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NOTIFICATION

No.A.49011/2/2012-LE&IT, the 24th February, 2015. the Mizoram Factories Rules, 2014.

The Governor of Mizoram is pleased to notify

By order etc.

Rodney L. Ralte,

Principal Secretary to the Govt. of Mizoram, Labour, Employment & Industrial Department.

MIZORAM FACTORIES RULES, 2014

In exercise of the powers conferred by Section 112 of the Factories Act, 1948, (LXIII of 1948), the Governor of Mizoram is pleased to make the following rules, namely:-

CHAPTER I: PRELIMINARY

1. Short title, extent and commencement:-

- (1) These Rules may be called the Mizoram Factories Rules, 2014.
- (2) These Rules shall extend to the whole of Mizoram.
- (3) They shall come into force as may be notified by the State Government in the Official Gazette and different rules may apply at different dates.
- **2. Definitions:-** In these Rules unless there is anything repugnant in the subject or context:-
 - (a) "Act" means the Factories Act, 1948.
 - (b) "Appendix" means an appendix appended to these Rules.
 - (c) "Artificial Humidification" means the introduction of moisture into the air of a room by any artificial means whatsoever, except the unavoidable escape of steams or water vapour into the atmosphere directly due to a manufacturing process:

Provided that the introduction of air directly from outside through mist end mats or screens placed in openings at times when the temperature of the room is 80 degrees or more, shall not be deemed to be artificial humidification.

- (d) "Belt" includes any driving strap or rope.
- (e) "Degrees" (of temperature) means degrees in the Fahrenheit scale.
- (f) "District Magistrate" includes such other official as maybe appointed by the State Government in that behalf.
- (g) "Fume" includes gas or vapour.
- (h) "Health Officer" means the Municipal Health Officer or District Health Officer or such other official as may be appointed by the State Government in that behalf.
- (i) "Hygrometer" means an accurate, wet and dry bulb hygrometer conforming to the prescribed conditions as regards constructions and maintenance.
- (j) "Inspector" means an officer appointed under Section 8(13-A) of the Act and includes "Chief Inspector".

- (k) "Maintained" means maintained in an efficient state, in efficient working order and in good repair.
- (l) "Manager" means the person responsible to the occupier for the working of the factory for the purposes of the Act."State Government", means State Government of Mizoram
- (m) "State Government" means state Government of Mizoram
- (n) Words and expressions not defined but used shall have the same meaning as defined in the Act.

3. Competent Person:-

(1) The Chief Inspector may recognise any person as a 'Competent Person' within such area and for such period as may be specified for the purposes of carrying out tests, examinations, inspections and certification for such buildings, dangerous machinery, hoists and lifts, lifting machines and lifting tackles, pressure plants, confined space, ventilation system and such other process or plant and equipment as stipulated in the Act and the Rules made thereunder, located in a factory, if such a person possesses the qualifications, experience and other requirements as set out in the schedule annexed to this Rule:

Provided that the Chief Inspector may relax the requirements of qualifications in respect of a 'Competent Person' if such a person is exceptionally experienced and knowledgeable, but not the requirements in respect of facilities at his command:

Provided further that where it is proposed to recognise a person employed under the Chief Inspector as a 'Competent Person', concurrence of the State Government shall be taken and such a person after being so recognised, shall not have powers of an Inspector.

Provided further that the 'Competent Person' recognised under this provision shall not be above the age of 62 and shall be physically fit for the purpose of carrying out the tests, examination, inspection and to issue a certificate.

- (2) The Chief Inspector may recognise an institution of repute situated in Mizoram, having person possessing qualifications and experience as set out in the schedule annexed to sub-rule (1) for the purpose of carrying out tests, examinations, inspections and certification for buildings, dangerous machinery, hoists and lifts, lifting machines and lifting tackles, pressure plant, confined space, ventilation system and such other process or plant and equipment as stipulated in the Act and the Rules made thereunder, as a 'Competent Person' within such area and for such period as may be specified.
- (3) The Chief Inspector on receipt of an application in the prescribed form from a person or an institution intending to be recognised as a 'Competent Person' for the purposes of this Act and the Rules made thereunder, shall register, such application and within a period of sixty days of the date of receipt of application, either after having satisfied himself as regards competence and facilities available at the disposal of the applicant recognised the applicant as a 'Competent Person' and issue a certificate of competency in the prescribed form or reject the application specifying the reasons there of and such certificate as may be issued.

- (4) The Chief Inspector may, after giving an opportunity to the competent person of being heard, revoke the certificate of competency
 - (i) if he has reason to believe that a competent person-
 - (a) has violated any condition stipulated in the certificate of competency; or
 - (b) has carried out a test, examination and inspection or has acted in a manner inconsistent with the intent or the purpose of this Act or the Rules made thereunder; or has omitted to act as required under the Act and the Rules made thereunder; or
 - (ii) for any reason to be recorded in writing.

Explanation: For the purpose of this Rule, an institution includes an organisation.

- (5) The Chief Inspector may, for reasons to be recorded in writing, require recertification of lifting machines, lifting tackles, pressure plant or ventilation system, as the case may be, which has been certified by a competent person outside the states.
- **4. The Chief Inspector of Factories may require** for the purposes of the Act, submission of plans of any factory which was either in existence on the date of commencement of the Act or which has not been constructed or extended since then. Such plans shall be drawn to the scale showing:-
- (i) The site of the factory and immediate surroundings including adjacent buildings and other structures, road, drains, etc.
- (ii) The plan, elevation and necessary cross-sections of the factory buildings indicating all relevant details relating to natural lighting, ventilation and means of escape in case of fire, and the position of the plant and machinery, aisles and passageways; and
- (iii) Such other particulars as the State Government or the Chief Inspector, as the case may be, may require.

5. Approval of site and plan:

(1) No site shall be used for the location of a factory or no building in a factory should be constructed, reconstructed, extended or taken into use as a factory or part of a factory unless previous permission in writing is obtained from the Administrator or the Chief Inspector of Factories.

Applications for such permission shall be in **Form No. 4** and accompanied by the following documents:

- (a) A flow chart of the manufacturing process supplemented by a brief description of the process in its various stages.
- (b) Plans in duplicate drawn to scale showing:
 - (i) The site of the factory and immediate surrounding including adjacent buildings, and other structures roads, drains, etc.

- (ii) The plan elevation and necessary Cross-sections of the various buildings, indicating all relevant details relating to natural lighting, ventilation and means of escape in case of fire. The plans shall also clearly indicate the plant and machinery, aisles and passage ways; and
- (c) Such other particulars as the Chief Inspector may require.
- (2) If the Chief Inspector is satisfied that the plans are in consonance with the requirements of the Act he shall, subject to such conditions as he may specify approve them by signing and returning to the applicant one copy of each plan; or he may call for such other particulars as he may require to enable such approved to be given.
- **6. Application for registration and grant of license:-** The Occupier of every factory shall submit to the Chief Inspector of Factories an application in triplicate in the prescribed **Form No.2** for the registration of the factory and grant of a license.

7. Grant of Licence:-

- (1) A licence for a factory shall be granted by the Chief Inspector of Factories or any other officer appointed under sub-section (2-A) of section 8 of the Act and specially empowered in this behalf by the State Government, in **Form No.4** prescribed for the purpose, for a period of one year or five years, as may be requested in the application for registration and grant of licence and on payment of the fees specified in sub-rule (2).
- (2) The fees for grant of licence for one to five year shall be as specified in Schedule 1. In case an application for licence has been made for a period of five years, the licence fees shall be five times the fees payable for grant of a licence for one year, as specified in **Schedule I**.
- (3) A licence granted under this rule may, at the request of licensee, be renewed for one year or five years in accordance with the provisions of rule 9.
- (4) Every licencee as granted or renewed, shall remain in force upto 31st December of the year for or upto which it is renewed.

8. Amendment of Licence:-

- (1) A licence granted under rule 6 may be amended by the Chief Inspector of Factories or any other officer appointed under sub-section (2-A) of section 8 of the Act and specially empowered in this behalf by the State Government.
- (2) No licencee shall-
 - (i) Change the name of his factory; or
 - (ii) Employ persons in excess of the number stated in the licence; or
 - (iii) Use motive power in excess of the limits of horse power specified in the licence; without getting his licence amended.

- (3) A licensee who desires to have his licence amended shall submit it to the Chief Inspector or any other officer appointed under sub-section (3) of Section 8 of the Act and specially empowered in this behalf, with an application stating the nature of the amendment and reasons therefor.
- (4) The fee for the amendment of a licence shall be fifty rupees plus the amount (if any) by which the fee that would have been payable if the licence had originally been issued in the amended form exceeds the fee originally paid for the licence.

9. Renewal of licence:-

- (1) A licence may be renewed by the Chief Inspector of Factories or any other officer appointed under sub-section (2-A) of section 8 of the Act and specially empowered in this behalf by the State Government.
- (2) Every application for the renewal of a licence shall be made in triplicate, in **Form No. 5** together with the payment of fees for a period of one year or five years as the case may be, and shall be submitted not less than 30 days before the date on which the licence expires. If the application, complete in all respects, is so made, the premises shall be held to be duly licensed until such date as the Chief Inspector of the Factories or as the case may be, the Officer appointed under subsection (2-A) of section 8 of the Act and specially empowered in this behalf by the State Government, renews the licence.
- (3) The fees for the renewal of licence for one year shall be the same as for the grant thereof. In case an application for renewal has been made for a period of five years, the renewal fees shall be five times the fees payable for renewal of licence for one year, as specified in the Schedule appended below rule 7.

Provided that if the application for renewal, duly completed in all respects, is not received within the time specified in sub-rule (2) of this rule, the licence shall be renewed only on payment of a fee twenty five percent in excess of the fees ordinarily payable for the renewal of a licence for the year or years for which the application has been received late.

10. Transfer of licence:-

- (1) The holder of a licence may, at any time before the expiry of the licence, apply for permission to transfer his licence to another person.
- (2) Such application shall be made to the Chief Inspector of Factories or any other officer appointed under sub-section (2-A) of section 8 of the Act and specially empowered in this behalf by the State Government who shall, if he approves of the transfer, enter upon the licence, under his signature, an endorsement to the effect that the licence has been transferred to the person named.
- (3) A fee of fifty rupees shall be charged on each such application.
- 11. Procedure on death or disability of licensee:- If a licensee dies or becomes insolvent the person carrying on the business of such licence shall not be liable to any penalty under the Act for exercising the powers granted to the licensee by the licence during such time as may reasonably be required to allow him to make an application for the amendment of the licence under Rule 8 in his own name for the unexpired portion of the original licence.

12. Loss of licence:- Where a licence granted under the Rules is lost or accidentally destroyed, a duplicate may be granted on payment of a fee of rupees twenty five.

13. Payment of fees:-

- (1) Every application under the Rules shall be accompanied by a treasury receipt showing that the appropriate fees has been paid under the head of account, affixed by the office of the Chief Inspector of Factories.
- (2) If an application for the grant, renewal or amendment of a licence is rejected, the fee paid shall be refunded to the applicant.
- **14. Prohibiting Running of a Factory without a valid licence:-** An occupier shall not use any premises as a factory or carryon any manufacturing process in a factory unless a licence has been issued in respect of such premises and is in force for the time being :

Provided that if a valid application for grant of licence has been submitted and the required fees has been paid, the premises shall be deemed to be fully licensed until such date as the Chief Inspector of Factories or as the case may be, any other officer appointed under sub-section (2-A) of section 8 of the Factories Act, and specially empowered in this behalf by the State Government, grants or renews the licence or refuses in writing with reasons, to grant or renew licence.

Provided further that if the Chief Inspector of Factories or as the case may be, any other officer appointed under sub-section (2-A) of section 8 of the Act and specially empowered in this behalf, by the State Government fails to grant or renew the licence or fails to refuse to do so, for reasons to be communicated in writing to the applicant, within 60 days from the date of the application, licence shall be deemed to have been granted or renewed.

- **15. Notice of Occupation:-** The notice of occupation shall be in **Form No 5**. Under sub-section (4) of Section 7 of the Act.
- **16. Notice of change of Manager:** The notice of change of Manager shall be in **Form No.6.**

17. Guidelines, Instructions and records:-

- (i) Without prejudices to the general responsibility of the occupier to comply with the provisions of section 7(a) of the Act, the Chief Inspector may, from time to time, issue guidelines and instructions regarding the general duties of the occupier relating to health, safety and welfare of all workers while they are at work in the factory.
- (ii) The occupier shall maintain such records, as may be prescribed by the Chief Inspector, in respect of monitoring of working environment in the factory

CHAPTER II: THE INSPECTING STAFF

- **18. Power of Inspectors.** An Inspector shall, for the purpose of the execution of the Act, have power to do all or any of the following things, that is to say:-
 - (a) to photograph any worker; to inspect, examine, measure, copy, photograph, sketch or test, as the case may be, any building or room; any plant, machinery, appliance or apparatus; any register or document; or anything provided for the purpose of securing the health, safety or welfare of the workers employed in a factory;
 - (b) in the case of an Inspector who is a duly qualified medical practitioner, to carry out such medical examinations as may be necessary for the purposes of his duties under the Act;
 - (c) to prosecute, conduct or defend before a Court any complaint or other proceeding arising under the Act or in discharge of his duties as an Inspector;

Provided that the powers of the District Magistrates and such other public officers as are appointed to be additional inspectors shall be limited to the inspection of factories in respect of the following matters, namely:-Cleanliness (Section 11), Over-crowding (Section 16), Lighting (Section 17), Drinking water (Section 18), Latrines & Urinals (Section 19), Spittoons (Section 20), Precautions in the case of fire (Section 38), Welfare (Chapter V), Working hours of adults (Chapter VI-except the power of exemption under the proviso to Section 62), Employment of young persons, (Chapter VIII), Leave with wages (Chapter VIII) and Display of notices (Section 108).

- **19. Qualification of an Inspector:-** No person shall be appointed as an Inspector for the Act unless he possesses the following qualifications-
 - (a) He must not be less than 23 years or more than 35 years of age.
 - (b) He must have:
 - (i) had a good general education upto the Intermediate standard of a recognised University.
 - (ii) Secured a degree, or diploma equivalent to a degree of a recognised university, in any branch of Engineering, Technology of Medicine and preferably with practical experience of at least two years in a workshop or a manufacturing concern of good standing and in the case of Medical Inspector an experience of at least 2 years in a public hospital or factory medical Department or alternately a diploma in Industrial medicine.
 - (c) Where for a particular post, special knowledge to deal with special problems is required, the Chief Commissioner, may, in addition to the basic qualifications, prescribe appropriate qualifications for such a post.

Provided that in the case of a person who has been working as Inspector under the Act at the time of commencement of these rules, the Chief Commissioner may, subject to such conditions as he may specify, exempt such persons from the provisions of this rule.

Provided further that the provisions of this rule relating to qualifications shall not apply in the case of a person who is already appointed as Inspector of Factories and other officers of the Labour, Employment & Industrial Training department on regular basis in accordance with the provisions of the Recruitment Rules framed under Article 309 of the Constitution.

20. Duties of Certifying Surgeon:-

- (1) For purposes of the examination and certification of young persons who wish to obtain certificates of fitness, the Certifying surgeon shall arrange a suitable time and place for the attendance of such persons, and shall give previous notice in writing of such arrangements to the managers of factories situated within the local limits assigned to him.
- (2) The Certifying Surgeon shall issue his certificates. The foil and counter-foil shall be filled in and the left thumb mark of the person in whose name the certificate is granted shall be taken on them. On being satisfied as to the correctness of entries made therein and of the fitness of the person examined he shall sign the foil and initial the counter-foil and shall deliver the foil to the person in whose name the certificate is granted. The foil so delivered shall be the certificate of fitness granted under Section 69 of the Act. All counterfoils shall be kept by the Certifying Surgeon for a period of at least 2 years after the issue of the certificate.
- (3) The certifying Surgeon shall upon request by the Chief Inspector, carry out such examination and furnish him with such report as he may indicate, for any factory or class or description of factories where:-
 - (a) cases of illness have occurred which it is reasonable to believe are due to the nature of the manufacturing process carried on or other conditions of work prevailing therein, or
 - (b) by reason of any change in the manufacturing process carried on, or in the substances used therein, or by reason of the adoption of any new manufacturing process or of any new substance for use in a manufacturing process, there is a likelihood of injury to the health of workers employed in that manufacturing process, or
 - (c) young persons who are or are about to be, employed in any work which is likely to cause injury to their health.
- (4) For the purpose of the examination of persons employed in processes covered by the Rules relating to Dangerous Operations, the Certifying Surgeon shall visit the factories within the local limits assigned to him at such intervals as are prescribed by the Rules relating to such dangerous operations.

