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# CHEMICAL MANAGEMENT POLICY

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**Companies:** Jiangmen Yixin Tanning Co. Ltd  
Jiangmen TecTuff Co. Ltd

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- ❖ **The Chief Technical Manager is responsible for the implementation of the Chemical Management Policy as per the guidelines set forth in the Chemical Management Policy.**

## 1. RULE TO SELECT CHEMICAL SUPPLIERS

2. All chemical suppliers should provide their profile details before Asiatan/TecTuff makes any purchases from the supplier.
3. Profile details should consist of company name, facility details, any certification for environmental and productivity, category of products supplied and their lead time. All details should be registered in Asiatan/TecTuff company format.
4. All chemical suppliers should submit annually a restricted substance free certificate on their company letter head, based on ZDHC MRSL.
5. If any chemical company does not have their format, Asiatan/TecTuff can provide them with Asiatan/TecTuff MRSL standard format to sign, stamp & submit.
6. The chemical company should email us the copies of the product literatures and MSDS for every chemical purchased, which is documented and filed.
7. The literature and MSDS should consist of details of the raw material used, character, solid content and any details for safe handling of the chemical and its classification.
8. Asiatan/TecTuff will not buy any chemicals from a chemical company which fails to provide the above mentioned required details.
9. New chemicals should be used in samples and tested before being used in production.
10. Auto generated chemical inventory report with name of chemical & chemical supplier name, quantity used, quantity in inventory and average annual consumption is produced daily.

## 2. RULE TO SOURCE CHEMICALS

1. We should collect literature, MSDS in both Chinese/English for all chemicals at the sample stage itself.
2. All chemicals should consist of labels clearly mentioning the name of the chemicals, category, weight and expiry date.
3. Asiatan/TecTuff tries to source chemicals that have at least a 6-month shelf life.
4. Chemicals should be bought based on the 6-month projection given by the marketing/sales team.
5. Asiatan/TecTuff should keep minimum of 2 months chemical inventory for chemical purchased in China/ Hong Kong.
6. Asiatan/TecTuff should keep minimum of 3-4 months chemical inventory for chemical purchased overseas from countries like Italy/Spain/Germany.
7. All chemicals should be checked for solid content in Asiatan/TecTuff's lab.
8. Any damage in the packing of chemicals should be immediately addressed. If the chemicals are found to be not usable, it should immediately be returned to the chemical supplier and replaced.
9. Only Chemical Suppliers that can provide the relevant documentation such as MSDS, TDS, MRSL compliance certificate or test reports will be eligible to source chemicals from. Any Chemical supplier that cannot provide the documentation is not eligible to source chemicals from.

## 3. DOCUMENTATION TO BE PROVIDED BY CHEMICAL SUPPLIERS

- Free of Restricted Substance certificate
  - Product Literature (Both in Chinese and English)
  - MSDS (Both in Chinese and English)
  - Composition, Appearance, Solid %, water % for Chinese Customs (Both in Chinese and English)
  - List of any SVHC listed chemicals and its details.
  - List of any Phthalates presence.
1. The above-mentioned documents will be stored electronically by purchasing department and technical department.
  2. Purchasing department will print out copy and file for safety requirements and ASIATAN/TECTUFF records.
  3. Suppliers must submit any updated version of the required documents for record

#### 4. COMPLIANCE OF CHEMICALS USED IN PRODUCTION

1. Asiatan/TecTuff has its own MRSL standards using ZDHC MRSL as a standard guidance for its limits/testing methods.
2. By following and testing all the tannages/ finished leather types by the Nike standard, we make sure the chemicals used and the leathers shipped out follow the most stringent RS standards.
3. A general chart is made to assess the possibilities of the source of the restricted substance presence in different chemicals.
4. Basic knowledge should be provided to all the technicians/foremen who are involved in the development of any new leather or choosing chemicals into the process.
5. Both wet-end and finishing department should make a complete information chart of the chemicals they use with supplier names, description, tannage/finish type, etc.
6. A flow chart which gives indication of the restricted substance risk and release should be made for both wet-end and finishing department.
7. All chemicals should be accessed for chemical hazardous assessment by checking the CAS number and if any safety handling guidance/storage is needed, the handling staff should be educated.
8. All the employees who handle chemicals should be trained. they should be equipped with the skill to deal with chemical leakage issues.
9. Chemical Leakage Drill should be drawn twice a year.
10. No chemical could be released without any pre-treatment.

### 4.1 MRSL POLICY FOR CHEMICALS

1. All chemical suppliers should provide Asiatan/TecTuff annually with a declaration/certificate stating that the chemicals procured from them are MRSL free based on ZDHC standards.
2. Leathers of major tannages/ finish types are sent for FULL Test at least once a year. A Pass Result confirms that ASIATAN/TECTUFF MRSL Standards are being complied with by all chemicals that are used in production of these leathers.
3. Purchase order for chemicals should contain confirmation of MRSL requirements to be followed by chemical supplier.
4. If supplier fails to adhere to these requirements, Asiatan/TecTuff reserves the right to claim any loss that might arise from the purchase or use of those chemicals in production.
5. New chemicals that are to be introduced into the production process are tested by sending the leather it is used in for a FULL TEST.
6. A Pass Result in the Full Test confirms that the new chemical is compliant with Asiatan/TecTuff MRSL standards and can be introduced into production. A FAIL Result needs to be analyzed and reasons for the failure should be assessed and re-tested.
7. All testing should be done at a 17025 accredited lab. The lab should provide Asiatan/TecTuff with a copy of their 17025 accreditations for documentation.
8. Suppliers must submit any updated version of the required documents for record and provide us annually for a Free of Restricted Substance Certificate.

