## CENTRAL WAREHOUSING CORPORATION (A GOVERNMENT OF INDIA UNDERTAKING)

"WAREHOUSING BHAVAN"
4/1, SIRI INSTITUTIONAL AREA
AUGUST KRANTI MARG, HAUZ KHAS
NEW DELHI-110 016

## CIRCULAR

No.TQC/Storage Policy/2009-10

13th April, 2009

Sub: Security/Safety Measures for prevention of Fire Hazards at Warehouses – Instructions regarding

Consequent upon a bumper cotton crop and massive procurement under MSP operations by agencies like Cotton Corporation of India(CCI) and NAFED, a sizeable quantity of Pressed Cotton Bales have been received recently for storage at our warehouses. As on date, about 24 lakh Cotton Bales are under storage at our warehouses including those being run on management basis for CCI/NAFED. Cotton is a highly hazardous commodity from fire point of view. Detailed instructions have been issued from time to time emphasizing the safety/security measures required to be taken at the warehouses against any possible out-break of fire. In view of massive storage of Cotton Bales and ensuing summer months ahead, the instructions are once again reiterated below for strict compliance:

. For storage of hazardous/extra hazardous goods such as Cotton, Jute, Paper, Chemicals etc., it is necessary to obtain specific license/permission from local Civic authorities/appropriate authorities of the State Government/Fire Service Department. The godown may also be got inspected by these authorities so as to take advantage of their suggestions for any improvement needed.

Such commodities including Cotton Bales should be stored strictly following the Code of Storage Practices already circulated. For ready reference, the CSP for Pressed Cotton Bales is enclosed.

There **shall** be no electricity connection to the godown storing Cotton Bales to avoid any possible fire hazard due to short-circuit. Electricity connection available, if any, **must be immediately got dis-connected**.

Sports Sports Const.

- 4. There **shall** be no operations in the Cotton storing godowns after the sun set and the operations should be undertaken only during day light.
- 5. Adequate number of Fire Extinguisher of appropriate type alongwith Fire Buckets filled with dry sand and water, **double the norms**, should be placed at wanted point.
- 6. Adequate "No Smoking" boards in English, Hindi and local language should be prominently displayed in the godown and throughout the Complex and the staff and the labourers, Lorry Drivers etc. working in the warehouse be made to strictly comply with the instructions.
- 7. The warehouse staff should be made fully conversant with the operation of the Fire Extinguishers. Mock Fire Drills may be got organized with the help of local fire authorities from time to time.
- 8. The Fire Extinguishers should be subjected to hydraulic pressure test at periodic intervals, besides re-charging once in a year as per the procedure in vogue.
- 9. In the warehouses where Cotton Bales are in storage, static tank should be provided and sufficient quantity of stored water should be available all the times for emergency use.
- 10. Entry of un-authorised persons into the warehouse storing Cotton Bales should be totally stopped.
- 11. Telephone Nos. of local Fire Brigade, Police Station, Residence/Mobile No. of Warehouse Manager/Regional Manager etc. should be prominently displayed in the warehouse office and on the Chowkidar Duty Register for reference on emergency. Warehouse telephone should be accessible to the Chowkidar on duty.
- 12. Loose Cotton is extremely hazardous and, therefore, should not be allowed to accumulate in the godown. Loose Cotton getting collected during operations be immediately put in pressed gunny bags and disposed off as frequently as possible.

- 13. At times, the representative of the depositors/buyers of Pressed Cotton Bales draw samples for marketing purposes. Such sampling should be undertaken only on specific request from the depositor and with the approval of the Warehouse Manager and undertaken in the presence of TA/JS/Godown Incharge. The bales should also be brought outside the godown for the purpose of sampling and sampling should not be undertaken on the stack itself.
- 14. Handling of Cotton Bales during receipt/delivery/sampling operations need to be done carefully to avoid any friction of iron strips on the Pressed Cotton Bales as such friction may generate sparking resulting in fire hazards.
- 15. Godowns storing Cotton Bales should not be opened unless warranted for operations. Opening and closing of the godown should be properly documented in the Godown Opening/Closing Register indicating the time, purpose and the officials in whose presence the godown was opened/closed.

The Warehouse Managers and staff are advised to follow the above instructions scrupulously to avoid any possible fire hazard, since such accidents not only cause financial liability to the Corporation but also seriously affect the reputation of the Organisation as a National Storage Agency.