- (5) At such visits the Certifying Surgeon shall examine the persons employed in such processes and shall record the results of his examination in a Register known as the Health Register (**Form No.24**) which shall be kept by the factory manager and produced to the Certifying Surgeon at each visit.
- (6) If the Certifying Surgeon finds as a result of his examinations that any person employed in such process is no longer fit for medical reasons to work in that process he shall suspend such person from working in that process for such time as he may think fit and no person after suspension shall be employed in that process without the written sanction of the Certifying Surgeon in the Health Register.
- (7) The manager of a factory shall afford to the Certifying Surgeon facilities to inspect any process in which any person is employed or is likely to be employed.
- (8) The manager of a factory shall provide for the purposes of any medical examination which the Certifying Surgeon wishes to conduct at the factory (for his exclusive use on the occasion of an examination) a room which shall be properly cleaned and adequately ventilated and lighted and furnished with a screen, a table (with writing materials) and chairs.

CHAPTER III: Exemption under sub-section (2) of Section 11

21. Cleanliness of walls and ceilings:- (1) Clause (d) of sub-section (1) of section 11 of the Act shall not apply to the class or description of factories or parts of factories specified in the Schedule hereto:

Provided that they are kept in a clean state by washing, sweeping, brushing, dusting vacuum-cleaning or other effective means:

Provided further that the said clause (d) shall continue to apply:

- (i) in respect of factories or parts of factories specified in Part A of **Schedule II**, to work-rooms in which the amount of cubic space allowed for every person employed in the room is less than 500 cubic feet;
- (ii) in respect of factories or parts of factories specified in Part B of **Schedule II**, to work-rooms in which the amount of cubic space allowed for every person employed in the room is less than 2,500 cubic feet;
- (iii) to engine houses, fitting shops, lunch-rooms, canteens, shelters, creches, clock rooms, rest rooms and wash-places; and
- (iv) to such parts of walls, sides and tops of passages and stair cases as are less than 20 feet above the floor or stair.
- (2) If it appears to the Chief Inspector that any part of a factory, to which by virtue of sub-rule (1) any of the provisions of the said clause (d) do not apply, or apply as varied by sub-rule (1), is not being kept in a clean state, he may by written notice require the occupier to white-wash or colour-wash, wash paint or varnish the same and in the event of the occupier failing to comply with such requisition within two months from the date of the notice, sub-rule (1) shall cease to apply to such part of a factory, unless the Chief Inspector otherwise determines.

- **22. Record of white-washing etc:-** The record of dates on which white washing, colour-washing varnishing etc., are carried out shall be entered in Register maintained in **Form No.10.**
- 23. Disposal of trade wastes and effluents:- The arrangements made in every factory for the treatment of wastes and effluents due to the manufacturing processes carried on therein shall be in accordance with those approved by the relevant Water and Air Pollution Boards, appointed under the Water (Prevention and Control of Pollution) Act, 1974 and the Air (Prevention and Control of Pollution) Act, 1981 and other local authority concerned.
- **24. When artificial humidification not allowed:-** There shall be no artificial humidification in any room of a cotton spinning or weaving factory:-
 - (a) by the use of steam during any period when the dry bulb temperature of that room exceeds 85 degrees;
 - (b) at any time when the wet bulb reading of the hygrometer is higher than that specified in the following Schedule in relation to the dry bulb reading of the hygrometer at that time; or as regards a dry bulb readings intermediate between any two dry bulb readings indicated consecutively in **Schedule III** when the dry bulb reading does not exceed the wet bulb reading to the extent indicated in relation to the lower of these two dry bulb readings-

Provided, however, that Clause (b) shall not apply when the difference between the wet bulb temperature as indicated by the hygrometer in the department concerned and the wet bulb temperature taken with a hygrometer outside in the shade is less than 3.5 degrees.

25. Provision of Hygrometer:- In all departments of cotton spinning and weaving mills wherein artificial humidification is adopted hygrometers shall be provided and maintained in such position as are approved by the Inspector.

The number of hygrometers shall be regulated according to the following scale:-

- (a) Weaving departments. One hygrometer for departments with 500 looms, and one additional Hygrometer for every 500 or part of 50 looms in excess of 500.
- (b) Other departments.- One Hygrometer for each room of less than 300.00 cubic feet capacity and one extra hygrometer for each 200.00 cubic feet or part thereof, in excess of this.
- (c) One additional hygrometer shall be provided and maintained outside each cotton spinning and weaving factory wherein artificial humidification is adopted, and in a position approved by the Inspector, for taking hygrometer shade readings.
- **26. Exemption from maintenance of hygrometers:-** When the Inspector is satisfied that the limits of humidity allowed, by **Schedule III** of Rule 24 are never exceeded, he may, for any department other than the weaving department grant exemption from the maintenance of the hygrometer. The Inspector shall record such exemption in writing.

- **27. Copy of Schedule to Rule 24 to be affixed near every hygrometer:-** A legible copy of **Schedule III** to Rule 24 shall be affixed near each hygrometer.
- 28. Temperature to be recorded at each hygrometer: At each hygrometer maintained in accordance with Rule 25, correct wet and dry bulb temperature shall be recorded thrice daily during each working day by competent person nominated by the Manager and approved by the Inspector. The temperature shall be taken between 7 a.m. and 9 a.m. between 11 a.m. and 2 p.m. (but not in the rest interval) and between 4 p.m. and 5.30 p.m. In exceptional circumstances such additional readings and between such hours, as the Inspector may specify shall be taken. The temperatures shall be entered in a Humidity Register in the prescribed Form No.6, maintained in the factory. At the end of each month, the persons who have taken the readings shall sign the Register and certify the correctness of the entries. The Register shall always be available for inspection by the Inspector.

29. Specifications of Hygrometer:-

- (1) Each hygrometer shall comprise two mercurial thermometers of wet bulb of similar construction and equal in dimensions, scale and divisions of scale. They shall be mounted on a farm with a suitable reservoir containing water.
- (2) The wet bulb shall be closely covered with a single layer of muslin, kept wet by means of a wick attached to it and dropping into the water in the reservoir. The muslin covering and the wick shall be suitable for the purpose, clean and free from size or grease.
- (3) No part of the wet bulb shall be within 3 inches from the dry bulb or less than 1 inch from the surface of the water in the reservoir and the water reservoir shall be below it, on the side of it away from the dry bulb.
- (4) The bulb shall be spherical and of suitable dimensions and shall be freely exposed on all sides to the air of the room.
- (5) The bores of the stems shall be such that the position of the top of the mercury column shall be readily distinguishable at a distance of 2 feet.
- (6) Each thermometer shall be graduated so that accurate readings may be taken between 50 and 120 degrees.
- (7) Every degree from 50 degrees upto 120 degrees shall be clearly marked by horizontal lines on the stems. Each fifth and tenth degree shall be marked by longer marks than the intermediate degrees and the temperature marked opposite each tenth degree, i.e., 50, 60, 70, 80, 90, 100, 110 and 120.
- (8) The markings as above shall be accurate that is to say, at no temperature between 50 and 120 degrees shall the indicated readings, be in error by more than two tenths of a degree.
- (9) A distinctive number shall be indelibly marked upon the thermometer.
- (10) The accuracy of each thermometer shall be certified by a competent authority appointed by the Chief Inspector and such certificate shall be attached to the Humidity Register.

- **30.** Thermometers to be maintained in efficient order:- Each thermometer shall be maintained at all times during the period of employment in efficient working order, so as to give accurate indications and in particular:-
 - (a) the wick and the muslin covering of the wet bulb shall be renewed once a week:
 - (b) the reservoir shall be fitted with water which shall be completely renewed once a day. The Chief Inspector may direct the use of distilled water or pure rain water in any particular mill or mills in certain localities;
 - (c) no water shall be applied directly to the wick or covering during the period of employment.
- 31. An inaccurate thermometer not to be used without fresh certificate:- if an Inspector gives notice in writing that a thermometer is not accurate it shall not, after one month from the date of such notice, be deemed to be accurate unless and until it has been re-examined as prescribed and afresh certificate obtained which certificate shall be kept attached to the Humidity Register.
- 32. Hygometer not to be affixed to wall etc., unless protected by wood:-
- (1) No hygrometer shall be affixed to a wall, pillar or other surface unless protected therefrom by wood or other non-conducting material at least half an inch in thickness and distant at least one inch from the bulb of each thermometer.
- (2) No hygrometer shall be fixed at a height of more than 5 feet 6 inches from the floor to the top of thermometer steam or in the direct draughts from a fan, window or ventilating opening.
- **33.** No reading to be taken within 15 minutes of renewal of water:- No reading shall be taken for record on any hygrometer within 15 minutes of the renewal of water in the reservoir.
- **34. How to introduce steam for humidifications:-** In any room in which steam pipes are used for the introduction of steam for the purpose of artificial humidification of the air the following provisions shall apply-
 - (a) The diameter of such pipes shall not exceed two inches and in the case of pipes installed after 1st August, 1950 the diameter shall not exceed one inch;
 - (b) Such pipes shall be short as it reasonably practicable;
 - (c) All hangers supporting such pipes shall be separated from the be pipes by an efficient insulator not less than half an inch thickness
 - (d) No uncovered jet from such pipe shall project more than 4-1/2 inches beyond the outer surface of any cover;
 - (e) The steam pressure shall be as low as practicable and shall not exceed 70 lbs. per square inch;

(f) The pipe employed for the introduction of steam into the air in a department shall be effectively covered with such non-conducting material, as may be approved by the Inspector in order to minimise the amount of heat radiated by them into the department.

35. Lighting-application and commencement:-

- (1) Subject as in these Rules provided, Rules 35 to 39 shall apply to factories in which persons are being regularly employed in a manufacturing process or processes for more than 48 hours a week, or in shifts, provided that nothing in these Rules shall be deemed to require the provision of lighting of a specified standard in any building or structure so constructed that, in the opinion of the Chief Inspector, it would not be reasonably practicable to comply with such requirements.
- (2) Rules 35 to 39 shall come into force, in respect of any class or description of factories, on such dates as the State Government may, by notification in the Official gazette, appoint in this behalf.

36. Lighting of Interior parts:-

(1) The general illumination over these interior parts of a factory where persons are regularly employed shall be not less than 6 feet candles measured in horizontal plane at a level of 3 feet above the floor:

Provided that in any such parts in which the mounting height of the light source for general illumination necessarily exceeds 25 feet measured from the floor or where the structure of the room or the position or construction of the fixed machinery or plant prevents the uniform attainment of this standard, the general illumination at the said level shall not be less than 2 feet candle and where work is actually being done the illumination shall be not less than 6 feet candles.

- (2) The illumination over all other interior parts of the factory over which persons employed pass shall, when and where a person is passing, be not less than 0.5 foot candles at floor level.
- (3) The standard specified in this Rule shall be without prejudice to the provision of any additional illumination required to render the lighting sufficient and suitable for the nature of the work.

37. Prevention of glare:-

(1) Where any source of artificial light in the factory is less than 16 feet above floor level, no part of the light source or of the lighting fitting having a brightness greater than 10 candles per square inch shall be visible to persons whilst normally employed within 100 feet of the source, except where the angle of elevation from the eye to the source or part of the fitting as the case may be exceeds 20°.

- (2) Any local light that is to say an artificial light designed to illuminate particularly the area or part of the area of work of a single operative or small group of operatives working near other, shall be provided with a suitable shade of opaque material to prevent glare or with other effective means by which the light source is completely screened from the eyes of every person employed at the normal working place, or shall be so placed that no such person is exposed to glare there from.
- **38. Power of Chief Inspector to exempt:-** Where the Chief Inspector is satisfied in respect of any particular factory or part thereof or in respect of any description of workroom or process that any requirement of Rules 35 to 37 is inappropriate or is not reasonably practicable, he may order in writing exempt that factory or part thereof, or description of workroom or process from such requirement to such extent and subject to such conditions as he may specify.

39. Exemption from Rule 35:-

- (1) Nothing in Rule 35 shall apply to the parts of factories specified in part I of **Schedule IV**.
- (2) Nothing in sub-rule (1) of Rule 35 shall apply to the factories or parts of factories respectively specified in Part II **Schedule IV.**
- **40. Quantity of drinking water:-** The quantity of drinking water to be provided for the workers in every factory shall be at least as many gallons a day as there are workers employed in the factory and such drinking water shall be readily available at all times during workings hours.
- 41. Source of Supply:- The water provided for drinking shall be supplied :-
 - (a) from a public water supply system, or
 - (b) from any other source approved in writing by the Health Office.
- **42. Means of supply:-** If drinking water is not supplied directly from taps either connected with public water supply system or any other water supply system of the factory approved by the Health-Officer, it shall be kept in suitable vessels receptacles or tanks fitted with taps and having dust proof covers placed on raised stands or platforms in shade and haring suitable arrangement of drainage to carry away the split water. Such vessels or receptacles and tanks shall be kept clean and the water renewed at least once every day. All practicable measures shall be taken to ensure that the water is free from contamination.

43. Cleanliness of well or reservoir:-

- (1) Drinking water shall no be supplied from any open well or reservoir unless it is so constructed, situated, protected and maintained as to be free from the possibility of pollution by chemical, or bacterial and extraneous impurities.
- (2) Where drinking water supplied from such well or reservoir the water in it shall be sterilised once a week or more frequently if the Inspector by written order so requires, and the date, on which sterilising is carried out shall be recorded.

Provided that his requirement shall not apply to any such well or reservoir if the water therein is filtered and treated to the satisfaction of the Health Officer before it is supplied for consumption.

- **44. Report from Health Officer:-** The Inspector may by order in writing direct the Manager to obtain, at such time or at such intervals as he may direct, a report from the Health Officer as to the fitness for human consumption of the water supplied to the workers, and in every case to submit to the Inspector a copy of such report as it is received from the Health Officer.
- **45. Cooling of water:-** In every factory wherein more than two hundred and fifty workers are ordinarily employed-
 - (a) The drinking water supplied to the workers shall from the 16th of April to the 30th September, in every year, be cooled by ice or other effective method:

Provided that if ice is placed in the drinking water, the ice shall be clean and wholesome and shall be obtained only from a source approved in writing by the Health Officer;

- (b) The cooled drinking water shall be supplied in every canteen lunch room and rest room and also at conveniently accessible points throughout the factory which for the purpose of these Rules shall be called "Water Centres";
- (c) The water centres shall be sheltered from the weather and adequately drained;
- (d) The number of water centres to be provided shall be one "Centre" for every 150 persons employed at anyone them in the factory;

Provided that in the case of a factory where the number of persons employed exceeds 500 it shall be sufficient if there is one such "centre" as aforesaid for every 150 persons upto the first 500 and one for every 500 persons thereafter;

- (e) every water centre shall be maintained in a clean and orderly condition;
- (f) every water centre shall be in charge of a suitable person who shall distribute the water. Such person shall be provided with clean clothes on duty.

Clause (f) shall not apply to any factory in which suitable mechanically operated drinking water refrigerating units are installed to the satisfaction of the Chief Inspector.

- **46. Latrine Accommodation:-** Latrine accommodation shall be provided in every factory on the following scale:-
 - (a) where females are employed there shall be least one latrine for every 25 females;
 - (b) where males are emp loyed, there shall be at leas t one latrine for every 25 males:

Provided that where the number of males employed exceeds 100, it shall be sufficient if there is one latrine for every 25 males upto the first 100 and one for every 50 thereafter.

In calculating the number of latrines required under this Rule, any odd number of workers less than 25 to 50, as the case may be, shall be reckoned a 25 or 50.

- **47.** Latrines to confirm to public health requirements:- Latrines other than those connected with an efficient water-borne sewage system, shall comply with the requirements of the Public Health Authorities.
- **48. Privacy of latrines:-** Every latrine shall be under cover and so partitioned off as to secure privacy and shall have a proper door and fastenings.
- **49. Sign boards to be displayed:-** Where workers of both sexes are employed, there shall be displayed outside each latrine block a notice in the language understood by the majority of the workers "For Men Only" or "For Women Only" as the case may be. The notice shall also bear the figure of a man or of woman as the case may be.
- **50. Urinal accommodation:-** Urinal accommodation shall be provided for the use of workers and shall not be less than 2 feet in length for every 50 males provided that where the number of males employed exceeds 500, it shall be sufficient if there is one urinal for every 50 males upto the first 500 employed, and one for every 100 thereafter.
- **51. Urinals to conform to public health requirements:-** Urinals other than those connected with an efficient water-borne sewage system, and urinals in a factory wherein more than two hundred and fifty workers are ordinarily employed shall comply with the requirements of the Public Health Authorities.
- **52. Certain latrines and urinals to be connected to sewerage system:-** When any general system of underground sewerage with an assured water supply for any particular locality is provided in municipality, all latrines and urinals of a factory situated in such locality shall, if the factory is situated within 100 feet o an existing sewer, be connected that with sewerage system.
- **53. White-washing, colour-washing of latrines and urinals:-** The walls, ceiling and partitions of every latrine and urinal shall be white-washed or colour-washed and the white-washing or colour-washing shall be repeated at least once in every period of four months. The dates on which the white-washing or colour-washing is carried out shall be entered in the prescribed Register (**Form No.10**).