## 4.2 CHROME VI POLICY FOR CHEMICALS

1. All chemical suppliers should provide Asiatan/TecTuff annually with a declaration/certificate stating that the chemicals procured from them are chrome VI free based on Asiatan/TecTuff standards. (limited to 0-3 ppm per Asiatan/TecTuff's MRSL standards)
2. Chrome based chemicals are sent to an accredited third-party lab for testing to confirm chrome VI declaration made by supplier.
3. Major tannages in wet-end and all kinds of finished leather are sent for full test at least once a year, through which absence of chrome VI during production process can be further confirmed.

## 4.3 UNSATURATED FAT

1. Unsaturated fat content in fat liquors/oils/waxes which leads to formation of chrome VI will be determined based on iodine value. The acceptable limit of iodine value is less than 50.

## 4.4 INTERNAL TESTING

1. Chemicals are periodically checked for their solid content where applicable in Asiatan/TecTuff lab at least once a year.
2. The results of the solid content testing are documented.
3. Check viscosity of chemicals where applicable at least once a year and document the results.

## 4.5 COLORWAY TESTING FOR CHROME VI/HEAVY METALS

1. Suppliers are responsible for providing pigments/dyes declaration to make sure that it can pass all heavy metals including chrome VI.
2. By testing major tannages/finishes/colors we make sure that all our pigment/dyes are being tested for all heavy metals including chrome VI.



3. Full testing and color way testing for different testing request from brands helps to test all dyes/pigments for heavy metals including chrome VI.
4. Chrome powder used in wet-end process should be tested for chrome VI.

### 5. STANDARD OF PROCESS FOR CHEMICALS

1. All chemicals should be checked for packing, expiry dates and physical appearance.
2. Any inconsistencies should be brought to the notice of the production manager.
3. All chemicals should be checked for solid content and if an inconsistency is found, it should be brought to the notice of the production manager.
4. If a chemical is found to be less in concentration, a complaint is made to the chemical company. The chemical company is asked to resolve the issue, or else the chemical is returned.
5. All chemical and chemical company performance should be assessed and reviewed quarterly by the department technician.
6. Any chemical company that fails to score more than 85% on the critical section overall review should be discontinued.
7. Any chemical company that fails to score more than 75% on the secondary sections review should be discussed. A failure to improve on the secondary section for the following quarter will result in discontinuation of purchasing from that chemical supplier.
8. We do not have any chemical testing lab to test the chemical standards of the chemicals.
9. So annual certification for restricted free chemical certification should be done for all chemicals.
10. Periodically check chemicals used in production for formaldehyde and heavy metal content.
11. Leathers of regular tannages/finishes are sent for FULL Test at least once a year. A Pass Result confirms that ASIATAN/TECTUFF MRSL Standards are being complied with by all chemicals that are used in production of these leathers.

## 6. CHEMICAL MANAGEMENT POLICY

### 6.1 FIRST IN – FIRST OUT

1. All newly arrive chemical should only be unloaded in chemical warehouse.
2. Asiatan/TecTuff's Chemical Policy is First In – First Out is based on the expiry date of the chemicals. Chemicals are stored and strictly issued based on this First In-First Expired-First Out system.
3. Asiatan/TecTuff tries to source chemicals that have at least a 6-month shelf life.
4. Chemicals should be bought based on the 6-month projection for production of leather given by the marketing/sales team and brand forecasts.

### 6.2 INSPECTION

5. On arrival, chemicals are identified by the bill of loading, the labelling and the chemical safety data sheet provided by the supplier.
6. Their characteristics are checked as per information for quantity and condition. If the chemicals are not in good condition or packaging is damaged, or if for any reason, they seem to present a hazard, they will be returned to the supplier.
7. If the chemicals are found to be not usable, it should immediately be returned to the chemical supplier and replaced.

### 6.3 LABELING

8. If the chemical is consistent with provided details, an Asiatan/TecTuff internal Label with Name of Chemical, Package #, Quantity of Chemical, Date Received and Date of Manufacture and Date of Expiry is placed on the chemical container.

### 6.4 INVENTORY MANAGEMENT

9. Asiatan/TecTuff uses a Chemical Inventory Management System for efficient use of current stocks, prevent excess inventory stock and to minimize wastage.
10. The chemical purchases, quantity of chemicals in stock and shelf life are tracked via the Chemical Inventory Management System.
11. On issuing material, warehouse foreman copies the internal label and enters appropriate data into the chemical management system to track quantities and inventory stocks.

