implement these urgent recommendations. When replying, please refer to the safety recommendations by number (Safety Recommendations A-22-28 and -29). We encourage you to submit your response to ExecutiveSecretariat@ntsb.gov. If your reply, including attachments, exceeds 20 megabytes, please e-mail us at the same address for instructions on how to send larger documents. Please do not submit both an electronic copy and a hard copy of the same response.

Sincerely,

[Original Signed]

Jennifer L. Homendy
Chair

December 2, 2022

The Honorable Omar Alghabra MP
Minister of Transport
Transport Canada

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant accidents in other modes of transportation—railroad, highway, marine, and pipeline. We determine the probable cause of the accidents and issue safety recommendations aimed at preventing future accidents. In addition, we carry out special studies concerning transportation safety and coordinate the resources of the federal government and other organizations to provide assistance to victims and their family members affected by major transportation disasters.

The attached letter from the NTSB Chair provides information about the NTSB's our December 1, 2022, report *Require Immediate Inspection of Bell 407 Tail Boom Attachment Hardware and Fittings* (NTSB/AIR-22-10). The details of this accident investigation and the resulting safety recommendation may be found in the attached report, which can also be accessed at http://www.ntsb.gov. For more information about NTSB and our recommendation process, please see the attached one-page summary.

The NTSB is vitally interested in these recommendations because they are designed to prevent accidents and save lives. We would appreciate a response within 90 days of the date of this letter, detailing the actions you have taken or intend to take to implement these recommendations. When replying, please refer to the safety recommendation by number (for example, A-22-30 and -31). We encourage you to submit your response to ExecutiveSecretariat@ntsb.gov. If your reply exceeds 20 megabytes, including attachments, please e-mail us at the same address

for instructions on how to send larger documents. Please do not submit both an electronic copy and a hard copy of the same response.

All communications regarding safety recommendations will be stored by the NTSB and viewable by the public. Please do not send privileged or confidential communications in response to this recommendation. Responses marked as confidential or privileged (or similar designations) will be considered nonresponsive. If you have concerns about this protocol, please contact us at ExecutiveSecretariat@ntsb.gov.

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Office of the Chair

Washington, DC 20594

December 2, 2022

The Honorable Omar Alghabra MP
Minister of Transport
Transport Canada
330 Sparks Street
Ottawa, Ontario
K1A 0N5

Dear Minister Alghabra:

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant accidents in other modes of transportation—railroad, highway, marine, and pipeline. We determine the probable cause of the accidents and issue safety recommendations aimed at preventing future accidents. In addition, we carry out special studies concerning transportation safety and coordinate the resources of the federal government and other organizations to assist victims and their family members affected by major transportation disasters.

We are providing the following information to urge Transport Canada to act on the urgent safety recommendations in this letter because we believe your organization can help reduce the risk of future accidents. This letter includes information about our December 1, 2022, report *Require Immediate Inspection of Bell 407 Tail Boom Attachment Hardware and Fittings* (NTSB/AIR-22-10). The details of this ongoing accident investigation and the resulting urgent safety recommendations may be found in the attached report, which can also be accessed at http://www.ntsb.gov.

As a result of the NTSB's preliminary findings in this investigation, we identified the following safety issues:

- Need to perform an immediate torque check of the tail boom attachment hardware and visual inspection of the attachment fittings for evidence of cracks and fractures.

- Need to conduct more frequent torque checks of the tail boom attachment hardware and visual inspections of the attachment fittings for evidence of cracks and fractures to provide multiple opportunities to identify potential failures.

Accordingly, the NTSB makes the following urgent safety recommendations to Transport Canada:

- Require operators of Bell 407 helicopters to conduct an immediate torque check of the tail boom attachment hardware, as well as a visual inspection of the tail boom attachment fittings for evidence of cracks and fractures, and report findings to Transport Canada. (A-22-30) (Urgent)
- Require operators of Bell 407 helicopters to conduct subsequent torque checks of the tail boom attachment hardware and visual inspection of the tail boom attachment fittings as referenced in Safety Recommendation A-22-30 at an interval significantly less than the currently required interval to provide multiple opportunities for detecting any improperly installed or fractured attachment hardware or fittings. Require operators to report findings to their respective regulatory authority. (A-22-31) (Urgent)