Provided that this Rule shall not apply to latrines and urinals the walls, ceilings or portions of which are laid glazed tiles or otherwise finished to provide smooth, polished impervious surface and that they are washed with suitable detergents and disinfectants at least once in every period of four months.

54. Construction and maintenance of drains:- All drains carrying waste or sullage water shall be constructed in masonry or other impermeable material and shall be regularly flushed and the effluent disposed of by connecting such drains with a suitable drainage line.

Provided that, where there is no such drainage line, the effluent shall be dedorized and rendered innocuous and then disposed of in a suitable manner to the satisfaction of the Health Officer.

55. Water taps in latrines:-

- (1) Where piped water supply is available a sufficient number of water taps, conveniently accessible shall be provided in or near such latrine accommodation.
- (2) If piped water supply is not available sufficient quantity of water shall be kept stored in suitable receptacles near the latrines.
- **56. Number and location of Spittoons:-** The number and location of the spittoons to be provided shall be to the satisfaction of the Inspector.
- **57. Type of spittoons:-** The spittoons shall be of either of the following types:-
 - (a) a galvanized iron container with a conical funnel shaped cover. A layer of suitable disinfectant liquid shall always be maintained in the container;
 - (b) a container filled with dry, clean sand, and covered with a layer of Bleaching powder;
 - (c) any other type approved by the Chief Inspector.
- **58. Cleaning of Spittoons:-** The spittoon mentioned in Clause (a) of Rule 57 shall be emptied, cleaned and disinfected at least once every day; and the spittoon mentioned in Clause (b) of Rule 57 shall be cleaned by scrapping out the top layer of sand as often as necessary or at least once every day.

CHAPTER IV: SAFETY

59. Further safety precautions:-

- (1) Without prejudice to the provisions of sub-section (1) of Section 21 of the Act in regard to the fencing of machines the further precautions specified in **Schedule V to VIII** shall apply to the machines noted in each Schedule.
- (2) This Rule shall come into force, in respect of any class or description of factories, where machines noted in **Schedule V to VIII** are in use, on such dates as the State Government may, by notification in the official gazette, appoint in this behalf.
- **60**. **Register prescribed under section 22 (1) of the Act** The Register for recording the names of specially trained adult male workers shall be in **Form No.36**.
- **61. Employment of young persons on dangerous machines:-** The following machines shall be deemed to be of such dangerous character that young persons shall not work at them unless the provisions of Section 23 (1) of the Act are complied with:

Power presses other than hydraulic presses; Milling machines used in the metal trades; Guillotine machines; Circular saws; Platen printing machines.

62. Hoists & Lifts:-

- (i) A register shall be maintained to record particulars of examination of hoists or lifts and shall give particulars as shown in **Form No.11.**
- (ii) Exemption of certain hoists and lifts. In pursuance of the provisions of subsection (4) of section 28 of the Act in respect of any class or description of hoist or lift specified in the second column of **schedule IX**, and set opposite to that class or description hoists or lift shall not apply.

63. Rules framed under sub-section (2) of Section 29:-

- (1) No lifting machine and no chain, rope or lifting tackle, except fibre rope or fibre rope sling, shall be taken into use in any factory for the first time in that factory unless it has been tested and all parts having been thoroughly examined by a competent person and a certificate of such a test and examination specifying the safe working load or loads and signed by the person making the test and the examination, has been obtained and is kept available for inspection.
- (2) (a) Every jib-crane so constructed that the safe working load may be varied by raising or lowering of the jib, shall have attached thereto either on automatic indicator of safe working loads or an automatic jib angle indicator and a table indicating the safe working loads at corresponding inclinations of the jib or corresponding radil of the load.
 - (b) A table showing the safe working loads of every kind and size of chain, rope or lifting tackle in use, and, in the case of a multiple sling, the safe working load at different angles of the legs, shall be posted in the store in which the chains, ropes or lifting tackles are kept, and in prominent, positions on the promises, and no chain, rope or lifting tackle not shown in the table shall be used. The foregoing provisions of this clause shall not apply in respect of any lifting tackle if the safe working load there working load at different angles of the legs is plainly marked upon its.
- (3) Particulars of register to be maintained under clause (a) (iii) of sub-section (1) of section 29 of the Act shall be:
 - (i) Name of occupier of factory.
 - (ii) Address of the factory.
 - (iii) Distinguishing number of mark, if any, and description sufficient to identify the lifting machine, chain, rope, or the lifting tackle.
 - (iv) Date when the lifting machine, chain, rope or lifting tackle was first taken into use in the factory.
 - (v) Date and number of the certificate relating to any test and examination made under sub-rules (1) and (7) together with the name and address of the person when issued the certificate.
 - (vi) Date of each periodical thorough examination made under clause (a) (iii) of sub-section (1) of Section 29 of the Act and sub-rule (6) and by whom it was carried out.

- (vii) Date of annealing or other heat treatment of the chain other lifting tackle made under sub-rule (5) and by it was carried out.
- (viii) Particulars of any defects effecting the safe working load found at any such thorough examination or after annealing and the steps taken to remedy such defects.

The register shall be kept readily available for inspection.

- (4) All rails on which a travelling crane moves and every track on which the carriage of a transporter or runway moves shall be or proper size and adequate strength and have an even running surface and every such rail or track shall be properly laid, adequately supported and properly maintained.
- (5) All chains and lifting tackle, except a rope sling shall unless they have been subjected to such other heat treatment as may be approved by the Chief Inspector be effectively annealed under the supervision of a competent person at the following intervals:-
- (i) All chains, sling rings hooks, shackles alld swivels used in connection with molten metals or molten slage or when they are made of half inch bar or smaller, once at least in every six months.
- (ii) All other chains, rings, hooks shackles and swivels in general use once at least in every twelve months.

Provided that chains and lifting tackle not in frequent use shall, subject to the Chief Inspector's approval, be annealed only when necessary. Particular of such annealing shall be entered in a register prescribed under Rule 4.

- (6) Nothing in sub-rule 5 shall apply to the following clauses of chains and lifting tackles :
- (i) Chains made of malleable cast iron.
- (ii) Plate link chains.
- (iii) Chains, rings, hooks, shackles and swivels made of steel or any non-ferrous metal.
- (iv) Pitched chains working on sprocket or pecketed wheel.
- (v) Rings, hooks, shackles and swivels permanently attached to pitched chains, pully blocks or weighing machines.
- (vi) Hooks, and swivels having screw threaded parts or ball bearing or other case hardened parts.
- (vii) Socket shackles secured to wire ropes by white metal capping.
- (viii) Boardean connections. Such chains and lifting tackle shall be thoroughly examined by a competent person once at least in every twelve months, and particulars entered in the register kept in accordance with rule 4.

- (7) All lifting machines, chains, ropes and lifting tackle except a fibre rope or fibre rope sling, which have been lengthened, altered or repaired by welding or otherwise, shall before being again taken into use the adequately retested and reexamined by a competent person and a certificate of such test and examination be obtained and particulars entered in the register kept in accordance with rule 4.
- (8) No person under 18 years of age and no person who is not sufficiently competent and reliable shall be employed as driver otherwise or to give signals to driver.

64. Pressure Plant:-

- (1) Every plant of machinery other than the working cylinders of prime movers used in a factory, and operated at a pressure greater than atmospheric pressure, shall be:-
 - (a) of good construction, sound material, adequate strength, and free from any patent defect;
 - (b) properly maintained in a safe condition;
 - (c) fitted with:-
- (i) a suitable valve or other effective device to ensure that the maximum permissible working pressure of the vessel shall not be exceeded;
- (ii) a suitable pressure gauge easily visible and designed to show, at all times, the correct interval pressure in lbs, per square inch, and marked with a prominent red mark at the safe working pressure of the vessels;
- (iii) a suitable stop valve or valves by which the vessel may be isolated from other vessels or source of supply of pressure;
- (iv) a suitable drain cock or valve at the lowest part of the vessel for the discharge of connected liquid. (d) thoroughly examined by a competent person:-
- (i) externally, once in every period of six months, to ensure general condition of the vessel and the working its fittings;
- (ii) internally, once in every period of twelve months to ensure condition walls, seams, and ties, both inside and outside the vessel, soundness of the parts of the vessel, and the effects of correction. If by reason of construction of the vessel, a thorough internal examination is not possible, this examination may be replaced by a hydraulic test which shall be carried out once every two years.

Provided that the vessels in continuous processes which cannot be frequently opened, the period of internal examination may be extended to four years; and

(iii) hydraulically tested at interval or not more than four year provided that in respect of pressure vessels with thin wall such as sizing cylinders made of copper or any other non ferrous metal periodic hydraulic test may be dispensed with on the condition that the requirements laid down in clause (2) are fulfilled.

Provided that it shall be sufficient for the purposes of clauses (e) if the safety valve, pressure gauge and stop valve are mounted on a pipe line immediately adjacent to the vessel & where there is a range of two or more similar vessels in a plant served by the same pressure lead, only one set of such mountings need be fitted provided they cannot be isolated.

- (2) (a) In respect of pressure vessels of thin wall such as sizing cylinder made of copper or any other non-ferrous metal the safe working pressure shall be reduced at the rate of 5 per cent of the original working pressure for every year of its use after the first five years and no such cylinder shall be continued to be used for more than twenty years after it was first taken into use.
 - (b) If no information as the date of construction thickness of walls and safe working pressure is available, the age of the sizing cylinder shall be determined by the competent person in consultation with the Chief Inspector from any other particulars available with the manager.
 - (c) Every new and second hand cylinder of thin walls to which repairs, which may affect its safety, have been carried out, shall be tested before use to at least one and a half times its working pressure.
- (3) Every vessel other than part of a prime mover operated at a pressure greater than atmospheric pressure, and not so constructed as to withstand with safety the maximum permissible working pressure at the sources of supply, or the maximum pressure which can be obtained in the pipe connecting the vessel with any other source of supply shall be fitted with a suitable reducing valve or other suitable automatic device to prevent the safe working pressure of the vessel being exceeded.
- (4) In cases owing to the nature of the process or the action of the contents of the vessel, a pressure gauge or safety valve or both cannot work reliable a tested and reliable working thermometer, with a sufficient large scale, on which shall be clearly marked the maximum permissible temperature in the vessel or pyrometers or rupture discs in addition to the pressure gauge and safety valve may be fitted as may be directed by the Chief Inspector.
- (5) If during thorough examination, doubt arises as to the ability of vessels to work safety until the next examination provided for in these rules then the competent person shall enter in the register prescribed a reasoned statement, to authorise the vessel for further work subject to a lowering of pressure or to more frequent inspection or subject to both of these requirements.
- (6) No vessel which has undergone alterations or repairs shall be taken into use unless it is thoroughly examined by a competent person.
- (7) A report of the result of every examination made shall be completed in the prescribed **Form No.12** and signed by the person making the examination, and shall be kept available for perusal by an Inspector at any time while the vessel is in service.

- (8) No vessel which has previously been used shall be taken into use in any factory for the first time in the factory until it has been examined and reported in accordance with these rules and no new vessel shall be taken into use unless there has been obtained from the maker of the vessel, or from a competent person, a certificate specifying the maximum permissible working pressure thereof, and stating the nature of the tests to which the vessel and its fittings (if any) have been subjected, and the certificate is kept available for perusal by an Inspector and the vessel is so marked as to enable it to be identified, the vessel to which the certificate relates.
- (9) Where the report of any examination under this Rule specifies conditions for securing the safe working of vessel, shall not be used except in accordance with these conditions.
- (10) The competent person making the report of any examination under this rule, shall within seven days of the completion of the examination send to the Inspector a copy of the report in every case were the maximum permissible working pressure is reduced, or the examination shows that the part cannot continue to be used with safety unless certain repairs and carried out immediately or within a specified time.
- (11) The requirements of this rule shall be in addition to and not in derogation the requirements of any other Act, rules or regulations.
- (12) Nothing in this rule shall apply to:-
 - (a) any vessels which comes within the scope of the Indian Boiler Act.
 - (b) metal bottles of cylinders used for the storage or transport of compressed gases or liquified or dissolved gases under pressure.
- (13) The Chief Inspector may exempt, subject to such conditions as may be considered necessary, all or any of the pressure vessels from all or any of the provisions of this rule if he has reason to believe that the construction or use of those vessels is such that the provisions of relating to inspection are not necessary or it is not practicable to comply with them.

65. Water-sealed Gasholder:-

- (1) The expression "Gasholder" means a water-sealed gasholder which has a storage capacity of not less than 141.5 cubic meters (5000 cft.)
- (2) Every gasholder shall be of adequate material and strength, should construct and shall be properly maintained.
- (3) Where there is more than one gasholder in the factory every gasholder shall be marked in a conspicuous position with a distinguishing number of letter.
- (4) Every gasholder shall be thoroughly examined externally by a competent person at least once in a period of 12 months.

(5) In the case of gasholder of which any lift has been in use for more than 10 years the internal state of the sheeting, shall within one year of the coming into operation of this rule and thereafter at least every period of four years, be examined by a competent person by means of electronic or other accurate devices.

Provided that if the Chief Inspector is satisfied that such electronic or other accurate devices are not available, he may permit the cutting of samples from the crown and the sides of the holder.

Provided further that if the above inspection raises a doubt, an internal visual examination shall be made.

- (6) All possible steps shall be taken to prevent or minimise in gress of impurities in the gasholder.
- (7) No gasholder shall be repaired or demolished except under the direct supervision of a person who, by his training and experience and his knowledge of the necessary precautions against risks of explosion and of persons being over come by gas, is competent to supervise such work.
- (8) All sample discuss under sub-rule (5) shall be kept readily available for inspection.
- (9) A permanent register duly signed by the occupier or Manager shall be maintained giving the following particulars:-
 - (a) The serial number of the gasholder vide rule (3) and the particulars of manufacture i.e. maker's name, date of manufacture, capacity, number of lifts, pressure, thrown by holder when full of gas.
 - (b) The dates of inspection carried out as required under sub-rules (4) and (5) and by whom carried out.
 - (c) The method of inspection used.
 - (d) Date of painting etc.
 - (e) Nature of repairs and name of person carrying out repairs, and
 - (f) Remark.

The results of examinations by a competent person carried out under sub rules (4) and (5) shall be in **Form 13.**

- (10) A copy of the report in **Form 13** shall be kept in the register and both the register and the report shall be readily available for inspection.
- (11) The Inspector shall inspect the gasholder at least once in a period of 12 months.

66. Excessive weights:-

- (1) No woman or young person, shall, unaided by another person, lift, carry or move by hand or on head, any material, article, tool or appliance exceeding the maximum limit in weight set out in **Schedule X.**
- (2) No woman or young person shall engage, in conjunction with others, in lifting, carrying or moving by hand or on head, any material, article, tool or appliance, if the weight thereof exceeds the lowest weight fixed by **Schedule X** to sub-rule (1) for any of the persons engaged, multiplied by the number of the persons engaged.
- **67. Protection of eyes:-** Effective screens or suitable goggles shall be provided for the protection of persons employed in or in the immediate vicinity of the following process ;-
 - (a) The processes specified in **Schedule XI**, being processes which involve risk of injury to the eyes from particles or fragments thrown off in the course of the process.
 - (b) The processes specified in **Schedule XII**, being processes which involve risk of injury to the eyes by reason of exposure to excessive light or infrared or ultraviolet radiation.
- **68. Minimum dimensions of manholes:-** Every chamber, tank, vat, pipe, flue or other confined space, which persons may have to enter and which may contain dangerous fumes to such an extent as to involve risk of the persons being overcome there shall, unless there is other effective means of egress, be provided with a manhole which may be rectangular, oval or circular in shape and which shall:-
 - (a) in the case of a rectangular or oval shape, be not less than 16 inches long and 12 fiches wide;
 - (b) in the case of a circular shape, be not less than 16 inches in diameter.
- **69. Exemptions:-** The requirements of sub-section 4 of Section 37 shall not apply to the following processes carried on in any factory.-
 - (a) The operation of repairing a water-sealed gas-holder by the electric welding process, subject the following conditions:
 - (i) The gas-holder shall contain only the following gases, separately or mixed at a pressure greater than atmospheric pressure, namely, town gas, cokeoven gas, producer gas, blast furnace gas, or gases, other than air, used in their manufacture:

Provided that this exemption shall not apply to any gas-holder containing acetylene or mixture of gases to which acetylene has been added intentionally;

(ii) Welding shall only be done by the electric welding process and shall be carried out by experienced operatives under the constant supervision of a competent person.