Receipt of this Circular be acknowledged to DGM(Technical).

Hindi version follows.

(B.B. Pattanaik)

Chairman & Managing Director

Encl: as above.

## Distribution:

All the Warehouse Managers.

Copy to:

1. All/Regional Managers

2. GM(Com)/GM(F&IA)/DGM(Tech), CWC, CO, New Delhi.

Copy also to D(F)/D(P) for information.

## CODE OF STORAGE PRACTICES FOR FULLY PRESSED COTTON BALES

Fully pressed cotton bales on large scale are being offered for storage in our warehouses.

The fibre strength of the bales is greatly influenced during storage. Cotton fibre is a delicate material with hazardous properties when it is in loose form and attracts termite in-festation quickly even in pressed condition during storage. Hence great care is required for its safe storage and preservation. The following guidelines given need to be followed in persuing this method.

- 1. The godowns as far as possible should be fire proof as cotton bales are susceptible to great fire hazard. It should preferably have RCC roof, masonary wall and ventilators and doors should be made out of metal instead of wood. Construction should be such that godowns could be made air tight during monsoon.
- 2. It should also be ensured that they are rat and termite proof and there is no ground seepage or roof leakage. Plinth of the floor should be sufficiently high and moisture proof. It may also be ensured that the drainage system perfect so that no water is allowed to percolate or drench the bottom layer of the stocks. Cotton fibre being hygroscopic deteriorates in wet condition.
  - 3. Before accepting custom, the floor wall and columns should be smeared with tar or curosite paint and or treated with chloropyriphos spray to arrest termite infestation.
    - Only cotton offered in bales is to be accepted for storage. Normally each cotton bales is of 4.25'x 2.5' size and in a space of 25'x6%' about 100 bales can be accommodated if stored eight bales high. In view of the high variation in various characteristic of the bales offered for storage will be accepted on "said to contain basis" only.

- 5. Wooden crates treated with tar or curosite paint are ideal dunnage for cotton. If sufficient number of crates are not available, a layer of polythene film sandwitched between two layers of matting must be used.
- Cotton bales are to be stacked according to station, quality and press-receipt, number-wise ensuring maximum utilsation of space in leaving alleway space. The safe stack height is 8 layers only.
  - Proper stack cards should be provided bearing necessary particulars of the source of supply of consignment variety as declared by the depositor colour of lint besides usual informations. This is neessary in order to facilitate drawing of samples and sale of stocks by the depositor. As lint of different varieties of cotton varies and fetches different prices in the market the identity of each lot of consignment may be kept separately if the depositors so desires.
    - The bales must not be stacked against the walls. A passage of 2' should be given all round the stack for aeration and main haulage alleyway should not be less than 4'5" for operational purposes. The bales should not be stacked within 8' from the nearest door as per insurance requirements.
- 9. Extreme care and precaution is required for safe preservation of cotton. Proper godown hygienes is a pre-requisite. In case of bursting of bales in storage, these should be reweighed separately at the time of removal of goods from the godowns.
- 10. Moisture is the main enemy of cotton during storage. Excessive moisture in the fibre results in discolouration of its texture, loss of lustre and tensile strength of the fibre.
- 11. Proper aeration of cotton bales, is therefore, essential to check the humidity and temperature in the godowns.

- 12. The godowns should be inspected regularly and at least once in a week to detect termite infestation.
- 13. To prevent termite infestation alleyway space should be closely watched for termite tunnels. As a prophylactic measure spraying of walls and floor with chloropyriphos at fortnightly intervals is recommended which is also effective in keeping termites away. In case of regular incidence, the godown should be fumigated with Aluminium Phosphide at the prescribed dosage in perfect airtight condition.
  - 14. Rat trouble may also be observed in cotton godowns. Poison baiting at regular intervals and rat caging will prevent the rodent attack.
    - 15. Loose cotton lint is extremely hazardous in nature. All precautions and safeguards should, therefore, be taken to avoid bursting bales to prevent fire in cotton godowns. Pressed bales are less hazardous than the loose lint. The workers entering the warehouse should not carry match box, lighters, cigarettes etc. Fire extinguishers and allied equipments should be provided as required under insurance rules. Bales at the door points should be covered with polythene sheets to prevent damage due to flash of rain.