



Norabad Gas Compressor Station Project on IGAT X

Contract No.:TH-ME-AC-009





| AAC |
|--------------|
| 14/44 |
| day division |

| Document Title: | Packing, Shipping, Handling & Storage Procedure | | | | | | | | | |
|------------------------|---|-------|-------|------|------|------|--|--|--|--|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | | | | |
| | 286 | 101 | ME | PR | 038 | D00 | | | | |

Page: 1 of 11



Packing, Shipping, Handling & Storage Procedure

| D00 | 24/06/2020 | ISSUED FOR COMMENT | A.Tayebi | M.Abbaszadeh | P.Karimizadeh | A.Shabaani |
|------|------------|--------------------|----------|--------------|---------------|------------|
| REV. | DATE | DESCRIPTION | PREP. | CHEC. | APPR. | PROJ MGR. |





Contract No.:TH-ME-AC-009

Norabad Gas Compressor Station Project

on IGAT X





AAC

| Document Title: | Pa | Packing, Shipping, Handling & Storage Procedure | | | | | | | | |
|-----------------|-------|---|-------|------|------|------|--|--|--|--|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | | | | |
| Document No | 286 | 101 | ME | PR | 038 | D00 | | | | |

Page: 2 of 11

CHANGE RECORD SHEET

| | 1 | 1 | _ | | _ | 1 | | | | | | |
|----------|-----|-----|-----|------|-----|--|-----|---|------|--|-----|--|
| PAGE | D01 | D02 | D03 | PAGE | D01 | D02 | D03 | 1 | PAGE | D01 | D02 | D03 |
| 1 | | | | | | | | | | | | |
| 2 | | | | | | | | | | | | |
| 3 4 | | | | | - | | | - | | | | - |
| 5 | - | | | | - | | | | | | | - |
| 6 | | | | | | | | | | | | |
| 7 | | | | | | | | | | | | |
| 8 | | | | | | | | | | | | |
| 9 | | | | | | | | | | | | |
| 10 | | | | | | | | | | | | |
| 11 | | | | | | | | | | | | |
| 12 | | | | | | | | | | | | |
| 13 | | | | | | | | | | | | |
| 14 | | | | | | | | - | | | | - |
| 15 16 | | | | | - | | | - | | | | - |
| 17 | | | | | + | | | | | | | |
| 18 | | | | | | <u> </u> | | | | <u> </u> | | |
| 19 | 1 | | | | | | | | | | | |
| 20 | | | | | | <u> </u> | | | | <u> </u> | | |
| 21 | | | | | | | | | | | | |
| 22 | | | | | | İ | | | | İ | | |
| 23 | | | | | | | | | | | | |
| 24 | | | | | | | | | | | | |
| 25 | | | | | | | | | | | | |
| 26 | | | | | | | | | | | | |
| 27 | | | | | | | | | | | | |
| 28 | | | | | | | | | | | | |
| 29 | | | | | - | | | | | | | |
| 30 | | | | | | | | | | | | |
| 31 32 | | | | | | - | | - | | - | | |
| 33 | | | | | + | | | | | | | |
| 34 | | | | | | | | | | | | |
| 35 | | | | | | | | | | | | |
| 36 | | | | | | | | | | | | |
| 37 | | | | | | | | | | | | |
| 38 | | | | | | | | | | | | |
| 39 | | | | | | | | | | | | |
| 40 | | | | | | | | | | | | |
| 41 | | | | | | | | | | | | |
| 42 | ļ | | | | | | | | | | | ļ |
| 43 | | | | | | | | | | | | |
| 44 | 1 | | | | | | | - | | | | |
| 45 46 | 1 | | | | | | | - | | | | |
| 46 | | | | | | - | | - | | - | | — |
| 48 | 1 | | | | | | | - | | | | |
| 49 | | | | | | | | - | | | | |
| 50 | | | | | | † | | | | † | | |
| 51 | | | | | | | | | | | | |
| 52 | | | | | | <u> </u> | | | | <u> </u> | | |
| 53 | | | | | | İ | | | | İ | | |
| 54 | | | | | | | | | | | | |
| 55 | | | | | | | | | | | | |
| 56 | | | | | | | | | | | | |
| 57 | | | | | | | | | | | | |
| 58 | | | | | | | | | | | | |
| 59 | | | | | | | | | | | | |
| 60 | | | | | | | | | | | | |
| 61 | ļ | | | | | | | | | | | ļ |
| 62 | |] | | | | l | | | | l |] | |