- (b) The operations of cutting or welding steel wrought iron gas mains and services by the application of heat, subject to the following conditions:-
- (i) The main or service shall be situated in the open air, and it shall contain only the following gases separately or mixed at a pressure greater than atmospheric pressure, namely, town gas, coke oven gas, producer gas, blast furnace gas, or gases other than air, used in their manufacture;
- (ii) The main or service shall not contain acetylene or any gas or mixture of gases to which acetylene has been added intentionally;
- (iii) The operation shall be carried out by an experienced person or persons and at least 2 persons (including those carrying out the operations) experienced in work on-gas mains and over 18 years of age shall be present during the operation;
- (iv) The site of the operation shall be free from any inflammable or explosive gas or vapour;
- (v) Where acetylene gas is used as a source of heat in connection with an operation, it shall be compressed and contained in a porous substance in a cylinder; and
- (vi) Prior to the application of any flame to the gas main of service, this shall be pierced or drilled and the escaping gas ignited;
- (c) The operation of repairing an oil tank on any ship by the electric welding process, subject to the following conditions:-
- (i) The only oil contained in the tank shall have a flash point of not less than 150 F (close test) and a certificate to this effect shall be obtained from a competent analyst.
- (ii) The analyst's certificate shall be kept available for inspection by an Inspector, or by any person employed or working on the ship;
- (iii) The welding operation shall be carried out only on the exterior surface of the tank at a place
 - (a) which is free from oil or oil leakage in inflammable quantities, and
 - (b) which is not less than one foot below the nearest part of the surface of the oil within the tank; and
- (iv) Welding shall be done only by the electric welding and shall be carried out by experienced operatives under the constant supervision of a competent person.

70. Fire Protection:-

- (1) Processes equipment, plant, involving serious explosion and serious fire hazards-
 - (a) All processes, storages, equipments, plants, etc. involving serious explosion and flash fire hazard shall be located in segregated buildings where the equipment shall be so arranged that on a minimum number of employees are exposed to such hazards at any one time.
 - (b) All industrial processes involving serious fire hazard shall be located in building or work places separated from one another by wall of fireresistant construction.
 - (c) Equipment and plant involving serious fire or flash fire hazard shall, wherever possible be so constructed and installed that in case of fire, they can be easily isolated.
 - (d) Ventilation ducts, pnematic conveyors and similar equipment involving a serious fire risk should be provided with flame-arresting or automatic fire extinguishing appliances, or fire resisting dampers electrically interlocked with heat sensitive/smoke detectors and the airconditioning plant system.
 - (e) In all work places having serious fire or flash fire hazards, passages between machines, installations or piles of material should be at least 90 cm wide. For storage piles, the clearance between the ceil rig and the top of the pile should not be less than 2 m.
- (2) Access for fire fighting-
 - (a) Building and plants shall be so laid out and roads, passageways etc, so maintained as to permit unobstructed access for fire fighting.
 - (b) Doors and window openings shall be located in suitable positions on all external walls of the building to provide easy access to the entire area within the building for fire fighting.
- (3) Protection against lightening:- Protection from lightening shall be provided for-
 - (a) building in which explosive or highly flammable substances are manufactured, used, handled or stored;
 - (b) storage tanks containing oils, paints or other flammable liquids;
 - (c) rains elevators;
 - (d) buildings, tall chimneys or stacks where flammable gases, fumes dust or lint are likely to be present;
 - (e) sub-station building and out-door transformers and switch yards.

- (4) Precautions against ignition:- Where there is danger of fire or explosion from accumulation of flammable or explosive substances in air-
- (a) All electrical apparatus shall either be excluded from the area of risk or they shall be of such construction and so installed and maintain as to prevent the danger of their being source of ignition;
- (b) Effective measures shall be adopted for prevention of accumulation of static charges to a dangerous extent;
- (c) Workers shall wear shoes without iron or steel nails or any other exposed ferrous materials which is likely to cause sparks by friction
- (d) Transmission belts with iron fasteners shall not be used;
- (e) Smoking, lightening or carrying of matches, lighters or smoking; materials shall be prohibited;
- (f) All other precautions, as are reasonably practicable, shall be taken to prevent initiation of ignition from all other possible sources such as spenflames, frictional sparks, overheated surfaces of machinery or plant, chemical or physical-chemical reaction and radiant heat.
- (5) Spontaneous ignition.- Where materials are likely to induce spontaneous ignition, care shall be taken to avoid formation of air pocket and ensure adequate ventilation. The material susceptible to spontaneous ignition should be stored in dry condition and should be in heaps of such capacity and separated by such passage which will prevent fire. The materials susceptible to ignition and stored in the open shall be at a distance not less than 10 meters away from process or storage buildings.
- (6) Cylinders containing compressed gas:- Cylinders containing compressed gas may only be stored in open, if they are protected against excessive variation of temperature, direct rays of sun, or continuous dampness. Such cylinders shall never by stored near highly flammable substances, are stored shall have adequate ventilation.
- (7) Storage of flammable liquids-
- (a) The quantity of flammable liquids in any work room shall be the minimum required for the process or processes carried on in such room. Flammable liquids shall be stored in suitable containers with close fitting covers; Provided that not more than 20 liters of flammable liquids having a flash point of 20°C or less shall be kept or stored in any work room.
- (b) Flammable liquids shall be stored in closed containers and limited quantities in well ventilated room of fire resisting construction which are isolated from the remainder of the building by fire walls and self closing fire doors.

- (c) Large quantities of such liquids shall be stored in isolated adequately ventilated building of fire resisting construction or in storage tanks, preferably underground and at a distance from any building as required in the petroleum Rules, 1976.
- (d) Effective steps shall be taken to prevent leakage of such liquids into basements, sumps or drains and to confine any escaping liquid within safe limits.
- (8) Accumulation of flammable dust, gas fume or vapour in air or flammable waste material on the floors-
- (a) Effective steps shall be taken for removal or prevention of the accumulation in the air of flammable dust, gas, fume or vapour to an extent which is likely to be dangerous.
- (b) No waste material of a flammable nature shall be permitted to accumulate on the floors and shall be removed at least once in a day or shift, and more often, when possible. Such materials shall be placed in suitable metal containers with covers wherever possible.
- (9) Fire Exits-
- (a) In this rule-
 - (i) "horizontal exist" means an arrangement which allows alternative egress from a floor area to another floor at or near the same level in an adjoining building or an adjoining part of the same building with adequate separation; and
 - (ii) "travel distance" means the distances an occupant has to travel to reach an exit.
- (b) An exit may be a doorway corridor, passageway to an external stairway or to a varandah or to an internal stairway segregated from the rest of building by fire resisting walls which shall provide continuous and protected means of egress to the exterior of a building or to an exterior open space. An exit may also include a horizontal exit leading to an adjoining building at the same level.
- (c) Lifts, escalators and revolving doors shall not be considered as exit for the purpose of this sub-rule.
- (d) In every room of a factory exits sufficient to permit safe escape other occupants in case of fire or other emergency shall be provided which shall be free of any obstruction.
- (e) The exits shall be clearly visible and suitably illuminated with suitable arrangement, whatever artificial lightening is to be adopted for this purpose to maintain the required illumination in case of failure of the normal source of electric supply.
- (f) The exits shall be marked in a language understood by the majority of the workers.

- (g) Iron rung ladders or spiral staircases shall not be used as exit staircases.
- (h) Fire resisting doors or roller shutters shall be provided at appropriate places along the escape routes to prevent spread of fire and smoke, particularly at the entrance of lifts or stairs where funnel or flue effect may be created inducing an upward spread of fire.
- (i) All exits shall provide continuous means of egress to the exterior of a building or to an exterior open space leading to a street.
- (j) Exists shall be so located that the travel distance to reach at least one of them on the floor shall not exceed 30 meters.
- (k) In case of these factories where high hazard materials are stored or used, the travel distance to the exist shall not exceed 22.5 meters and there shall be at least two ways escape from every room, how ever shall, except toilet rooms, so located that the paints of access there to are out of or suitably shielded from areas of high hazard.
- (l) Wherever more than one exit is required for any room space or floor, exits shall be placed as remote from each other as possible and shall be arranged to provide direct access in separate directions from any point in the areas served.
- (m) The unit of exit width used to measure capacity of any exit shall be 50 cm. A clear width of 25 cm. shall be counted as an additional half unit. Clear width of less than 25 cm. shall not be counted for exit width.
- (n) Occupants per unit width shall be 50 for stairs and 75 for doors.
- (o) For determining the exits required, the occupant lead shall be reckoned on the basis of actual number of occupants within any floor area or 10 square meters per person, whichever is more.
- (p) There shall not be less than two exits serving every floor area above and below the ground floor, and at least one of them shall be an internal enclosed stairway.
- (q) For every building or structure used for storage only and every section thereof considered separately, shall have access to at least one exit to arrange and located as to provide a suitable means of escape of any person employed therein, and in any such room wherein more than 10 persons may be normally present, at least two separate means of exit shall be available, as remote from each other as practicable.
- (r) Every storage area shall have access to at least one means of exit which can be readily opened.
- (s) Every exit doorway shall open into an enclosed stairway, horizontal exit on a corridor or passageway providing continuous and protected means of egress.
- (t) No exit doorway shall be less than 100 cm in width, doorway shall be not less than 200 cm in height.

- (u) Exit doorways shall open outwards, that is, away from the room but shall not obstruct the travel along any exit, no door when opened, shall reduce the required width of a stairway or landing to less than 90 cm. Over head or sliding doors shall not be installed for this purpose.
- (v) An exit door shall not open immediately upon a flight of stairs A landing at least 1.5m x 1.5m in size shall be provided in the stairway at each doorway. The level of landing shall be the same as that of the floor which it serves.
- (w) The exit doorways shall be openable from the side which they serve without the use of a key.
- (x) Exit corridors and passageways shall be of a width not less than the aggregate required width of exit doorways leading from there in the direction of travel to the exterior.
- (y) Where stairways discharge through corridors and passageways the height of the corridors and passageways shall not be less than 2.4 meters.
- (a) A staircase shall not be arranged round a lift shaft unless the latter is totally enclosed by a material having a fire resistance rating not lower than that of the type of construction of the former.
- (b) Hollow combustible shall not be permitted.
- (c) The minimum width of an internal staircase shall be 100 cm.
- (d) The minimum width of treads without nosing shall be 25 cm. for an internal staircase. The treads shall be constructed and maintained in a manner to prevent slipping.
- (e) The maximum height of a riser shall be 19 cm. and the number of risers shall be limited to 12 per flight.
- (f) Hand rails shall be provided with minimum height of 100 cm. and shall be firmly supported.
- (g) The use of spiral staircase shall be limited to low occupant load and to a building of height of 9 meters, unless they are connected to platform such as balconies and terraces to allow escape to pause. A spiral staircase shall be not less than 300 cm. in diameter and have adequate head room.
- (h) The width of a horizontal exit shall be same as for the exit door
- (i) The horizontal exit shall be equipped with at least one fire door of self closing type.
- (j) The floor area on the opposite or refuge side of a horizontal exit shall be sufficient to accommodate occupants of the floor areas served allowing not less than 0.3 square meter per person. The refuge area shall be provided with exits adequate to meet the requirements of this sub rule. At least one of the exits shall lead directly to the exterior.

- (k) Where there is difference in level between connected areas for horizontal exit, ramps, not more than 1 in 8 slopes shall be provided for this purpose steps shall not be used.
- (l) Doors in horizontal exits shall be openable at all times.
- (m) Ramps with a slope of not more than 1 in 10 to substituted for the requirements of staircase. For all slopes exceeding 1 in 10 and wherever the use in such as to involve danger of slipping, the ramp shall be surfaced with non-slipping material.
- (n) In any building not provided with automatic fire alarm a manual fire alarm system shall be provided if the total capacity of the building is over 500 persons, or if more than 25 persons are employed above or below the ground floor, except that no manual fire alarm shall be required in one-storey buildings where the entire area is undivided and all parts thereof are clearly visible to all occupants.
- (10) First-aid fire fighting arrangements-
 - (a) In every factory there shall be provided and maintained adequate and suitable fire fighting equipment for fighting fires in the early stages, those being referred to as first-aid fire fighting equipment in this rule.
 - (b) The types of first-aid fire fighting equipment to be provided shall be determined by considering the different types of fire risks which are classified as follows:-
 - "Light Hazard".- Occupancies like offices, assembly halls canteens, restroom, ambulances, rooms and the like;
 - "Ordinary Hazard ":- Occupancies like saw mills carpentry shop, shall timber yards, book binding shops engineering workshop and the like;
 - "Extra Hazard".- Occupancies like large timber yards, godowns storing fibrous materials, flour mills, cotton mills, jute mills, large wood working factories and the like;
 - (i) "Class A Fire":- Fire due to combustible materials such as wood, textiles, paper, rubbish and the like.
 - (ii) "Class B Fire":- Fire in flammable liquids like oil, petroleum products, solvents, grease, paints etc.
 - (iii) "Class C fire":-Fire arising out of gaseous substances.
 - (iv) "Class D Fire":- Fire from reactive chemicals, active metals and the like.
 - (v) "Class E Fire":- Fire involving electrical equipment and machinery and the like.

- (c) The Number and types of first-aid fire-fighting equipment to be provided for "light hazard occupancy shall be as given in **Schedule XIII** for ordinary hazard or extra hazard occupancies equipment as given in paragraph 12 shall be provided in addition to that given in the schedule.
- (d) The first-aid fire-fighting equipment shall confirm to the relevant Indian standards.
- (e) As far as possible the first-aid fire-fighting equipment shall be similar in shape and appearance and shall have the same method of operation.
- (f) All first aid fire-fighting equipment shall be placed in a conspicuous position and shall be readily and easily accessible for immediate use. Generally these equipment shall be places as near as possible to the exits or stair landing or normal routes of escape.
- (g) All water buckets and bucket pump type extinguishers shall be filled with clean water. All send bucket shall be filled with clean, dry and fine sand.
- (h) All other extinguishers shall be charged with appropriately in accordance with the instructions of the manufacturer.
- (i) Each first-aid and fire-fighting equipment shall be allotted serial number by which it shall be referred to in the records. The following details shall be painted with white paint on a body of each equipment.
 - 1. Serial number;
 - 2. Date of last refilling; and
 - 3. Date of last inspection.
- (j) First-aid fire fighting equipment shall be placed on platforms or in cabinets in such away that their bottom is 750 mm above the floor level. Fire buckets shall be placed on hooks attached to a suitable stand or wall in such a way that their bottom is 750 mm above the floor level. Such equipment if placed outside the building, shall be under sheds or covers.
- (k) All extinguishers shall be thoroughly cleaned and recharged immediately after discharge. Sufficient refill material shall be kept readily available for this purpose at all times.
- (l) All first-aid fire fighting equipment shall be subjected to routine maintenance inspection and testing to be carried out properly trained persons. Periodically of the routine maintenance inspection and text shall confirm to the relevant Indian Standards.
- (11) Other fire fighting arrangements-
 - (a) In every factory I adequate provision of water supply for fire fighting shall be made and where the amount of water required in liters per minute, as calculated from the formula A+B+C+D divided by 20 is 550 or more power driven trailor pumps of adequate capacity to meet the requirement of water as calculated above shall be provided and maintained.

In the above formula-

A = The total area in square meters of all floors including galleries building of the factory;

B = The total area in square meters of all floors and galleries including open spaces in which combustible materials are handed or stored.

C = The total area in square meters of all floors over 15 meters above ground level; and

D = The total area in square meters of all floors of all buildings other than those of fire resisting construction.

Provided that in areas where the fire risk involved does not require use of water, such areas under B, C or D may, for the purpose of calculation, be halved

Provided further that where the areas under B, C or Dare protected by permanent automatic fire fighting installations approved by any fire association or fire insurance company such areas may for the purpose of calculation, be halved.

Provided also that where the factory is situated at not more than 3 kilometers from an established city or town fire service, the pumping capacity based on the amount of water arrived at by the formula above may be reduced by 25%, but no account shall be taken of this reduction in calculating water supply required under clause (a).

