

HSAC Recommended Practice (RP) # 2005-01

Helicopter Tiedown Practices

Background

Over the past ten years there have been five accidents in the GoM attributable to pilots attempting to takeoff with the aircraft tied down to the helideck. All the aircraft were either substantially damaged or destroyed and one pilot was fatally injured. Tiedown accidents are preventable provided the operator has an effective tiedown policy in effect and pilots follow the guidelines.

Recommended Practices

1. All offshore aircraft should be equipped with helideck tiedowns designed for that particular model helicopter and capable of securing the aircraft to the deck at four points.
2. Aircraft should have provisions for safe stowage of the tiedowns when not in use that will not present a hazard to the aircraft should they become loose in flight. Stowage locations should be standardized by aircraft model.
3. Aircraft tiedowns should be inspected on a daily basis and replaced when any evidence of excessive wear or significant deterioration is noted. Interconnecting ribbons or lanyards should not be removed or cut.
4. Whenever an aircraft is required to be tied down to the deck, all tiedowns will be used to include all main rotor tiedowns.
5. The addition of brightly colored streamers to the tiedowns will greatly increase their visibility to both pilots and passengers.
6. The addition of a sock, secured to the tiedowns and placed over the cyclic will add another reminder to the pilot that the tiedowns are installed.
7. Aircraft should be tied to the heliport/deck/ramp whenever the following conditions exist:
 - When severe weather exists.
 - When severe weather is imminent or forecast.
 - When thunderstorms or squall lines are in close proximity.
 - When winds may exceed 40 knots.
 - When medium or large helicopters land on or depart from an offshore helideck occupied by another helicopter, the other helicopter will be tied to the deck.
 - Helicopters remaining offshore and helicopters remaining outside overnight should be tied down using the entire tiedown kit.
 - When thunderstorms or squall lines are forecast, consideration should be given to tying down helicopters that will be left unattended for more than one hour.
8. Never start the aircraft with the intent of flight without first performing a walk-around inspection and confirming that all tiedowns have been removed.
9. As with all sequenced events, if interrupted while removing the tiedowns, start from the beginning.
10. Tiedown practices and procedures should be adequately covered in the pilot new hire training syllabus and reviewed as a topic during annual recurrent training.

Recommended Practices (RP) are published under the direction of the Helicopter Safety Advisory Conference (HSAC), P.O. Box 60220, Houston, Texas, 77205. RPs are a medium for discussion of aviation operational safety pertinent to the energy exploration and production industry in the Gulf of Mexico. RPs are not intended to replace individual engineering or corporate judgement nor to replace instruction in company manuals or government regulations. Suggestions for subject matter are cordially invited.