AAC

Norabad Gas Compressor Station Project on IGAT X

Contract No.:TH-ME-AC-009





| Document Title: | Pa | Packing, Shipping, Handling & Storage Procedure | | | | | | | | |
|------------------------|-------|---|-------|------|------|------|--|--|--|--|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | | | | |
| Document No.: | 286 | 101 | ME | PR | 038 | D00 | | | | |

Page: 3 of 11

Table of Contents

| 1. | Scope4 | ļ |
|-----|----------------------------------|----------|
| 2. | Definition4 | Ŀ |
| 3. | Packing5 | ; |
| 4. | BUNDLING5 | ; |
| 5. | MARKING5 | ; |
| 6. | COLOR CODING | , |
| 7. | TRAFFIC, STORAGE AND WAREHOUSING | <u>'</u> |
| 8. | Storage and Warehousing | } |
| 9. | Importation and Duties9 |) |
| 10. | Packing List9 |) |



Contract No.:TH-ME-AC-009





| Document Title: | Document Title: Packing, Shipping, Handling & Storage Procedure | | | | | | | |
|------------------------|---|-------|-------|------|------|------|---------------|--|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 4 of 11 | |
| | 286 | 101 | ME | PR | 038 | D00 | | |

1.Scope

The intent of this procedure is to present the minimum requirements and procedures for the protection of material and equipment during ocean shipment, overland transportation and storage at site. It is intended to serve as a guide for minimum requirements, and it shall be the Vendor's responsibility to determine if physical characteristics of items being packed will require more than these minimum standards to ensure safe arrival at their ultimate destination. When portions of this specification are not applicable, the best commercial export packing methods to attain comparable protection shall be used. In all cases, material will be prepared for shipment to withstand multiple handling, storage, exposure to rain, salt spray and outside storage for two (2) years.

2.Definition

Client: Iranian Gas Engineering & Development Company hereafter named I.G.E.D.C.

Consultant: Farayand Sazan Energy Consultant Company hereafter named as FSEC

Project: Three Gas Compressor Stations Project on IGAT X

Purchaser/ EPC Contractor: Party which carries out all or part of procurement for the project which to be specified later. Here is Hirgan Energy.

Vendor: Party which manufactures or supplies equipments & performs the services & duties specified by purchaser. Here is Aban Air Cooler (AAC).

3. Packing



Contract No.: TH-ME-AC-009





| Document Title: | Pa | Packing, Shipping, Handling & Storage Procedure | | | | | | | | |
|-----------------|-------|---|-------|------|------|------|--|--|--|--|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | | | | |
| Document No.: | 286 | 101 | ME | PR | 038 | D00 | | | | |

Page: 5 of 11

- 3.1. When consolidating material in a box or crate, all items shall be packed or nested to reduce volume as much as possible. All items shall be braced and/or cushioned as necessary within the container to prevent damage from shock, vibration, and rough handling.
- 3.2. Spare parts must be separately boxed.
- 3.3. Containers shall be packed in such a manner to insure and even distribution of weight within the case where possible. All cases will bear warning sign on the outside denoting the center of gravity. Top-heavy containers will be so marked as either "Top-Heavy-End".
- 3.4. Heavy items should be securely blocked and braced to prevent damage to lighter materials packed in same box. Heavy items, where possible shall be packed on the bottom with lighter items on the top.

4. BUNDLING

- 4.1.All items shall be segregated to length (random acceptable) and size and bundled. Weight of each bundle should not exceed 4,400 pounds.
- 4.2 Weight of each bundle or nest shall be within the breaking strength of the steel banding.
- 4.3 Heavy duty steel straps shall be placed at a minimum of 36" centers with the standard tool used for securing the band with a crimped steel seal.
- 4.4 All straight pipe 2-1/2" or under shall be bundled and boxed.