- (b) Each trailor pump shall be provided with equipment as per **schedule XIV**. Such equipment shall confirm to the relevant Indian Standards.
- (c) Trailor pump shall be housed in a separate shed or sheds which shall be sited closed to a principal source of water supplies in the vicinity of the main risks of the factory,
- (d) In factories where the area is such as cannot be reached by man-hauling of trailor pumps within reasonable time vehicles with towing attachment shall be provided at the scale of one for every four trailor pumps with a minimum of one such vehicle kept available at all times,
- (e) Water supply shall be provided to give flow of water as required d under clause (a) for at least 100 minutes. At least 50% of this water supply or 450,000 liters whichever is less shall be in the form of static tanks of adequate capacities (not less than 450,000 liters each) distributed round the factory with due regards to the potential fire risks in the factory. Where piped supply is provided, the size of the main shall not be less than 15 centimeters diameter and it shall be capable of supplying a minimum of 4500 liters per minute at a pressure of not less than 7 kilograms per square centimeter.
- (f) All trailor pumps including the equipment provided with them and the vehicles for towing them shall be maintained in good condition and subjected to periodical inspection and testing as required.
- (12) Personnel in charge of equipment and for fire fighting, fire drills, etc.-

- (a) The first-aid and other fire fighting equipment to be provided as required in sub rule 10 & 11 shall be in charge of a trained responsible person.
- (b) Sufficient number of persons shall be trained in the proper handling of fire fighting equipment as referred to in clause (a) and their use against the types of fire for which they are intended to ensure that adequate number of persons are available for fire fighting both by means of first-aid fire fighting equipment and others. Such persons shall be provided with clothing and equipment including helmets, belts, and boots preferably gumboots. Wherever vehicles with towing attachment are to be provided as required in clause (d) of sub-rule (11) sufficient number of persons shall be trained in driving these vehicles to ensure that trained persons are available for driving them whenever the need arises.
- (c) Fire fighting drills shall be held as often as necessary and at least once in every period of 2 months.
- (13) Automatic sprinklers and fire hydrants shall be in addition and not in substitution of the requirements in sub rule (10) and (11)
- (14) If the Chief Inspector is satisfied in respect of any factory or any part of the factory that owing to the exceptional circumstances such as inadequacy of water supply or infrequency of the manufacturing process or for any other reason, to be recorded in writing, all or any of the requirements of the rules are impracticable or not necessary for the protection or workers, he may by order in writing (which he may at his discretion revoke) exempt such factory or part of the factory from all or any of the provisions of the rules subject to conditions as he such order prescribe.

71. Qualification:-

- 1(a) A person shall not be eligible for appointment as Safety Officer unless he:
 - (i) Possesses a recognised degree in any branch of engineering or technology and has had practical experience of working in factory in a supervisory capacity for a period of not less than 2 years; or a recognized degree in physics or chemistry and has had practical experience of working in a factory in a supervisory capacity for a period of not less than 5 years; or a recognised diploma in any branch of engineering or technology and has had practical experience of working in a factory in a supervisory capacity for a period of not less than 5 years.
 - (ii) Possesses a degree or diploma in industrial safety recognised by the I State Government in addition to possessing other qualification laid down in the said sub rule.
 - (iii) has adequate knowledge of the language spoken by majority of the workers in the region in which the factory where he is to be appointed is situated.
- (b) Notwithstanding the provision contained in clause (a), any person who:-

Possesses a recognised degree or diploma in engineering or technology and has had experience of not less than 5 years in a department of the Central or Union Territory, State Government which deals with the administration or the Factories Act! 1948; or

Possesses a recognised degree or diploma in engineering or technology and had experience of not less than 5 years, Full time, on training education consultancy, or research in the field of accident prevention in industry or in any institution, shall also be eligible for appointment as a Safety Officer:

Provided that the Chief Inspector may, subject to such conditions as he may specify, grant exemption from the requirements of this sub-rule if in his opinion a suitable person possessing the necessary qualification and experience is hot available for appointment:

Provided further that in the case of a person who has been working as a Safety Office for a period not less than 5 years on the date of commencement of this rule, the Chief Inspector may, subject to such conditions as he may specify, relax all or any of the above said qualifications.

(2) Conditions of Service:-

- (a) Where the number of Safety Officers to be appointed in a factory as required by a notification in the Official Gazette exceeds one, one of them shall be designated as the Chief Safety Officer and shall have a Status higher than that of the others. The Chief Safety Officer shall be in overall charge of the safety functions as envisaged in sub-rule (3), the other safety Officers working under his control.
- (b) The Chief Safety Officer or the Safety Officer in the case of factories where only one Safety Officer is required to be appointed, shall be given the status of a senior executive and he shall work directly under the control of the Chief Executive of the factory. All other Safety Officers shall be given appropriate status to enable them to discharge their function effectively.
- (c) The scale of pay and the allowances to be granted to the Safety Officer including the Chief Safety Officer and the other conditions of their service shall be the same as those of the officers of corresponding status in the factory.;
- (d) In the case of dismissal or discharge, a Safety Officer shall have a right to appeal to the State Government whose decision thereon shall be final.

(3) Duties of Safety Officer.-

- (a) The duties of a Safety Officer shall be to advise and assist the factory management in the fulfillment of its obligations, statutory or otherwise concerning prevention of personal injuries and maintaining a safe working environment. These duties shall include the following namely:-
 - (i) to advise the concerned departments in planning and organizing measures necessary for the effective control of personal injuries.
 - (ii) to advise on safety aspects in all job studies, and to carry out detailed job safety for the selected jobs;

- (iii) to check and evaluate the effectiveness of the action taken or proposed to be taken to prevent personal injuries;
- (iv) to provide advice on matters related to carrying out ensuring high quality and availability of personal protective equipment;
- (v) to provide advice on matters related to carrying out plant safety inspection;
- (vi) to carry out plant safety inspection in order to observe the physical condition of work and the work practices and procedures followed by workers and to render advice on measures to be adopted for removing the unsafe actions by worker;
- (vii) to investigate selected accident;
- (viii) to render advice on matters related to reporting and investigation of industrial accidents and diseases;
- (ix) to investigate the cases on industrial disease contracted and dangerous occurrence reported under Rule 96;
- (x) to advise on the maintenance of such records as are necessary relating to accidents, dangerous occurrences and industrial diseases;
- (xi) to promote setting up of safety committees and act as advisor and catalyst to such committees;
- (xii) to organise in association with the concerned departments, campaigns, competitions, contests and other activities which will develop and maintain the interest of workers in establishing and maintaining Safe Conditions of work and procedures; and
- (xiii) to design and conduct either independently or in collaboration with the training departments suitable training and educational programmes for the prevention of Personal injuries.
- (4) Facilities to be provided to Safety Officers. An occupier of the factory shall provide each Safety Officer with such facilities equipment and information as are necessary to enable him to discharge his duties effectively.
- (5) Prohibition of performance of other Duties. No Safety Officer shall be required or permitted to do any work which is inconsistent with or detrimental to the performance of the duties prescribed in sub-rule (3).

72. Safety committee:- (1) In every factory-

- (a) wherein 250 or more workers are ordinarily employed;
- (b) which carries on any process or operation declared to be dangerous under section 87 of the Act; or

- (c) which carries on hazardous process as defined under section 2 (cb) of the Act, there shall be a safety committee.
- (2) The representative of the management of safety committee shall include -
 - (a) A senior official, who by his position in the organisation can contribute effectively to the functioning of the committee, shall be the chairman;
 - (b) A safety officer, and a factory Medical Officer wherever available and the Safety Officer in such a case shall be the Secretary of the committee.
 - (c) A representative each from the production maintenance and purchase departments.
- (3) The worker's representatives of this committee shall be elected by the workers.
- (4) The tenure of the committee shall be two years.
- (5) Safety committee shall meet as often as necessary but at least once in every quarter. The minutes of the meeting shall be recorded and produced to the Inspector on demand.
- (6) Safety committee shall have the right to adequately and suitable informed of-
 - (a) Potential safety and health hazard to which the workers, may be exposed at work place;
 - (b) Data on accidents as well as data resulting from surveillance of the working environment and of the health of workers exposed to hazardous substances so far as the factory is concerned provided that the committee undertakes to use the date on a confidential basis and solely to provide guidance and advice on measure to improve the working environment and the health and safety of the workers.
- (7) Function and duties of the safety committee shall include-
 - (a) assisting and cooperating with the management in achieving the alarms and objectives outlined in the "Health and safety policy" of the occupier;
 - (b) dealing with all matters concerning health, safety and environment and to arrive at practicable solutions to problems encounter
 - (c) creating safety awareness amongst all workers;
 - (d) undertaking educational, training and promotional activities;
 - (e) discussing reports on safety, environmental and occupational health surveys, safety audits, risk assessment, emergency and disaster management plans and implementation of the recommendations made in the reports;
 - (f) carrying out health and safety surveys and identifying causes of accidents;

- (g) looking into any complaint made on the likelihood of an imminent danger to the safety and health of the workers and suggesting corrective measures; and
- (h) reviewing the implementation of the recommendation made by it.
- (8) Where owing to the size of the factory or any other reason, the functions referred to in sub-rule (7) cannot be effectively carried out by the safety committee, it may establish sub-committee as may be required to assist it.

73. Ovens and driers:-

- (1) Application:- This rule shall apply to ovens and driers except those used in laboratories or kitchens of any establishment and those which have a capacity below 325 litres.
- (2) Definition:- For the purpose of this rule, oven or drier means any enclosed structure, receptacle compartment of box which is used for baking drying or temperature higher than the ambient temperature of the air in the room or space in which the oven or drier is situated and in which a flammable or explosive substance is likely to be evolved with in the enclosed structure, receptacle, compartment or box or part thereof on account of the otherwise processed within it.
- (3) Separate electrical connection:- Electrical power supplied to every oven or drier shall be by means of a separate circuit provided with an isolation switch.
- (4) Design, construction, examination and testing-
 - (a) Every oven or drier shall be properly designed on sound engineering practice and be good construction sound materials and adequate strength, free from any patent defects and safe if properly used.
 - (b) No oven or drier shall be taken into use in a factory for the first time unless a "competent person" has thoroughly examined all its parts and carried out the tests as are required to establish that the necessary safe system and controls provided for safety in operation for the processes for which it is to be used and a certificate of such examination and tests signed by that competent person has been obtained and kept available for inspection.
 - (c) All parts of an oven or drier which has undergone any alteration or repair which has effect of modifying any of the design characteristics, shall not be used unless a thorough examination and tests as have been mentioned in clause (b) has been carried out by a competent person and a certificate of such examination and tests signed by that "competent person" has been obtained and is kept available for inspection.

(5) Safety Ventilation-

- (a) Every oven or drier shall be provided with a positive and effective safety ventilation system using one or more motor driven centrifugal fans so as to dilute any mixture of air and any flammable substance that may be formed within the oven or drier and maintain the concentration of the flammable substance in the air at safe level of dilution.
- (b) The safe level of dilution referred to in clause (a) shall be so as to achieve a concentration of the concerned flammable substance in air of not more than 25 per cent of its lower explosive limits.

Provided that a level of concentration in air upto 50% of the lower explosive limits of the concerned flames or substance may be permitted to exist subject to installation and maintenance of an automatic device which-

- (i) shows continuously the concentration of the flammable substance in air present in the oven or drier at any instant;
- (ii) sounds an alarm when the concentration of the flammable substance in air in any part of the oven or drier reaches a level of 50% of its lower explosive limits; and
- (iii) shuts down the heating system of the oven or drier automatically when the concentration in air of the flammable substance in any part of the oven or drier reaches a level of 60% of its lower explosive limits is provided to the oven or drier and maintained in working condition.
- (c) On oven or drier shall be operated without its safety ventilation system working in an efficient manner.
- (d) No oven or drier shall be operated with a level of dilution less than what is referred to in clause (b).
- (e) Exhaust ducts of safety ventilation systems should be as designed and placed that their ducts discharge the mixture of air and flammable substance away from the work-rooms and not near windows or doors or other openings from where the mixture could re-enter the workroom.
- (f) The fresh air admitted into the oven or drier by means of the safety ventilation system shall be circulated adequately by means of circulating fan or fans through all parts of the oven or drier so as to ensure that there are no locations where the flammable substance can accumulate in the air or become pocketed to any dangerous degree.
- (g) Throttling dampers in any safety ventilation system should be so designed by cutting away a portion of the damper otherwise that the system will handle at least the minimum ventilation rate required for safety when they are set in their maximum throttling position

(6) Explosion panels-

- (a) Every oven or drier having an internal total space of not less the half cubic meter shall be provided with suitable designed explosion panels so as to allow release of the pressure of any possible explosion within the oven or drier through explosion vents. The area of opening to be provided by means of such vents together with the area of openings of any recess doors which are provided with suitable arrangements for their release in case of an explosion shall be not less than 2200 square centimeter for everyone cubic meter of volume of the oven or drier. The design of the explosion panels and doors as above said shall be such as to secure their complete release under an interval pressure of 0.25 kg. per square centimeter.
- (b) The explosion releasing panels shall as far as practicable be situated at the roof of the oven or drier or at those portions of the walls where persons do not remain in connection with operation of the oven or drier.

(7) Interlocking arrangements-

- (a) In each oven or drier different inter-locking arrangements shall be provided and maintained to ensure that-
 - (i) All ventilating fans and circulating fans whose failure would adversely affect the ventilation rate of flow pattern are in operation before any mechanical conveyor that may be provided for feeding the articles or substance to be processed in the oven or drier is put into operation;
 - (ii) Failure of any of the ventilation or circulating fans will automatically stop any conveyor as referred to in clause (1) as may be provided as well as stop the fuel supply by closing the, shut off valve and shut off the ignition in the case of gas or all fired ovens and in the case of electrically heated ovens switch off the electrical supply to the heaters;
 - (iii) The above said mechanical conveyor is set in operation before the above said shut off valve can be energized; and
 - (iv) The failure of the above said conveyor will automatically close the above said shut of valve in the case of ovens and driers heated by gas, oil or steam and deactivate the ignition system or cut off the electrical heaters in the case of electrically heated ovens or furnaces.

(8) Automatic pre-ventilation:-

Every oven or drier heated by oil, gas steam or electricity shall be provided with an efficient arrangement for automatic pre-ventilation consisting of at least 3 volume changes with fresh air by operation of safety ventilation fans and the circulating fans (if used) so as to a fact purging of the oven or drier of any mixture of air and a flammable substance before the heating system can be achieved and before the conveyor can be placed in position.

(9) Temperature control:-

Every oven or drier shall be provided with an automatic arrangement to ensure that the temperature within does not exceed a safe upper present limit to be decided in respect of the particular processing being carried on.

(10) Multistage Processes:-

Wherever materials are to be processed in oven or driers in successive operations, suitable arrangement should be provided to ensure that the operating temperatures necessary for safe operation at each steps are maintained within the design limits.

- (11) Combustible substances not to drip on electrical heaters or burners fame.-Effective arrangements shall be provided in every oven or drier to prevent dripping of combustible substances in electric heaters or burner flame used for heating.
- (12) Periodical examination, testing and maintenance--
 - (a) All parts of every oven and drier shall be properly maintained and thoroughly examined and the various controls as maintained in this rule and the working of the oven or drier tested at frequent intervals to ensure its safe operation by a responsible person designated by the occupier or manager, who by his experience and knowledge of necessary precautions against risks of explosion is fit to undertake such work.
 - (b) A register shall be maintained in which the details of the various tests carried out from time to time under clause (a) shall be entered and every entry made shall be signed by the person making the tests.
- (13) Training of operators.- No person shall be assigned any task connected with operation of any oven or drier unless he has completed 18 years of age, and he is properly trained.

(14) Polymerising machines-

- (a) Printed fabric shall be thoroughly dried by passing them over drying can or through hot flue or other equally effective means before the same is allowed to pass through polymerising machines.
- (b) Infrared may heaters of polymerizing machines shall be cutoff while running the prints.