12. The data is cross-checked manually and electronically by other personnel and reported to department technicians for verification and inventory stock planning.

## 7. CHEMICAL WAREHOUSE POLICY

1. The Warehouse keeper and all employees handling chemicals are **trained** to maintain safe work practices such as the use of appropriate **PPE** and to follow proper guidelines and procedures.
2. On arrival, chemicals should be identified, and quantity verified by bill of loading, labeling and **MSDS** provided by supplier.
3. If condition of chemicals is not in good condition or packaging is damaged, decline to take possession of the chemicals and return to the supplier.
4. All Chemicals should be classified, appropriately labeled and stored based on MSDS provided by supplier.
5. Chemicals classified as **Flammable/Dangerous/Corrosive must be isolated** and warehoused separately at a safe distance from other chemical storage and work areas.
6. Access to chemical warehouse should be restricted to trained and authorized employees.
7. A **CHEMICAL REGISTER** should be maintained consisting of the chemical inventory and Safety Data Sheets for all chemicals.
8. Relevant signage should be clean and displayed in Chinese and English in appropriate storage areas.
9. **FIFO** (First In – First Expired - First Out) policy should be followed based on expiration dates to minimize risk of deterioration of chemicals, packaging and labels.
10. Chemical containers should be frequently **inspected** for damage or leakage. **Special care** should be taken during transportation to avoid damage and leakage.

11. Passages, drainage access, exits, emergency & fire equipment must be clear of obstructions.
12. Chemical containers must be arranged to allow **easy access** for inspection, handling and firefighting.
13. Floors should be clean, dry and free of any spillage. Roof should be in good condition with no obvious signs of leakage.
14. Warehouse should be **well ventilated** and **well-lit** by natural or mechanical means.
15. All electrical equipment must be properly located and positioned to avoid accidental damage by vehicles, pallets or water.
16. All emergency, fire and safety related equipment must be checked at least once a month to make sure they are maintained in good working condition. Records should be kept.
17. All wastes including packaging material, broken pallets etc., must be disposed in a safe, environmentally friendly manner.
18. Housekeeping and proper cleaning must be done after work daily.
19. Keep Fire Extinguishers near storage areas. They should be visible and within easy reach
20. All transactions should be recorded and stored for report preparation.
21. In case of a fire or emergency, Fire Safety Procedures and **Emergency Response Plan** must be initiated based on training provided and Emergency Response Procedure and Guidelines should be followed.
22. . Racks should be labeled with the weight limits and in good condition. Liquid Chemicals should not be stored above powder chemicals. Chemicals should not be stored more than 3 units high.

23. Incompatible chemicals should not be stored together.

CHEMICAL MANAGEMENT POLICY

## 8. DANGEROUS/FLAMMABLE/CORROSIVE CHEMICALS POLICY

1. Asiatan/TecTuff tries to replace dangerous/flammable/ corrosive chemicals with less dangerous chemicals. These chemicals should be easily identifiable by their chemical label and MSDS should be on file.
2. Special care and precautions should be taken while handling chemicals with these classifications.
3. Chemicals with these classifications should be isolated, segregated and stored in secure containers separately from the rest of the chemical inventory.
4. Use of PPE as per MSDS such as gloves, aprons, and eye protection is mandatory.
5. Dispose of flammable/dangerous/corrosive chemicals with an authorized government disposal agency.
6. Follow all other procedures as described in the MSDS and general chemical warehouse storage guidelines.
7. Flammable chemical warehouse should be equipped with gas alarm meter.

## 9. CHEMICAL MIXING ROOM POLICY

1. All containers should be labeled with their chemical content and expiry date.
2. Containers should be **regularly inspected** for leakages and spillage and placed on pallets. Floors should be regularly cleaned and should be dry and spillage free.
3. Use of appropriate **PPE** such as gloves, mask, eye protection, and apron are mandatory.
4. Electronic scales should be calibrated internally monthly once and records kept. Wetend and TecTuff Weighing scale should be calibrated at least annually by an authorized 3rd party and records kept.
5. While transporting chemicals in containers from mixing room to the work floor, wheel barrow with a **safety harness** should be used to avoid spillage.
6. Container should have chemical mixing ticket when being transported from mixing room and used on work floor.

### 10. ACTION PLAN FOR EXPIRED CHEMICALS

1. ASIATAN/TECTUFF uses a Chemical Inventory Management System to keep track of quantities and expiry date of chemicals.
2. Asiatan/TecTuff tries to source chemicals that have at least a 6-month shelf life.
3. Chemicals should be bought based on the 6-month projection for production of leather given by the marketing/sales team.
4. Chemicals are strictly issued on a First In – First Expired – First Out basis
5. In occasional cases, where the chemical cannot be used up before its expiry date, Asiatan/TecTuff isolates the expired chemicals from other chemicals.
6. The Chemical Supplier is contacted to check if the chemical can be reactivated and if the expiry date can be extended for a few months by reactivation.
7. If the Chemical supplier cannot provide a method to extend the expiry date of the chemicals, Asiatan/TecTuff uses a government authorized Disposal Agent to legally dispose the expired chemicals.