5. MARKING

5.1. The basic markings for all export packages is as follows:

Gross weight

Net weight

Metric units





Norabad Gas Compressor Station Project on IGAT X

Contract No.: TH-ME-AC-009





| Document Title: | Pa | cking, Ship | ping, Hand | lling & Sto | rage Proced | lure | |
|------------------------|-------|-------------|------------|-------------|-------------|------|---------------|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 6 of 11 |
| Document No | 286 | 101 | ME | PR | 038 | D00 | |

The consignee's completer name and address

The port of import in Iran

The origin

The purchase order number

The package number

The bill of material number

The dimensions

NOTE:

- a. Package numbers shall be consecutive
- b. Avoid duplication
- c. In all instance, dimensions shall be shown in order of length, width, and height.
- 5.2 All markings will be stencilled black (non-fading printer's ink and varnished) on two sides of each package using as a minimum a 1-1/2" block letter except where the container size will not permit.
- 5.3 In these instances a black letter of 1" will be used.
- 5.4 Containers shall be numbered starting 1 and follow consecutively, i.e. 2, 3, 4 & etc. until completion of project.
- 5.5 Care shall be taken that no marking is covered by strapping material which might subsequently be applied.
- 5.6 Bundles (pipe, steel shapes, etc) shall have markings applied on metal plates which shall be securely fastened to the bundles by steel bands.
- 5.7 Precautionary markings shall be stencilled in conspicuous places on the package if applicable to the protection of the contents.
- 5.8 Labelling and marking should be made of a durable material to withstand a reasonable amount



Contract No.: TH-ME-AC-009





| Document Title: | Pa | cking, Ship | pping, Hand | dling & Sto | rage Proced | lure | |
|------------------------|-------|-------------|-------------|-------------|-------------|------|---------------|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 7 of 11 |
| Document No.: | 286 | 101 | ME | PR | 038 | D00 | |

of rubbing. Where they are liable to come into contact with grease, dirt or moisture, they should be protected by means of a transparent, self adhesive, cellulose film, or a coat cellulose lacquer varnish, if not to be enclosed in a sealed polyethylene envelope.

- 5.9 Where an adhesive is to be used for affixing the label, it is essential that this should be of suitable type and quality, and sufficient time should be allowed to permit it to dry before the package is dispatched.
- 5.10 Labels should be affixed in a position where they are not likely to be ripped of when the container is man-handled.

6. COLOR CODING

- 6.1 All shipping containers shall be color coded on at least two (2) corners in accordance with the following sketch: 6" minimum from corner
- 6.2 Paint color shall be green.

7. TRAFFIC, STORAGE AND WAREHOUSING

7.1 Insurance Relating to Shipment of Goods

The transit insurance for materials in transit shall be covered by EPC Contractor.

7.2 Freight Forwarding

The project will appoint project specific Freight Forwarders. The Freight Forwarders will be notified in advance of all traffic movements and will have sole responsibility for organizing, coordinating and monitoring the Materials and Equipment until safely received at site. All freight forwarding shall be executed in accordance with the Transport Traffic Plan.

One month prior to the shipment to the work site of the first item of equipment or materials to be used in the performance of the project, a shipping program covering all intended shipments



Contract No.:TH-ME-AC-009





| Document Title: | Pa | cking, Ship | | | | | |
|------------------------|-------|-------------|-------|------|------|------|---------------|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 8 of 11 |
| Document No.: | 286 | 101 | ME | PR | 038 | D00 | |

to the work site shall be submitted. Such program shall be related to the contract schedule and shall contain the following information:

- Description of items to be shipped
- Shipping weight(s) and dimensions
- Port of shipment
- Date of shipment
- Method of shipment
- Port of arrival
- Estimated date of arrival
- Method of transport from port of arrival to the work site.

This shipping program shall be kept up-to-date and shall be submitted periodically for information in accordance with project team instructions.

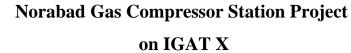
8. Storage and Warehousing

The general objective will be to minimize storage at the work site. Only those goods will be shipped to the work site that either can be immediately incorporated in the facility under construction or can be warehoused or laid down without creating significant space problems. Goods which are ready for delivery but which cannot yet be accommodated at the work site will be held at Vendor's works or at an intermediate storage area in the vicinity of the work site for an agreed period of time.