74. Thermic fluid heaters:-

- (1) All heaters shall be such construction that coils are removable for periodic cleaning visual inspection and hydraulic test
- (2) Suitable arrangements shall be made for cooling the furnace effectively in case of power failure.
- (3) Before restarting the furnace it shall be effectively purged.
- (4) Velocity of flow of the thermic fluid shall not be allowed to fall below the minimum recommended by the manufacturers while the heater is in operation.
- (5) The thermic fluid shall be circulated in a closed circuit formation with an expansion-cum debrator tank. This tank shall be located outside the shed where the heater is installed.
- (6) Every heater shall be provided with a photo resistor actuated audio-visual alarm to indicate flame failure and automatic burner cut off.
- (7) The stack temperature monitor-cum-controller with audio-visual alarm shall be provided so as warn the operator in case the outlet temperature exceeds the specified minimum.
- (8) Where inspection doors are provided on the furnace they shall be interlocked with the burner itself so that they cannot be opened until burner is shut off and furnace is cooled sufficiently.
- (9) All heaters hall also be provided with the following safety devices-;
 - (a) Level control in the expansion tank;
 - (b) Temperature control of the thermic fluid;
 - (c) Differential pressure switch on the outlet line of the heater tubes; and
 - (d) Temperature control device for the fuel oil supply to the burner.
- (10) All devices mentioned in paragraph 9 shall have interlocking arrangement with burner so that in case of any pre-determined limits being crossed the supply of fuel and air to burner shall automatically visual alarms.
- (11) All safety interlocks when operated shall be indicated on the control panel of the heater by a suitable audio visual alarm.
- (12) Every heater unit shall be provided as a standard accessory an arrangement for shifting with low pressure steam or nitrogen for putting out the fire.
- (13) Electric panel for the heater shall be located near the heater but not so close as to be exposed to s Foiling or leaking oil.
- (14) The heater shall be located in a place segregated from other manufacturing activities-

- (15) Explosion vent shall be as installed that release takes place at safe location.
- (16) The heater coil shall be subjected to pressure test by competent person once at least in every 12 months. The test pressure shall not be less than twice the operating pressure.
- (17) If repair are carried out to the coil, it shall be tested before taking it into use.
- (18) The thermic fluid shall conform to the specification prescribed by the manufacturers and shall be tested by competent person for suitability at least once in every three months period. Such test shall include test for acidity, suspended matter, as contents, viscosity and flash point.
- (19) Closing of the internal surface of the heater or soot and check up of refractory surface on the inside shall be carried out every month or as often as required depending upon working conditions. The coils shall be removed and surface of the coils cleaned thoroughly once at least in a period of six months. The burner, nozzles, oil filters and pumps shall be cleaned once a week during the period of use.
- (20) A separate register containing the following information shall be maintained-
- (a) weekly checks carried out confirming the effectiveness of the interlock;
- (b) weekly checks confirming that all accessories are in good state of repairs; and
- (c) information recording fuel oil temperature, pressure, thermic fluid inlet/outlet pressure and temperature, fuel gas temperature, recorded at hourly interval.
- (21) The heater when in operation shall always be kept in-charge of a trained operator.

75. Site Appraisal Committee:-

- (1) Constitution: The following provisions shall govern the functioning of the site appraisal committee, hereinafter, be referred to as the "committee" in these rules-
 - (a) The state government may constitute a site appraisal committee and reconstitute the committee and when necessary;
 - (b) The state government may appoint a senior official of the factories Inspectorate preferably with qualification in Chemical Engineering to be the Secretary of the committee;
 - (c) The state government may appoint the following as members of the committee-
 - (i) A representative of the Fire Service Organisation of the state Government;
 - (ii) A representative of the State Department of Industries;

- (2) No member unless required to do so by a court of law shall disclose otherwise than in connection with the purpose of the Act, at any time any information relating to manufacturing or commercial business or any working process which may come to his knowledge during his tenure as a member on this committee.
- (3) Application for Appraisal of Sites.-
 - (a) Application for appraisal of sites in respect of the factories covered under section 2(cb) of the Act shall be submitted to the chairman of the site appraisal committee.
 - (b) The application for site appraisal along with 15 copies thereof shall be submitted in the form annexed to this rule. The committee may dispense with furnishing information on any particular item in the Application form if it considers the same to be relevant to the application under consideration.
- (4) Function of the committee-
 - (a) The Secretary shall arrange to register the application received for appraisal of site in a separate register and acknowledge the same within a period of 7 days.
 - (b) The Secretary shall fix up mooting in such a manner that all the applications received and registered are referred to the committee within a period of one month from the date of their receipt.
 - (c) The committee may adopt a procedure for its working keeping in view of the need for expeditious disposal of applications.
 - (d) The committee shall examine the applications for appraisal of a site with reference to the prohibitions and restrictions on the location of industry and the carrying on of processes and operations in different area as per the provisions of rule 5 of the Environment (Protection) Act, 1986.
 - (e) The committee may call for documents, examine, experts, inspect of the site, if necessary and take other steps for formulating Its views in regard to the suitability of the site.
 - (f) Wherever the proposed site require clearance by the Ministry of Industry the application for site appraisal will be considered by the site appraisal committee only after such clearance has been received.

FORMAT OF APPLICATION TO THE SITE APPRAISAL COMMITTEE

- 1. Name and address of the applicant.
- 2. Site ownership Date.
- 3. Revenue details of site such as survey no., plot no., etc.

- 4. Whether the site is classified as forest and if so, whether approval of the Central Government under section 5 of the Indian Forests Act, 1927 has been taken.
- 5. Whether the proposed site attracts the provisions of section 3(2) (V) of the E.P. ACT, 1986, if so, the nature of the restrictions.
- 6. Local authority under whose jurisdiction the site is located.
- 7. Site plan.
- 8. Site plan with clear identification of boundaries and total area proposed to be occupied and showing the following details near by the proposed site.
 - (a) Historical monument, if any, in the vicinity.
 - (b) Names of neighbouring manufacturing units and human habits, educational and training institutions, petrol installations, storages of LPG, and other hazardous substance in the vicinity and their distances from the proposed unit.
 - (c) Water sources (rivers, streams, canals, dams, water filteration plants, etc.) in the vicinity.
 - (d) Nearest hospitals, fire-stations, civil defence stations and police stations and their distances.
 - (e) High tension electrical transmission lines, pipe lines for water, oil gas or sewerage, railway line, roads, stations, jattice, and other similar installations.
- 9. Details of roll conditions and depth at which hard strata obtained.
- 10. Contour map of the area showing nearby hillocks and difference in levels.
- 11. Plot plan of the factory showing the entry and exit points, reads within water drains etc.
- 12. Project Report.
- 13. A summary of the salient features of the project.
- 14. Status of the organisation (Government, semi-government, public or private etc.)
- 15. Maximum number of persons likely to be working in the factory.
- 16. Maximum amount of power and water requirements and sources of their supply.
- 17. Block diagram of the buildings and installations in the proposed supply.
- 18. Details of housing colony, hospital, school and other infrastructural facilities proposed.

- 19. Organisation structure of the proposed manufacturing unit/ factory
- 20. Organisation diagram of
 - (i) Proposed enterprise in general
 - (ii) Health safety and Environment protection departments and their linkage to operation and technical departments.
- 21. Proposed Health and safety policy.
- 22. Area allocated for treatment of water and effluent.
- 23. Percentage outlay on safety, health and environment protection measures.
- 24. Meteorological date relating to the site.
- 25. Average minimum and maximum of
 - (i) Temperature;
 - (ii) Humidity
 - (iii) Wind velocities

 during the previous ten years.
- 26. Seasonal variations of wind direction.
- 27. Highest water level reached during the floods in the area recorded so far.
- 28. Lightening and seismic data of the area.
- 29. Communication links.
- 30. Availability of telephone/telex/wireless and other communication facilities for outside communication.
- 31. Internal communication facilities proposed.
- 32. Manufacturing process information.
- 33. Process flow diagram.
- 34. Brief write up on process and technology.
- 35. Critical process parameters such as pressure build up, temperature wise and run-away reactions.
- 36. Other external effects critical to the process having safety implications, such as engress of moisture or water contact with incompatible substances, sudden power failure.

Highlights of the build in safety / pollution control devices or measure / incorporated in the manufacturing technology.

- 37. Information of hazardous materials.
- 38. Raw materials, intermediates products and by-products and their quantities (enclose material safety data sheet in respect of each hazardous substances.
- 39. Main and intermediate storage proposed for raw materials/intermediates/products/by-products (maximum quantities to be stored at any time).
- 40. Transportation methods to be used for materials inflow and outflow, their quantities and likely routes to be followed.
- 41. Safety measures proposed for: -handling of materials,
 - (i) internal and external transportation, and
 - (ii) disposal (packing and forwarding of finished products).
- 42. Information on disposal/ disposal of wastes and pollutants.
- 43. Major pollutants (gas, liquid, solid) their characteristics and quantities (average and at peak-loads).
- 44. Quality and quantity of solid wastes generated, method of their treatment and disposal.
- 45. Air water and soil pollution problems anticipated and the proposed measures to control the same including treatment and disposal of effluents.
- 46. Process hazards information.
- 47. Enclose a copy of the report on environmental impact assessment.
- 48. Enclose a copy of the report on Risk Assessment study.
- 49. Published (open or classified) reports, if any on accident situations/occupational health hazards or similar plants else where (within or outside the country).
- 50. Information of proposed safety and occupational Health Measures.
- 51. Details of fire fighting facilities and minimum quantity of water and or other fire fighting measures needed to meet the emergencies.
- 52. Details of in house medical facilities proposed.
- 53. Information on emergence preparedness.
- 54. Onsite emergency plan.

- 55. Proposed arrangements if any for mutual aid scheme with the group of neighbouring factories.
- 56. Any other relevant information.

I certify that the information furnished above is correct to best of my knowledge and nothing of importance has been concealed while furnishing it.

76. Health and Safety:-

- (1) Policy:- The occupier of every factory except as provided for in sub-rule (2) shall prepare written statement of his policy in respect of health and a safety of workers of work.
- (2) All factories-
 - (a) Covered under section 2(m) (i) but employing less than 50 workers;
 - (b) Covered under section 2(m) (ii) but employing less than 100 workers are exempted from requirements of sub-rule (1).

Provided that they are not covered under the first schedule under section 2(cb) of the Act or carrying out processes or operations declared to be dangerous under section 87 of the Act.

- (3) Notwithstanding anything contained in sub-rule (2), the Chief Inspector may require the occupiers of any of the factories or class or description of factories to comply with the requirements of sub-rule (1), if, in his opinion, it is expedient to do so.
- (4) The Health and Safety Policy should contain or deal with:-
 - (a) Declare intension and commitment of the top management to health, safety and environment and compliance with all the relevant statutory requirement;
 - (b) Organizational setup to carry out the declared policy clearly assigning the responsibility at different levels; and
 - (c) Arrangements for marking the policy effective.
- (5) In particular the policy should specify the following:-
 - (a) Arrangement for involving the workers;
 - (b) Intention of taking into account the health and safety performance of individual at different levels while considering their career advancement;
 - (c) Fixing the responsibility of the contractors, sub-contractors, transported and other agencies entering the premises;
 - (d) Providing a resume of health and safety performance of the factory in its Annual report;

- (e) Relevant techniques and methods, such as safety audits and risk assessment for periodical assessment of the status on health, safety and environment and taking all the remedial measures;
- (f) Stating its intentions to integrate health and safety, in all decisions including these dealing with purchase of plants, equipment, machinery and material as well as selection and placement of personnel;
- (g) Arrangements for informing, educating and training and retraining its own employees at different levels and the public, wherever required.
- (6) A copy of the declared Health and Safety policy signed by the occupier shall be made available to the Inspector having jurisdiction over the factory and to the Chief Inspector ;-
- (7) The policy shall be made widely known by-
 - (a) Making copies available to all workers including contract workers, apprentices transport workers, suppliers etc.
 - (b) Displaying copies of the policy at conspicuous places; and
 - (c) Any other means of communications ma language understood by majority of workers.
- (8) The occupier shall revise the safety policy as often as maybe appropriate but it shall necessarily be revised under the following circumstances-
 - (a) Whenever any expansion or modification having implications on safety and health of persons at work is made; or
 - (b) Whenever new substances or articles are introduced in the manufacturing process having implications on health and safety persons exposed to such substances.

77. Collection and development and dissemination of information:-

- (1) The occupier of every factory carrying on a hazardous process shall arrange to obtain or develop information in the form of Safety Data Sheet in respect of every hazardous substances or material handled of the manufacture, transportation and storage in the factory. It shall be accessible upon request to a worker for reference.
 - (a) Every such Safety Data Sheet shall include the following information--
 - (i) The identity used in the label;
 - (ii) Hazardous ingredients of the hazardous substances;
 - (iii) Physical and chemical characteristics of the hazardous substance;
 - (iv) The physical hazards of the hazardous substance, including the potential for fire, explosion and reactivity;

- (v) The health hazard of the hazardous substance, including signs and symptoms of exposure and any medical conditions which are generally recognised as being aggravated by exposure to the substance;
- (vi) The primary route(s) of entry;
- (vii) The permissible limits of exposure prescribed in the Second Schedule under section 41-F of the Act, and in respect of a Chemical not covered by the said schedule, any exposure limit used or recommended by the manufactures importer or occupier;
- (viii) Any generally applicable precautions for safe handling and use of the hazardous substances, which are known, including appropriate hygienic practices protective measures during repairs and maintenance of contaminated equipment, procedures for clean up of spills and leaks;
- (ix) Any generally applicable control measures, such as appropriate engineering controls work practices or use of personal protective equipment;
- (x) Emergency and first-aid procedures;
- (xi) The date of preparation of the Safety Data Sheet, or the last change to it; and
- (xii) The name, address and telephone number of the manufacturers, importer, occupier or other responsible party preparing or distributing the Safety Data Sheet who can provide additional information on the hazardous substances and appropriate emergency procedures, if necessary.
- (b) The occupier while obtaining or developing a Safety Data Sheet in respect of a hazardous substances shall ensure that the information recorded accurately reflects the scientific evidence used in making the hazard determination. If the becomes of a substances, or ways to project against the hazards, this new information shall be added to the Safety Data Sheet as soon as practicable.
- (c) An example of such Safety Data Sheet is given in **schedule XV** to this Rule.
- (2) Every container of a hazardous substance shall be clearly labelled or marked to identify;
 - (a) the contents of the containers;
 - (b) the name and address of the manufacturer or importer of the hazardous substances;
 - (c) the physical and health hazards; and

(d) recommended personal protective equipment needed to work safety to the hazardous substances.

Information contained in this Safety data Sheet is believed to be reliable but no representation; guarantee or warranties of any kind are made as to its accuracy, suitability for a particular application or results to be obtained from them. It is upto the manufacturer/seller to ensure that the information contained in the Safety data Sheet is relevant to the product manufactured/ handled or sold by him as the case may be. The Government makes no warranties expressed or implied in respect of the adequacy of this document for any particular purpose.

Acronyms and Glossary of terms:

Gas: Chemical Abstract Service Registration Number.

Un Number: United Nations Number.

HAZCHEM Code: Emergency Action Code (EAC) Allocated by the Joint Committee of Fire Brigade Operations UK.

TDG Flammability: Transport of Dangerous Goods: Flammability Classification by United Nations.

NEPA: National Fire Association, USA.

LD50 and LC50 represent the dose in mg/hg of body weight and the concentration in mg/1 for 4 hours having lethal effect on 50% of the animals (rats) treated.

PEL: Permissible Exposure Limit as laid down in the statutes.

TLV: Threshold Limit Value as laid down by the American conference of Government Industrial hygienists (ACGIH), USA

STEL: Short Term Exposure Limit as laid down in the statutes or by the ACGIH.

GUIDELINES:

All efforts should be made to fill in all the columns. No column should be left blank. In case, certain information is not applicable or available, N / APP or N / Av sign may be used.

78. Disclosure of information to workers:-

- (1) The occupier of a factory carrying on a 'hazardous process' shall supply to all workers the following information in relation to handling of hazardous materials or substances in the manufacture, transportation, storage and other processes:-
 - (a) Requirements of Section 418, 41C and 41H of the Act;
 - (b) A list of 'hazardous processes' carried on in the factory;

- (c) Location and availability of all Safety Data Sheets as per Rule 61F.
- (d) Physical and health hazards arising from the exposure to or handling of substances;
- (e) Measures taken by the occupier to ensure safety and control of physical and health hazards;
- (f) Measures to be taken by the workers to ensure safe handling, storage and transportation of hazardous substances;
- (g) Personal Protective Equipment required to be used by workers employed in 'hazardous process' or 'dangerous operations';
- (h) Meaning of various labels and markings used on the containers of hazardous substances as provided under Rule 77.
- (i) Signs and symptoms likely to be manifested on exposure to hazardous substances and to whom to report;
- (j) Measures to be taken by the workers in case of any spillage or leakage of a hazardous substance;
- (k) Rule of workers vis-a-vis the emergency plan of the factory, in particular the evacuation procedure.
- (1) Any other information considered necessary by the occupier to ensure safety and health of workers.
- (2) The information required by sub-rule (1) shall be complied and made known to workers individually through supply of booklets or leaflets and display of cautionary notices at the work places.
- (3) The booklets, .leaflets and cautionary notices displayed in the factory shall be in the language understood by the majority of the workers, and also explain to them.
- (4) The Chief Inspector may direct the occupier to supply further information to the workers as deemed necessary.

79. Disclosure of information to the Chief Inspector:-

- (1) The occupier of every factory carrying on 'hazardous process' shall furnish, in writing, to the Chief Inspector, a copy of all the information furnished to the workers.
- (2) A copy of compilation of Safety Data Sheet in respect of hazardous substances used, produced or stored in the factory shall be furnished to the Chief Inspector and the local inspector.—
- (3) The occupier shall also furnish any other information asked for by the Chief Inspector from time to time for the purpose of the Act and Rules made thereunder.

