

## **HSE information sheet**

### **Jack-up (self-elevating) installations: floating damage stability survivability criterion**

**Offshore Information Sheet No 6/2007  
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## Introduction

1 This information sheet advises the offshore industry that recent research conclusions indicate that the damage stability survivability criterion for jack-up units previously used by industry may be inadequate in certain environmental conditions. It replaces Safety Notice 2/01 (SN 2/2001) (issued Sept 2001) which has now been withdrawn.

## Background

2 There is a history of jack-up losses due to capsize during wet tow operations. Steps have been taken to improve operating practices through the provision of guidance by Oil and Gas UK.

3 Most jack-up installation safety cases cite the (now withdrawn) 4th edition Guidance Notes, which are similar to those in the IMO MODU Code<sup>4</sup>, for their float stability performance standards. Recent research undertaken by HSE in collaboration with industry has shown inadequacies in this damage stability survivability criterion.

4 The rationale, methodology, results and conclusions are contained in OTO 2000 059 Investigations into the stability of an intact and damaged jack-up during a wet tow: model test interpretation and assessment.

5 Duty holders now need to reassess the damage stability capability of their installations taking into account the results of this research.

## Actions

6 Owners of jack-up installations are advised to obtain and consider the findings of the research project which are reported in OTO 2000 059.

7 These results underline the need for caution in planning and executing wet tow operations. Contingency plans, related instructions and training of crew members should be reviewed to ensure that those on board are fully aware of the danger if a significant flooding incident takes place in other than calm conditions, and that appropriate arrangements are made to enable rapid evacuation, escape and rescue. Owners should also ensure that there is suitable guidance for those in command in emergency conditions.

## Relevant legal requirements

8 The main legal requirements are:

- [The Offshore Installations and Wells \(Design and Construction, etc\) Regulations 1996 \(SI 1996/913\)](#).

- The Health and Safety at Work etc Act 1974.
- [The Offshore Installations \(Safety Case\) Regulations 2005](#) (SI 2005/3117).

## References

- 1 [Investigations into the stability of an intact and damaged jack-up during a wet tow: model test interpretation and assessment](#) OTO 2000 059 HSE Books 2000.
- 2 Guidelines for safe movement of self-elevating offshore installations (jack-ups). A joint industry guide UK Offshore Operators Association (UKOOA) 1995.
- 3 Offshore Installations: guidance on design, construction and certification (4th ed) HMSO 1990 ISBN 0 11 8821164 (withdrawn from publication July 1998 - see [Operations Notice 27](#)).
- 4 Code for the construction and equipment of mobile offshore drilling units (MODU Code) 1990 International Maritime Organisation (IMO) 1990 ISBN 9280112589.
- 5 Status of technical guidance on design, construction and certification [Operations Notice 27](#) HSE website 2005

## Further information

Any queries relating to this sheet should be addressed to:

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<p>This information sheet contains notes on good practice which are not compulsory but which you may find helpful in considering what you need to do</p>
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