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**NATIONAL STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

GB/T 30217.2-2016

**Petroleum and natural gas industries -- Drilling and production
equipment -- Part 2: Deepwater drilling riser analysis
methodologies, operations and integrity**

石油天然气工业 钻井和采油设备 第2部分：深水钻井隔水管的分析方法、操作和
完整性

(English Translation)

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Foreword

GB/T 30217 "Oil and gas industry drilling and oil recovery equipment" is divided into two parts.

- Part 1. Design and operation of offshore drilling riser equipment;

Part 2. Analytical methods, operations and completeness of deepwater drilling risers.

This part is part 2 of GB/T 30217.

This part is drafted in accordance with the rules given in GB/T 1.1-2009.

This part uses the translation method equivalent to ISO/T R13624-2..2009 "Oil and gas industry drilling and oil extraction equipment Part 2 . Technical Report on the Method, Operation and Integrity of Deepwater Drilling.

This part also makes the following editorial changes.

--- modified the standard name, the original name "deepwater drilling riser method, operation and integrity of technical report" changed to the part name Called "deepwater drilling riser analysis method, operation and integrity".

This part of the National Petroleum Drilling Equipment and Tools Standardization Technical Committee (SAC/TC96) proposed and centralized.

This part of the drafting unit. National Oil and Gas Drilling Equipment Engineering Technology Research Center, Baoji Petroleum Machinery Co., Ltd., CNOOC Oilfield

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1 Scope

This part of GB/T 30217 is suitable for mobile marine drilling equipment with underwater BOP units. This part of GB/T 30217 the analytical method for the discussion of drilling risers is applicable to GB/T 30217.1. For an explanation of these analytical methods, see GB/T 30217.1.

2 Normative reference documents

The following documents are indispensable for the application of this document. For dated references, only the dated edition applies to this article Pieces. For undated references, the latest edition (including all modifications) applies to this document.

Petroleum and natural gas industries - Drilling and oil recovery equipment - Part 1. Installation of marine drilling riser equipment GB/T 30217.1-2013 (ISO 13624-1.:2009, IDT) Design, Selection, Operation and Maintenance of Ocean Drilling Watertight System (API RP16Q..1993) and Maintenance of Marine Drilling Riser Systems)

3 Terms and definitions

The following terms and definitions apply to this document.

Accumulator (for BOP) accumulator A pressure vessel filled with a gas (e.g., nitrogen) in the upper part of the liquid level is used to store the hydraulic fluid under pressure to operate the BOP.

Accumulator (for riser tensioner) accumulator the upper part of the liquid level is filled with a pressure vessel (for example, nitrogen), and the high pressure gas from the tensioner cylinder is added to the pressure vessel gas side Pressure, the supply of high pressure hydraulic fluid to stimulate the riser tensioner cylinder.

Air buoyancy air-canbuoyancy Top closed, bottom open air cylinder generated by the buoyancy of the buoyant force applied to the riser string, the cylinder in the water pipe outside the surrounding shape Into an inflatable annulus.

Annoying annulus

When a tube is inside the other tube, the space between the two tubes.

Apparent weight

Effective weight

Underwater weight submergedweight the weight of the riser in the air is reduced by the buoyancy.