80. Information on industrial wastes:-

- (1) The information furnished under Rules 78, and 79 shall include the quantity of the solid and liquid wastes generated per day, their characteristics and the method of treatment such as incineration of solid wastes, chemical and biological treatment of liquid waste and arrangements for their final disposal.
- (2) It shall also include information on the quality and quantity of gaseous waste discharged through the stocks or other openings, and arrangements such as provision of scrubbers, cyclones separators, electrostatic precipitators or similar such arrangements made for controlling pollution of the environment.
- (3) The occupier shall also furnish the information prescribed in the sub-rules (1) and (2) to the State Pollution Control Board.
- **81.** Review of the information furnished to workers etc:- (1) The occupier shall review once in every calendar year and modify, if necessary, the information furnished under Rule 78 and 79 to the workers and the Chief Inspector.
- **82. Confidentiality of Information:-** The occupier of a factory carrying on 'hazardous process' shall disclose all information needed for protecting safety and health of the workers to--
- (a) his workers; and
- (b) Chief Inspector, as required under Rules 78 & 79, if the occupier is of the opinion that the disclosure of details regarding the process and formulations will adversely affect his business interests, he may make a representation to the Chief Inspector stating the reasons for withholding such information. The Chief Inspector shall give an opportunity to the occupier of being heard and pass an order on the representation.

An occupier aggrieved by an order of Chief Inspector may prefer an appeal before the State Government within a period of 30 days. The State Government shall give an opportunity to the occupier of being heard and pass an order. The order of the state Government shall be final.

83. Medical Examination:-

- (1) Workers employed in a 'hazardous process' shall be medically examined by a qualified medical practitioner herein after referred to as Factory Medical Officer, in the following manner-
 - (a) Once before employment, to ascertain physical fitness of the person to do the particular job;
 - (b) Once in a period of 6 months to ascertain the health status of all the workers in respect of occupational health hazards and in case wherein the opinion of the Factory Medical Officer is necessary to do so at a shorter interval in respect of any worker;
 - (c) The details of pre-employment and periodical medical examinations carried out as aforesaid shall be recorded in the Health Register in **Form No.24.**

- (2) No person shall be employed for the first time without a certificate of Fitness granted by the Factory Medical Officer. If the Factory Medical Officer declared a person unfit for being employed in any process covered under sub-rule (i), such a person shall have the right to appeal to the Inspector who shall refer the matter to the Certifying Surgeon whose opinion shall be final in this regard. If the Inspector is also a Certifying Surgeon, he may dispose of the application himself.
- (3) Any findings of the Factory Medical Officer revealing any abnormality or unsuitability of any person employed in the process shall immediately be reported to the Certifying Surgeon who shall in turn, examine the worker and communicate his findings to the occupier within 30 days.- If the Certifying Surgeon is of the opinion that the worker so examined is inquired to be taken away from the process for health protection, he will direct the occupier accordingly, who shall not employ the said worker in the same process. However, the worker so taken away shall be provided with alternate placement unless he is in the opinion of the Certifying Surgeon fully incapacitated in which case the worker affected shall be suitably rehabilitated.
- (4) Certifying Surgeon on his own motion or a reference from an Inspector may conduct medical examination of a worker to ascertain the suitability of his employment in a hazardous process or for ascertaining his health status. The opinion of the Certifying Surgeon in such a case shall be final. The fee required for this medical examination shall be paid by the occupier.
- (5) The worker taken away from employment in any process under sub-rule (2) may be employed again in the same process only after obtaining the Fitness Certificate from the Certifying Surgeon and after making entries to that effect in the Health Register.
- (6) The worker required to undergo medical examination under these rules and for any medical survey conducted by or on behalf of the Central or the State Government shall not refuse to undergo such medical examination.

84. Occupational Health Centres:-

- (1) In respect of any factory carrying on 'hazardous process' there shall be provided and maintained in good order an occupational Health Centre with the services and facilities as per scale laid down hereunder-
 - (a) For factories employing upto 50 workers-
 - (i) the services of a Factory Medical Officer on retainer-ship basis in his clinic to be notified by the occupier. He will carry out the preemployment and periodical medical examination stipulated in rule 82 and render medical assistance during any emergency;
 - (ii) a minimum of 5 persons trained in first aid procedure amongst whom at least one shall always be available during the working period;
 - (iii) a fully equipped first aid box.

- (b) For factories employing 51 to 200 workers;
 - (i) An occupational Health Centre having a room with a minimum floor area of 15 sq.m. with floors and walls made of smooth and impervious surface and with adequate illumination and ventilation as well as equipment as per the schedule annexed to this Rule;
 - (ii) apart time Factory Medical Officer shall be in over all charge of the Centre who shall visit the factory at least twice in a week and whose services shall be readily available during medical emergencies;
 - (iii) one qualified and trained dresser-cum-compounder on duty throughout the working period;
 - (iv) a fully equipped first aid box in all the departments;
- (c) For factories employing above 200 workers:-
 - (i) one full time Factory Medical Officer for factories employing upto 500 workers and one mere Medical Officer for every additional 1000 workers or part thereof;
 - (ii) an Occupational Health Centre having at least 2 rooms each with a minimum floor area of 15 sq.m. with floor and walls made of smooth and impervious surface and adequate illumination and ventilation as well as equipment as per the schedule annexed to this Rule;
 - (iii) there shall be one nurse, one dresser-cum-compounder and one sweeper-cum-ward boy throughout the working period;
 - (iv) the Occupational Health Centre shall be suitably equipped manage medical emergencies.
- (2) The Factory Medical Officer required to be appointed under sub rule (1) shall have qualifications included in the Schedule to the Indian Medical Degrees Act of 1916 or in the Schedule to the Indian Medical Council Act, 1956 and possess a certificate of Training in Industrial Health of minimum three months duration recognised by the State Government.

Provided that -

- (i) a person possessing a Diploma in Industrial Health or equivalent shall not be required to possess the certificate of training as aforesaid;
- (ii) the Chief Inspector may, subject to such conditions as he may specify, grant exemption from the requirement of this sub-rule, if in his, opinion a suitable person possessing the necessary qualification is not available for appointment;

- (iii) in case of a person who has been working as a Factory Medical Officer, for a period of not less than 3 years on the date of commencement of this rule, the Chief Inspector may, subject to the condition that the said person shall obtain the aforesaid certificate of training within a period of 3 years relax the qualification.
- (3) The syllabus of the course leading to the above certificate and the organisations conducting the course shall be approved by the Directorate General of Factory Advice Services and Labour Institutes or the State Government in accordance with the guidelines issued by the DGF ASLI.
- (4) Within one month of the appointment of a Factory Medical Officer, the occupier of the Factory shall furnish to the Chief Inspector the following particulars:
 - (a) Name and address of the Factory Medical Officer;
 - (b) Qualification;
 - (c) Experience, if any, and
 - (d) The sub-rule under which appointed.

85. Ambulance Van:-

(1) In any factory carrying on 'Hazardous Process, there shall be provided and maintained in good condition, a suitably constructed ambulance van equipped with item as per sub-rule (2) and manned by a full time Driver-cum-mechanic and a Helper trained in first-aid, for the purpose of transportation of serious cases of accidents or sickness. The ambulance van shall not be used for any purpose other than the purpose stipulated herein and will normally be stationed at or near to the Occupational Health Centre;

Provided that a factory employing less than 200 workers, may make arrangements for procuring such facility at short notice from a nearby hospital or other places, to meet any emergency.

- (2) The ambulance should have the following equipments:
 - (a) General
 - -A wheeled stretched with folding and adjusting devices, with the head of the stretcher capable of being lifted upward;
 - -Fixed suction unit with equipment;
 - -Fixed oxygen supply with equipment;
 - -Pillow with case; sheets; Blanket; towels;
 - -Emesis Bag; Bed pan; Urinal; Glass.

(b) Safety equipment

- -Flares with life of 30 minutes; flood lights;
- -Flash lights; Fire extinguisher dry power type;
- -Insulatedgauntlets;
- (c) Emergency Care equipment
- (i) Resuscitation
 - -Portable suction unit; Portable oxygen units;
 - -Bag-valve-mask, band operated artificial ventilation unit;
 - -Airways, Mouth gaps; Trachestomy adaptors;
 - -Short spine board; I. V. Fluids with administration unit;
 - -B.P. Manometer; Cimn; Stethoscope
- (ii) Immobilization
 - -Long and short padded boards; Wire ladder splints;
 - -Triangular bandage; long and short spine boards;
- (iii) Dressings,
 - -Guaze pads 4" X 4"; Universal dressing 10" X 36"
 - -7 Rool of aluminium fails; soft roller bandage 6" X 5 yards; All besive tape in 3" roll;
 - -Safety pins;
 - -Bandage gheeing; Burn sheet
- (iv) Poisoning
 - -Syrup of Ipecas; Activated Charcoal prepacked in dozes; snake bite kit; Drinking water.
- (v) Emergency Medicines
 - -As per requirement (under the advice of Medical officer only)
- **86. Decontamination facilities:-** In every factory, carrying out 'Hazardous Process', the following provisions shall be made to meet emergency;
- (a) Fully equipped first aid box;

(b) Readily accessible means of water for washing by workers as well as for drenching the clothing of workers who have been contaminated with hazardous and corrosive substance; and such means shall be as per the scale shown in the Table below:

Table

	No. of Persons employed at any time	No. of drenching showers
(i)	Upto 50 workers	2
(ii)	Between 51 to 200 workers	2 + 1 for every additional 150 or part thereof
(iii)	Between 201 to 500 workers	5 + 1 for every additional 100 or part thereof
(iv)	501 workers and above	2 + 1 for every additional 200 or part thereof

- (c) A sufficient number of eye wash bottles filled with distilled water or suitable liquid, kept in boxes or cupboards conveniently situated and clearly indicated by a distinctive sign which shall be visible at all times.
- **87. Making available Health Records to workers:-** (1) The occupier of every factory carrying out a 'hazardous process' shall make accessible the health records including the record of worker's exposure to hazardous process or, as the case maybe, the medical records of any worker for his perusal under the following conditions:-
- (a) Once in every six months or immediately after the medical examination whichever is earlier;
- (b) If the factory Medical Officer or the Certifying Surgeon as the case may be, is of the opinion that the workers has manifested signs and symptoms of any notifiable disease as specified in the Third Schedule of the Act;
- (c) If the worker leaves the employment;
- (d) If anyone of the following authorities as direct
 - -The Chief Inspector of Factories;
 - -The Health Authority of the Control or State Government;
 - -Commissioner of Workman's Compensation;
 - -The Director General, Employee's, State Insurance Corporation (Medical Benefits) and;
 - -The Director General, Factory Advice Services and Labour Institutes.
- (2) A copy of the up-to-date health records including the record of worker's exposure to hazardous process or, as the case may, the medical records shall be supplied to the workers on receipt of an application from him. X-ray plates and other medical diagnostic reports may also be made available for reference to his medical practitioner.

88. Qualifications, etc. of Supervisors:-

- (1) All persons who are required to supervise the handling of hazardous substance shall possess the following qualifications and experience;
 - (a) (i) A degree in chemistry or Diploma in Chemical Engineering or Technology with 5 years experience; or
 - (ii) A Master's degree in chemistry or a degree in chemical Engineering or Technology with 2 years experience. The experience stipulated above shall be in process operation and maintenance in the Chemical Industry.
 - (b) The Chief Inspector may require the supervisor to undergo training in Health and Safety.
- (2) The syllabus and duration of the above training and the organizations conducting the training shall be approved by the DGFASLI or the State Government in accordance with the guidelines issued by the DGFASLI.
- **89. Issue of guidelines:-** For the purpose of compliance with the requirements of subsection (1), (4) and (7) of section 41-B or 41-C of the Act, the Chief Inspector may, if deemed necessary, issue guidelines from time to time to the occupiers of Factories carrying on 'Hazardous Process'. Such guidelines may be based on National Standards, Codes of Practice, or recommendations of International Bodies such as ILO and WHO.

90. Collection, development and dissemination of information for Major Accident Hazard Installation:-

- (1) This rule shall apply to an industrial activity or isolated storage in which a hazardous chemical which satisfies any of the criteria laid down in Part I of **Schedule XVII.**
- (2) An occupier of an industrial activity or isolated storage in terms of sub-rule (1) of this rule shall arrange to obtain or develop information in the form of Safety Data Sheet as specified in Schedule appended to Rule 77. The information shall be made accessible to workers upon request for reference.
- (3) The occupier while obtaining or developing a Safety Data Sheet as specified in Schedule appended to Rule 77 in respect of a hazardous chemical handled by him shall ensure that the information is recorded accurately and reflects the scientific evidence used in making the hazard determination. In case, any significant information regarding a hazard of chemical is available, it shall be added to the Safety Data Sheet as specified in **Schedule XV**, as soon as practicable.
- (4) Every container of a hazardous chemical shall be clearly labeled or marked to identify:
 - (a) The contents of the container;
 - (b) The name and address of the manufacturer or importer of the hazardous chemical; and

- (c) The physical, chemical and toxicological data of the hazardous chemicals.
- (5) In terms of sub-rule (4) of this rule where it is impractical to label a chemical in view of the size of the container or the nature of the package, provision should be made for other effective means like tagging or accompanying documents.

91. Duties of Inspector: The Inspector shall-

- (a) inspect the industrial activity or isolated storage at least once in a calendar year,
- (b) send annually status report on the compliance with the Rules by occupiers to the Ministry of Environment and Forests through the Directorate General Factory Advice Service and Labour Institutes and Ministry of Labour, Government of India,
- (c) enforce direction and procedure in respect of industrial activities or isolated storage covered under the Factories Act, 1948 and in respect of pipe lines up to a distance of five hundred meters from the outside of the perimeter of the factory, regarding-
 - (i) notification of the major accidents as per rules 92 (1) and 92 (2);
 - (ii) notification of sites as per rules 94 and 95;
 - (iii) Safety Reports and Safety Audits as per rules 97 to 99;
 - (iv) notification of sites as per rules 94 and 95;
 - (v) Safety Reports and Safety Audits as per rules 97 to 99;
 - (vi) Preparation of "on-site Emergency Plans" as per rule 100 and involvement in the preparation of "Off-site Emergency Plans" in consultation with District Collector or District Emergency Authority.

92. General responsibility of the occupier:-

- (1) (a) An industrial activity in which a hazardous chemical, which satisfies any of the criteria laid down in Part I of **Schedule XVII** or is listed in Column 2 of Part II thereof, is or may be involved; and
 - (b) isolated storage in which there is involved a quantity of a hazardous chemical listed in Column 2 of **Schedule XVIII** which is equal to or more than the threshold quantity specified in this Schedule for that chemical in Column 3 thereof.
- (2) An occupier in terms of sub-rule (I) shall provide information on demand to show that he has -
 - (a) identified the major accident hazards; and

- (b) taken adequate steps to-
 - (i) prevent such major accidents and to limit their consequences to persons and the environment; and
 - (ii) provide to the persons working on the site with the information, training and equipment including antidotes necessary to ensure their safety and health;
 - (iii) prevents such major accidents and to limit their consequences to persons and the environment; and
 - (iv) provide to the persons working on the site with the information, training and equipment including antidotes necessary to ensure their safety and health.

93. Notification of Major Accidents:-

- (1) Where a major accident occurs on a site or in a pipeline, the occupier, shall, within 48 hours, notify the Inspector and Chief Inspector of that accident, and furnish thereafter to the Inspector and Chief Inspector a report relating to the accident in installments, if necessary, in **Schedule XXI**.
- (2) The Inspector and Chief Inspector shall, on receipt of the report in accordance with sub-rule (1) of this rule, undertake a full analysis of the major accident and send the requisite information to the Ministry of Environment and Forests through the Directorate General Factory Advice Service and Labour Institutes and Ministry of Labour, Government of India.
- (3) An occupier shall notify to the Inspector steps taken to avoid any repetition of such occurrence on a site.
- (4) The Inspector and Chief Inspector shall compile information regarding major accidents and make available a copy of the same to the Ministry of Environment and Forests through Directorate General Factory Advice Service and Labour Institutes and Ministry of Labour, Government of India.
- (5) The Inspector and the Chief Inspector shall inform the occupier in writing, of any lacunae which in their opinion needs to be rectified to avoid major accident.
- 94. Industrial activity or isolated storage to which Rules 94 to 102 apply:-(1)
 (a) Rules 94, 95, 100 and 102 shall apply to an industrial activity, other than isolated storage, in which there is chemical listed in Column 2 of **Schedule XIX** which is equal to or more than the threshold quantity specified in the entry for that chemical in Column 3;
 - (b) Rules 97 to 99 shall apply to an industrial activity other than isolated storage; in which there is involved a quantity of a hazardous chemical listed in Column 2 of **Schedule XIX** which is equal to or more than the threshold quantity specified in the entry for that chemical in Column 4.

