

## احداث ردیف تراکم گاز در ایستگاه جمع آوری بینک



شماره پیمان:

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	EMISSION AND EFFLUENT SUMMARY								
پروژه	بسته کاری	صادر کننده	تسهيلات	رشته	نوع مدرك	سريال	نسخه		
BK	GCS	PEDCO	120	PR	LI	0007	D00		

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# طرح نگهداشت و افزایش تولید ۲۷ مخزن

## **EMISSION AND EFFLUENT SUMMARY**

نگهداشت و افزایش تولید میدان نفتی بینک

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#### Status:

IDC: Inter-Discipline Check
IFC: Issued For Comment
IFA: Issued For Approval
AFD: Approved For Design
AFC: Approved For Construction
AFP: Approved For Purchase
AFQ: Approved For Quotation
IFI: Issued For Information
AB-R: As-Built for CLIENT Review
AB-A: As-Built —Approved



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شماره پیمان:

EMISSION AND EFFLUENT SUMMARY

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#### 1.0 INTRODUCTION

Binak oilfield in Bushehr province is a part of the southern oilfields of Iran, is located 20 km northwest of Genaveh city.

With the aim of increasing production of oil from Binak oilfield, an EPC/EPD Project has been defined by NIOC/NISOC and awarded to Petro Iran Development Company (PEDCO). Also PEDCO (as General Contractor) has assigned the EPC-packages of the Project to "Hirgan Energy - Design and Inspection" JV.

As a part of the Project, a New Gas Compressor Station (adjacent to existing Binak GCS) shall be constructed to gather of 15 MMSCFD (approx.) associated gases and compress & transfer them to Siahmakan GIS.

#### **GENERAL DEFINITION**

The following terms shall be used in this document.

CLIENT: National Iranian South Oilfields Company (NISOC)

PROJECT: Binak Oilfield Development - Surface Facilities; New

Gas Compressor Station

EPD/EPC CONTRACTOR (GC): Petro Iran Development Company (PEDCO)

EPC CONTRACTOR: Joint Venture of : Hirgan Energy - Design &

Inspection(D&I) Companies

VENDOR: The firm or person who will fabricate the equipment or

material.

EXECUTOR: Executor is the party which carries out all or part of

construction and/or commissioning for the project.

THIRD PARTY INSPECTOR (TPI): The firm appointed by EPC CONTRACTOR and

approved by GC & CLIENT (in writing) for the

inspection of goods.

SHALL: Is used where a provision is mandatory.

SHOULD: Is used where a provision is advisory only.

WILL: Is normally used in connection with the action by

CLIENT rather than by an EPC/EPD CONTRACTOR,

supplier or VENDOR.

MAY: Is used where a provision is completely discretionary.



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#### 2.0 SCOPE

This document defines emission and effluent list for Binak Compressor Station to process sour gas from Golkhari booster/cluster and Binak production unit with cumulative rate of 15 MMSCFD. The new compressors will be added "future" section of existing Binak compressor station plant. Excluding electrical power, which is supplied from existing facilities.

#### 3.0 NORMATIVE REFERENCES

#### 3.1 Local Codes and Standard

IPS-E-SF-860: Engineering Standard for Air Pollution Control

IPS-E-SF-880: Engineering Standard for Water Pollution Control

IPS-G-SF-130: General Standard for Disposal of Solid Waste

IPS-G-SF-860: General Standard for Air Pollution Control

IPS-G-SF-870 General Standard for Soil Pollution Control

IPS-G-SF-880 General Standard for Water Pollution Control

IPS-C-SF-550: Application Standard for Safety Boundary Limit

#### 3.2 International Codes and Standards

Not Applicable. Abbreviations

#### 3.3 The Project Documents

BK-GCS-PEDCO-120-PR-UF-0001 Utility Flow Diagrams (UFD)

BK-GNRAL-PEDCO-000-PR-DB-0001 Process Basis of Design

#### 3.4 Environmental Data

Refer to "Process Basis of Design"; Doc. No. Process Basis of Design BK-00-HD-000-PR-DB-0001

#### 3.5 Order of Precedence

In case of any conflict between the contents of this document or any discrepancy between this document and other project documents or reference standards, this issue must be reported to the CLIENT. The final decision in this situation will be made by CLIENT.



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#### 4.0 ABREVIATIONS

EIED: Energy Industries Engineering and Design

NISOC: National Iranian South Oil Company

PFD: Process Flow Diagram

P&ID: Piping and Instrumentation Diagram

BFPD: Barrel Fluid Per Day

#### 5.0 EMISSION AND EFFLUENT LIST

Based on BINAK New Compressor Gas Station project, following emission list is expected with the project:

#### 5.1 Emission from Flare Stack

Continues flaring is not applicable to BINAK New Compressor Gas Station project.

Expected continues flare flow gas (only pilot fuel gas and flare stack purge gas): 26 kg/hr

Emergency Flaring condition: 18888 kg/hr as unburnt hydrocarbon flow (Blocked outlet scenario from station outlet), refer to duty specification for LP flare package for more detail (BK-GCS-PEDCO-120-PR-SP-0003)

#### 5.2 Emission from Burn Pit

Continues flow to the burn pit is not applicable to BINAK New Compressor Gas Station project.

Only two intermittent flow send to existing burn pit: 2 m³/hr from close darin pump and 3 m³/hr from flare k.o. drum pump.

### 5.3 Surface runoff from possibly contaminated areas (parts of process)

Accidentally Oily Contaminated Water Sewer, which collect water, which may be polluted by hydrocarbon products (e.g. Rain and/or fire water in process, utility and paved areas). Refer to Drainage Philosophy (BK-GCS-PEDCO-120-PR-PH-0001) for more detail. Contaminated oily water is collected in SU-2202 which is transferred by gravity or road truck. It Preliminary composition is as follow:

Oil, Hydrocarbons: 10 - 2000 mg/l

TSS (Total Suspended Solids): 1000 mg/l

TDS (Total Dissolved Solid): < 100 mg/l

pH: 6-8



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### 5.4 Sanitary sewage from control building

The sewer shall be directed by gravity to a Septic pit equipped with a pump for filling of water road-tankers, Refer to Drainage Philosophy (BK-GCS-PEDCO-120-PR-PH-0001) for more detail. Expected flow and composition:

Per operator working in the plant to be expected:

Flow: 100 l/day BSB5: 40 g/day CSB: 80 g/day