

SAFETY BULLETIN

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NEGLECTED TOWING PROCEDURE LEAD TO INCIDENT

INTRODUCTION

Aircraft towing refers to the process of moving an aircraft on the ground without powering up the aircraft engines. Normally, towing process is accomplished by using the tow trucks with the assistance of tow bar. However, aircraft towing is considered as a critical operation in various scenarios, including parking and positioning of the aircraft for maintenance tasks. In order to ensure a safe and efficient towing operation, towing procedures are established in accordance with the regulations set by the organisation. The purpose of these procedures is to establish a proper guidelines when performing the aircraft towing process under different circumstances. Neglected towing procedures can lead to incidents, damage to the aircraft or even destruction of equipment, which can be expensive to repair or replace.

INCIDENT BACKGROUND:

A recent incident has been reported via a hazard report, indicating that the tow bar sheared during the towing operation of Bangkok Airways HS-PGN after completion of the scheduled IDLE EGR at Apron B which caused the tow bar shear pin to break.

CONTRIBUTING FACTORS:

TYPE OF HAZARD CATEGORY

1. PROCEDURE/TECHNICAL

One of the contributing factors that leads to this particular towing incidents is due to lack of communication. According to the towing procedures, the ground crew must communicate closely with the cockpit crew in order to ensure a safe towing operation. In this case, the ground crew and cockpit crew did not communicate effectively with each other causing the tow bar pin to shear and break.

Another factor is the non-compliance with the towing procedures. The cockpit crew, ground crew, and the tow truck driver who involved during the HS-PGN towing operation upon the completion of EGR, fail to comply with the correct procedures. One of the important procedure during towing operation is to ensure the tow bar does not exceed the maximum towing angle. Besides that, the correct bypass pin should be used during towing the aircraft as per specified in the aircraft's maintenance manual.

2. HUMAN FACTOR

The next contributing factor is complacency. Experienced aircraft maintenance staff members who frequently engage in towing operations for the specific aircraft type might unintentionally become complacent, potentially resulting in reduced attention to detail and a diminished emphasis on safety especially in bad weather conditions.

IMPORTANCE OF ADHERENCE TO TOWING PROCEDURES:

The importance of adherence to towing procedures cannot be overstated. Here are some reasons why adherence to towing procedures is important:

1. AIRCRAFT SAFETY:

Adhering to the established towing procedures ensures that the aircraft remains in optimal condition and avoids potential damage that could compromise its airworthiness.

2. SAFETY OF PERSONNEL:

Towing procedures prioritize the safety of all personnel involved, including tow truck operators, ground crew, and cockpit crew. Non-adherence to the towing procedures can lead to accidents, major and minor injuries, and collisions during towing operations.

3. EQUIPMENT/ASSETS DAMAGE PREVENTION:

Non-adherence to the towing procedures also can lead to equipment damage especially the tow bar and the tow truck as well which can be a burden for the company to replace or repair it due to the high cost.

4. REGULATORY COMPLIANCE:

Specific guidelines and procedures for aircraft towing are specified in the Maintenance organization Exposition (MOE) part 2-24-2.

Adherence to these guidelines ensures compliance with regulations, enhancing overall safety and maintaining industry standards.

5. SERVICEABLE RADIOTELEPHONY (HEAD SET):

Radiotelephony provides a means of communication between ground personnel, tow vehicle operators, and also the cockpit crew. Having a serviceable headset is crucial during aircraft towing operations due to its significant role in communication, safety, and operational efficiency. A proper radiotelephony communication ensures a clear communication, enables emergency response and ensure synchronized and controlled towing operations. In the event of intermittent headset communication, aircraft towing operations should be stopped immediately.

OVERCOME THE IMPACT:

1.) TRAINING AND REFRESHER

Training and refresher programs for aircraft towing are essential to ensure that personnel involved in towing operations are well-prepared, knowledgeable, and up-to-date with the latest procedures and safety protocols. These programs help prevent accidents, enhance efficiency, and maintain the integrity of both the aircraft and the ground equipment.

2.) AVOID HERO CULTURE

Hero culture is a dangerous mindset that can lead to accidents and injuries in aircraft maintenance. It is characterized by a willingness to take risks and to bypass safety procedures in order to get the job done quickly. This can lead to mistakes and oversights that can have serious consequences such as increased risk of accidents and damage to the aircraft. During the towing operation, hero culture might be implemented due to the headset failure or the maintenance personnel have experience.



3.) EFFECTIVE COMMUNICATION CULTURE

Establishing an effective communication culture during aircraft towing is essential to ensure the safety of personnel, equipment, and the customer assets. During the towing operation, the ground crew (headset man) is the middle person between the cockpit crew and the tow truck driver. They are responsible for communicating with both parties and ensuring that the aircraft is safely towed to its destination.

CONSEQUENCES OF NEGLECTED TOWING PROCEDURES:

Neglecting aircraft towing procedures can have serious consequences, potentially jeopardizing the safety of personnel, aircraft, and operations. Towing an aircraft is a complex and high-risk operation that requires strict adherence to established procedures to prevent accidents, damage, and operational disruptions. Neglecting proper towing procedures can result in damage to the aircraft's landing gear, fuselage, wings, or other structural components. This damage may compromise the aircraft's structural integrity and airworthiness.

Besides that, neglecting towing procedures can lead to safety hazards for personnel on the ground who are involved in the towing operation. Improper towing techniques, failure to follow safety protocols, and miscommunication can result in accidents, injuries, and even fatalities.

Next, towing procedures are often regulated by aviation authorities to ensure safety. Neglecting these procedures may result in regulatory violations, audits, and potential penalties.

Non-adherence to the towing procedures can lead to costly repairs in case of unexpected damage occurs either to the aircraft or the ground equipment. This will be a financial burden to the company as they have to bare the cost to repair or replace the damaged components or equipment which can lead to significant loss.

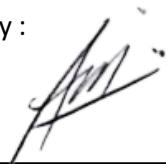
Neglecting the towing procedures is considered as intentional violations. Aviation authorities, have strict regulations and guidelines for aircraft towing procedures. Neglecting these procedures intentionally can lead to potential legal consequences. Serious incidents resulting from neglected towing procedures may lead to legal investigations, insurance claims, and potential litigation.

CONCLUSION

In a nutshell, adherence to towing procedures in aircraft operations is very important due to the critical impact on safety, operational efficiency, and the integrity of both the aircraft and the personnel involved. To avoid this incident repeating again in the near future, it is essential for the organization to prioritize thorough training, implementing a clear communication, and strict adherence to established aircraft towing procedures. By emphasizing safety, and adherence to protocols, organizations can prevent accidents, maintain operational efficiency, and ensure the safety of personnel and aircraft. All the personnel involved in the aircraft towing process should take the responsibility to ensure a safe towing operation in order to avoid facing the consequences. Any accidents or incidents during the towing operation should be reported immediately to the person in charge.


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Prepared by :



Amirul Rasyid Bin Ahmad
(Safety Officer)

Approved by :



Mohd Borhan b Ahamad
(Safety Manager)