In special instances, storage options will be included in inquiries/purchase orders as appropriate. All aspects relating to warehousing at work site are the responsibility of the Construction Sub-contractor.

In principle, all major equipment will be shipped directly to the work site for immediate setting







Design & Inspection Co. Hirgan Energy Eng Co.

Contract No.: TH-ME-AC-009

| Document Title: | Pa | cking, Ship | ping, Hand | dling & Sto | rage Proced | lure | |
|------------------------|-------|-------------|------------|-------------|-------------|------|---------------|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 9 of 11 |
| Document No | 286 | 101 | ME | PR | 038 | D00 | |

on foundations.

9.Importation and Duties

Various items require an import permit. This import permit shall be in place/operable prior to shipment of these materials.

10. Packing List

A separate packing list documents will be issued for each package. 2 copies of packing list in water proof plastic envelope will be sent with the package.

For packing list see Attachment 2.





Norabad Gas Compressor Station Project on IGAT X

Contract No.:TH-ME-AC-009





| A | ì | ١ | V. | |
|-------|---|---|-----|--|
| Appr. | × | , | toc | |

| Document Title: | Pa | cking, Ship | | | | | |
|------------------------|-------|-------------|-------|------|------|------|----------------|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 10 of 11 |
| | 286 | 101 | ME | PR | 038 | D00 | |

Attachment1

| E F G H J K L H N | Centre of gravity Sling here Do not put sack tr Clamp here Haximum stack load Tight package (do Admissible range of | (| | | * |
|---|---|---|-----------------|---|----------|
| ^ | <u> </u> | F | 4 | L | |
| | I | G | ф | м | , .c. |
| c | J''' | H | <u>*</u> | N | % |
| 0 | * | , | * + | | |
| E | * | к | kg max. | | |





Norabad Gas Compressor Station Project on IGAT X

Contract No.:TH-ME-AC-009





AAC

| Document Title: | Pa | cking, Ship | ping, Hand | lling & Sto | rage Proced | lure | |
|------------------------|-------|-------------|------------|-------------|-------------|------|----------------|
| Document No.: | Proj. | Stat. | Disc. | Type | Seq. | Rev. | Page: 11 of 11 |
| Document No | 286 | 101 | ME | PR | 038 | D00 | |

Attachment2

| Aban Air Cooler CO, 2 nd entrance of Sadra new town, Dokootsda PO Box 71765/190 Staraz - Iran | | PACKING LIST | | | | | | Page : 1 OF 1 P.L. No. : 17138 - 00 Date : | | | |
|--|---|-------------------------|--------|---------------|-----------------|------|-----------------------------------|--|--|--|--|
| Tel: +98 711643 3000 Fax: +98 711 643 3033 | | | | | | | No : QF-57-23 & Rey : 1-1386/0 | 4/23 | | | |
| Client: | | | | | Project : | | | | | | |
| Fel / Fax / Mob : | | | | | Project No. : | | | | | | |
| Receptor (Mr. / Mrs.): | | | | | Contract No. : | | | | | | |
| Destination Address: | | | | | A. | | | | | | |
| Row Item No. | D | escription | | Part No. | Qty. | Unit | Pack NO. | Remark | | | |
| | | 500 | | | | - | | | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |
| | | | | | | | 0 | | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |
| | | | | - | | | | | | | |
| | | | | | | | | | | | |
| Total No.Of Qty. 1 | | 31 | Pes | Release Note | No. : | | | | | | |
| Total No.Of Pack : | | 1 | Pes | Bill OF Ladin | g No. : | | | | | | |
| Total Gross Weight : | | 1 | Kg. | Truck No . : | | | | | | | |
| AAC - WH | | A | AC - Q | C: | | 17 | Client | | | | |
| Prepared By: Date : | | Approved By : Date : | | | Approved Date : | By: | | | | | |
| Checked By Date : | | | | | | | | | | | |
| Approved By : Date : | J | | | | | | | | | | |
| Note: | | | | | | | | | | | |