The NTSB is vitally interested in these urgent recommendations because they were designed to prevent accidents and save lives. We would appreciate a response within 30 days of the date of this letter, detailing the actions you have taken or intend to take to implement these recommendations. When replying, please refer to the safety recommendations by number (Safety Recommendations A-22-30 and -31). We encourage you to submit your response to ExecutiveSecretariat@ntsb.gov. If your reply, including attachments, exceeds 20 megabytes, please e-mail us at the same address for instructions on how to send larger documents. Please do not submit both an electronic copy and a hard copy of the same response.

All communications regarding safety recommendations are stored by the NTSB and viewable by the public. Please do not send privileged or confidential communications in response to this/these recommendation(s). Responses marked as confidential or privileged (or similar designations) will be considered nonresponsive. In the likely event that your company uses auto-generated and/or preformatted confidentiality statements on letterhead or outgoing e-mails, please include a statement in your letter indicating that the information can be publicly released. If you have concerns about this protocol, please contact us at ExecutiveSecretariat@ntsb.gov.

Sincerely,

[Original Signed]

Jennifer L. Homendy
Chair

NTSB Recommendations and You

The National Transportation Safety Board (NTSB) is an independent federal agency charged with investigating and determining the probable cause of transportation accidents. We do not make regulations, but we do issue recommendations to organizations such as yours when we discover shortcomings in the transportation system that increase the risk of accidents. **As a result of our investigative activities, we have issued one or more safety recommendations that we believe you can act on to improve transportation safety.**

Why did the NTSB issue my organization a safety recommendation?

We issue safety recommendations to organizations that can bring about change to reduce the risk of accidents, either through their direct role in the transportation industry, their legislative or regulatory authority, or the significant influence they have among others in the industry. We believe your organization is able to make or influence such changes.

What does the NTSB expect of safety recommendation recipients?

First and foremost, we encourage you to promptly take the recommended action to improve safety. Because we're eager to see recommendations implemented before more accidents occur, we follow recipients' efforts to implement each recommendation. We ask that you update us any time you achieve a significant milestone in your progress toward implementing the attached recommendation(s), or at least annually. We will provide feedback on your efforts by classifying each recommendation as open or closed, acceptable or unacceptable.[1] Information about your actions associated with your recommendation(s) is available at our website so that the public can see our combined efforts to improve transportation safety.

1 For a full description of our safety recommendation classifications, see the Status Explanation page on our website.

What should our response to the NTSB include?

Please respond to us within **90 days (30 for urgent recommendations)** explaining the specific actions you have taken or intend to take in response to the safety recommendation(s), and propose a timeline for completion. We understand organizations today are faced with competing priorities and limited resources, which can make implementing our recommendations a challenge. If, for any reason, you are not able to take the recommended action, or if you believe an alternate action would be more appropriate for your organization, please explain why. When you respond, please provide an e-mail address for future communications. We will review your response and provide feedback.

What if my organization doesn't believe the recommended action is the best way to improve safety?

We base our recommendations on the evidence, facts, and circumstances of the accidents we investigate. Sometimes industry leaders identify ways to attain the same safety objective more efficiently, and we encourage recipients to share their ideas with us. In these cases, we will evaluate the alternate means of achieving the safety objective and provide feedback. We believe safety is a collaborative effort, and we're happy to work with your organization to set goals and make improvements.

Why does the NTSB expect us to take action, even though our organization wasn't responsible for the accident that resulted in the safety recommendation?

Our goal is to prevent accidents. Often, the factors we identify as causing or contributing to an accident are not unique—they represent common practices or situations that may be accidents waiting to happen. In such instances, we may make recommendations intended to raise the minimum standard for safety throughout the industry.

How do we contact the NTSB to provide updates or obtain further information?

Please contact us electronically at executivesecretariat@ntsb.gov. If you wish to send us supporting documentation that, with your response, exceeds 10 megabytes, please contact us at the same e-mail address for instructions.

NTSB National Transportation Safety Board

www.ntsb.gov

We look forward to working with you to prevent accidents and save lives!