- (c) Rules 94 and 95 shall apply to an isolated storage in which there is involved a quantity of a hazardous chemical listed in Column 2 of **Schedule XVIII** which is equal to or more than the threshold quantity specified in the entry for that chemical in Column 3; and
- (d) Rules 97 to 100 and 102 shall apply to an isolated storage in which there is involved a quantity of a hazardous chemical listed in Column 2 of **Schedule XVIII** which is equal to or more than the threshold quantity specified in the entry for that chemical in Column 4.

95. Notification of site:-

- (1) An occupier shall not undertake any industrial activity or isolated storage unless he has submitted a written report to the Chief Inspector containing the particulars specified in **Schedule XXII** at least 90 days before commencing that activity or before such shorter time as the Chief Inspector may agree and for the purposes of this sub-rule, an activity in which subsequently there is or is liable to be a threshold quantity given in Column 3 of **Schedules XVIII and XIX** or more of and additional hazardous chemical shall be deemed to be a different activity and shall be notified accordingly.
- (2) The Chief Inspector within 60 days from the date of receipt of the report in accordance with sub-rule (1) of this Rule shall examine and on examination of the report if he is of the opinion that contravention of the provisions of the Act or the rules made thereunder has taken place, he may issue notice for obtaining compliance.
- **96. Updating of the site notification:-** Where an activity has been reported in accordance with rule 94 (1) and the occupier makes a change in it (including an increase or decrease in the maximum quantity of a hazardous chemical to which this rule applies which is or is liable to be at the site or in the pipeline or at the cessation of the activity) which affects the particulars specified in that report or any subsequent report made under this rule, the occupier shall forthwith furnish a further report to the Inspector and the Chief Inspector.

97. Safety Reports and Safety Audit Reports:-

- (1) Subject to the following sub-rules of this rule an occupier shall not undertake any industrial activity or isolated storage to which this rule applies, unless he has prepared a Safety Report on that industrial activity containing the information specified in **Schedule XXIII** and has sent a copy of that report to the Chief Inspector at least ninety days before commencing that activity.
- (2) After the commencement of these rules, the occupiers of both the news and the existing industrial activities or isolated storages shall arrange to carry out safety audit by a competent agency to be accredited by an Accreditation Board to be constituted by the Ministry of Labour, Government of India in this behalf. Further, such auditing shall be carried out as under:-
 - (a) Internally once in a year by a team of suitable plant personnel.
 - (b) Externally once in two years by a competent agency accredited in this behalf.

- (c) In the year when an external audit is carried out internal audit need not be carried out.
- (3) The occupier within 30 days of the completion of the audit, shall send a report to the Chief Inspector with respect to the implementation of the audit recommendation.

98. Updating of safety reports under rule 97:-

- (1) Where an occupier has made a safety report in accordance with sub-rule (1) of rule 97, he shall not make any modification to the industrial activity or isolated storage to which that safety report relates which could materially affect the particulars in that report, unless he has made a further report to take account of those modifications and has sent a copy of that report to the Inspector and Chief Inspector at least ninety days before making those modifications.
- (2) Where an occupier has made a report in accordance with rule 97 and sub-rule (1) of this rule and that industrial activity or isolated storage is continuing, the occupier shall within three years of the date of the last such report make a further report which shall have regard in particular to new technical knowledge which has affected the particulars in the previous report relating to safety and hazard assessment, and shall within thirty days or in such longer times as the Chief Inspector may agree in writing, send a copy of the report to the Inspector and the Chief Inspector.
- **99.** Requirement for further information to be sent to the Inspector and the Chief Inspector: Where in accordance with rules 97 and 98, and occupier has sent safety report and safety audit report relating to an industrial activity of isolated storage to the Inspector and the Chief Inspector may, by a notice served on the occupier require him to provide such additional information as may be specified in the notice and the occupier shall send that information to the Inspector and the Chief Inspector within ninety days.

100. Preparation of On-Site Emergency Plan by the occupier:-

- (1) The It occupier shall prepare, keep up-to-date and furnish to the Inspector and Chief Inspector an "On-Site Emergency Plan" containing details specified in **Schedule XXIV** and detailing how major accidents will be dealt with on the site on which the industrial activity or isolated storage is carried on and that Plan shall include the name of the person who is responsible for safety on the site and the names of those who are authorised to take action in accordance with the Plan in case of an emergency.
- (2) The occupier shall ensure that the Emergency Plan prepared in accordance with sub-rule (1) of this rule, takes into account any modification made in the industrial activity or isolated storage and that every person on the site who is concerned with the Plan is informed of its relevant provisions.
- (3) The occupier shall prepare the Emergency Plan required under sub-rule (1) of this rule-
 - (a) before the commencement of industrial activity or isolated storage;

- (b) within ninety days of coming into operation of these rules in case of an existing industrial activity or isolated storage.
- (4) The occupier shall ensure that a mock drill of the On-site Emergency is conducted at least once in every six months,
- (5) A detailed report of the mock drill conducted under sub-rule (4) shall be made immediately available to the Inspector and Chief Inspector.

101. Information to be given to persons liable to be affected by a major accident:-

- (1) be in an area which may be affected by a major accident about-
 - (a) the nature of the major accident hazard; and
 - (b) the safety measures and 'DOs' and 'DON'Ts' which should be adopted in the event of a major accident.
- (2) The occupier shall take the steps required under sub-rule (1) of this rule to inform persons about an industrial activity or isolated storage before that activity is commenced, except that in respect of an existing industrial activity or isolated storage, the occupier shall comply with the requirements of sub-rule (1) of this rule within ninety days of coming into operation of these rules.
- **102. Disclosure of information:-** Where, for the purpose of evaluating information notified under rule 93 or rules 94 to 102, the Inspector or the Chief Inspector discloses that information to some other person, that other person shall not use that information for any purpose except a purpose of the Inspector or the Chief Inspector disclosing it, as the case may be, and before disclosing that information the Inspector or the Chief Inspector, as the case may be, shall inform that other person of his obligations under this rule.
- **103.** Power of the State Government to modify the Schedules:- The State Government may, at any time, by notification in the Official Gazette, make suitable changes in the Schedules.

Explanation:- For the purpose of rules 90 to 103

- (a) "hazardous chemical" means,-
 - (i) any chemical which satisfies any of the criteria laid down in Part I of the **Schedule XVII** and is listed in column 2 of Part II of this Schedule; or
 - (ii) any chemical listed in column 2 of **Schedule XVIII**; or
 - (iii) any chemical listed in column 2 of **Schedule XIX**;
- (b) "industrial activity" means an operation or process carried out in an factory referred to in **Schedule XX** involving or likely to involve one or more hazardous chemicals and includes on-site storage or on-site transport which is associated with that operation or process as the case may be;

- (c) "isolated storage" means storage where no other manufacturing process other than pumping of hazardous chemical is carried out and that storage involves at least a quantity of that chemical set out in **Schedule XVIII**, but does not include storage associated with a factory specified in **Schedule XX** on the same site;
- (d) "major accident" means an incident involving loss of life inside or outside the site or 10 or more injuries inside and/ or one or more injuries outside or release of toxic chemical or explosion or fire or spillage of hazardous chemical resulting in 'on-site' or 'off-site' emergencies or damage to equipment leading to stoppage of process or adverse effects to the environment;
- (e) "pipe line" means a pipe (together with any apparatus and works associated therewith, or systems of pipes (together with any apparatus and works associated therewith) for the Conveyance of hazardous chemical, other than a flammable gas as set out in column 2 of Part II of **Schedule XIX** at a pressure of less than 8 bars absolute;
- (f) "Schedule" means Schedule appended to these rules;
- (g) Words and expressions not defined in these rules but defined or used in the Factories Act, 1948, and the rules made thereunder have the same meanings as assigned therein;
- (h) For the purposes of rules 90 to 103 these rules may be called the Major Accident Hazards Control Rules.

CHAPTER V: WELFARE

104. Washing facilities:-

- (1) This rule shall come into force, in respect of any class or description of factories, on such dates as the State Government may, by notification in the official gazette, appoint in this behalf.
- (2) There shall be provided and maintained in every factory for the use of employed persons adequate and suitable facilities for washing which shall include soap and nail brushes or other suitable means of cleaning and the facilities shall be conveniently accessible and shall be kept in a clean and orderly condition.
- (3) Without prejudice to the generality of the foregoing provisions the washing facilities shall include:-
 - (a) a trough with taps or jets at intervals of not less than two feet, or
 - (b) wash-basins with taps attached thereto, or
 - (c) taps on stand-pipes, or
 - (d) showers controlled by taps, or
 - (e) circular troughs of the fountain type.

Provided that the Inspector may, having regard to the needs and habits of the workers, fix the proportion in which the aforementioned types of facilities shall be installed,

- (4) (a) Every trough and basin shall have a smooth, impervious surface and shall be fitted with a waste-pipe and plug,
 - (b) The floor or ground under and in the immediately vicinity of every trough tap, jet, wash basin, standpipe and shower shall be so laid or finished as to provide a smooth impervious surface and shall be adequately drained,
- (5) For persons whose work involves contact with any injurious or noxious substance there shall be at least one top for every fifteen persons; and for persons whose work does not involve such contact the number of taps shall be as follow:-

No. of Workers	No. of Taps
Upto 20	1
21 to 35	2
36 to 50	3
51 to 150	4
151 to 200	5
Exceeding 200 but not exceeding 500	5 plus one top for every 50 or fraction of 50
Exceeding 500	11 plus one top for every 100 or fraction of 100

- (6) If female workers are employed, separate washing facilities shall be provided and so enclosed or screened that the interiors are not visible from any place where persons of the other sex work or pass. The entrance to such facilities shall bear conspicuous notice in the language understood by the majority of the workers "For Women Only" and shall also be indicated pictorially.
- (7) The water supply to the washing facilities shall be capable of yielding at least six gallons a day for each person employed in the factory and shall be from a source approved in writing by the Health Officer, provided that where there the Chief Inspector is satisfied that such an yield is not practicable he may by certificate in writing permit the supply of a smaller quantity not being less the then one gallon per day for every person employed in the factory.

105. The following classes of factories shall provide therein suitable place for keeping clothing for work during working hours and for the drying of wet clothing.-

- (1) Glass Factories.
- (2) Iron & Steel Factories.
- (3) Oil Mills.
- (4) Chemical Factories.
- (5) Automobile Workshops.

- **106. First Aid Appliance:-** The first aid boxes or cup-boards shall be distinctively marked with a red cross on a white ground and shall contain the following equipment:-
- A. For factories in which the number of persons employed does not exceed ten or in the (case of factories in which mechanical power is not used) does not exceed fifty persons.-Each first aid box or cup-boards shall contain the following equipments:-
- (i) 6 small sterilized dressings.
- (ii) 3 medium size sterilized dressings.
- (iii) 3 large size sterilized dressings.
- (iv) 3 large size sterilized burn dressings.
- (v) 1 (1 oz.) bottle containing a two per cent, alcoholic solution of iodine.
- (vi) 1 (1 oz.) bottle containing sal-volatile having the dose and mode of administration indicated on the label.
- (vii) A snake-bite lancet.
- (viii) 1 (1 oz.) bottle of potassium permanganate crystals.
- (ix) 1 pair of scissors.
- (x) 1 copy of the first aid leaflet issued by the Chief Adviser, Factories, Government of India.
- (xi) Tables aspirin (Grs. 5) One dozen.
- (xii) Burn Ointment. One tube.
- (xiii) Dettol. One phial (about 2 ozs.)
- B. For factories in which mechanical power is used and in which the number of persons employed exceeds ten but does not exceeds fifty-Each first-aid box or cupboard shall contain the following equipment:-
- (i) 12 small sterilized dressings.
- (ii) 6 medium size sterilized dressings.
- (iii) 6 large size sterilized dressings.
- (iv) 6 large size sterilized burn dressings.
- (v) 6(1/2 oz.) packets sterilized cotton wool.
- (vi) 1 (2 oz.) bottle containing a two per cent alcoholic solution of iodine.
- (vii) 1 (2 oz.) bottle containing sal-volatile having the dose and mod of administration indicated on the liable.

- (viii) 1 roll of adhesive plaster.
- (ix) A snake bite lancet.
- (x) 1 oz. bottle of potassium permanganate crystals.
- (xi) 1 pair of scissors.
- (xii) 1 copy of first-aid leaflet issued by the Chief Adviser Factories, Government of India.
- (xiii) Tablets aspirin (Grs 5) Two dozen.
- (xiv) Burn Ointment Two tubes.
- (xv) Dettol Two Phial (about 2 ozs.)

C. For factories employing more than fifty persons. Each first-aid box or cupboard shall contain the following equipments:-

- (i) 24 small sterilized dressings.
- (ii) 12 medium size sterilized dressings-
- (iii) 12 large size sterilized dressings.
- (iv) 12 large size sterilized burn dressings.
- (v) 12 (1/2 oz.) packets sterilized cotton wool.
- (vi) 1 snake bite lancet.
- (vii) 1 pair of scissors.
- (viii) 2 (1 oz.) bottles of potassium permanganate crystals.
- (ix) 1 (4 oz.) bottles containing a two per cent alcoholic solution of iodine.
- (x) 1 (4 oz) bottle of sal-volatile having the dose and mode of administration indicated on the label.
- (xi) 1 copy of the first-aid leaflet issued by the Chief Adviser, Factories, Government of India.
- (xii) 12 rolls bandages 4 inches wide.
- (xiii) 12 rolls bandages 2 inches wide.
- (xiv) 2 rolls of adhesive plaster.
- (xv) 6 triangular bandages.
- (xvi) 2 packets of safety pins.

(xviii) 1 tourniquet.

(xix) Tablets asprin (grs. 5) Four dozen.

(xx) Burn Ointment Four tubes.

(xxi) Dettol Four Phial (about 2 ozs.)

(xvii) A supply of suitable splints.

Provided that items (xii) to (xviii) inclusive need not be included in the standard first-aid box or cupboard (a) where there is a properly equipped ambulance room, or (b) if at least one box containing such items and placed and maintained in accordance with the requirements of Section 45 is separately provided.

D. In lieu of the dressings required under items (i) and (ii) there may be substituted adhesive wound dressings approved by the Chief Inspector of Factories.

107. Ambulance Room:-

(1) The ambulance room or dispensary shall be in charge of qualified medical practitioner assisted by at least one qualified nurse and such subordinate staff Inspector may direct.

Explanations:- "Qualified medical practitioner" means a person holding a qualification granted by an authority specified in the Schedule to the Indian Medical Degrees Act, 1916 (VII of 1916) or in the Schedules to the Indian Medical Council Act, 1956.

- (2) The ambulance room or dispensary shall be separated from the rest of the factory and shall be used only for the purpose of first-aid treatment and rest. It shall have a floor area of at least 250 sq. ft. and smooth, hard and impervious walls and floor and shall be adequately ventilated and lighted by both natural and artificial means. An adequate supply of wholesome drinking water shall be laid on and the room shall contain at least:-
 - (i) A glazed sink with hot and cold water always available.
 - (ii) A table with a smooth top at least 6" x 3'6".
 - (iii) Means for sterilizing instruments.
 - (iv) A couch.
 - (v) Two stretchers.
 - (vi) Two buckets or containers with close fitting lids.
 - (vii) Two rubber hot water bags.
 - (viii) A kettle and spirit stove or other suitable means of boiling water.
 - (ix) Twelve plain wooden splints 36" x 4" x 1/4".
 - (x) Twelve plain wooden splints 14" x 3" x 1/4".

- (xi) Six plain wooden splints 10" x 2" x 1/2".
- (xii) Six woolen blankets.
- (xiii) One pair of astery forceps.
- (xiv) One bottle of brandy.
- (xv) Two medium size sponges.
- (xvi) Six hand towels.
- (xvii) Four "kidney" trays.
- (xviii) For cakes carbolic soap.
- (xix) Two glass tumblers and two wine glasses.
- (xx) Two clinical thermometers.
- (xxi) Graduated measuring glass with teaspoon.
- (xxii) One eye bath.
- (xxiii) One bottle (2 lbs.) carbolic lotion 1 in 20.
- (xxiv) One screen.
- (xxv) Three chairs.
- (xxvi) One elecric hand torch.
- (xxvii) Four first-aid boxes or cupboards stocked to the standards prescribed under item C of Rule 106.
- (xxviii) An adequate supply of anti-tetanus serum.
- (3) The occupier of every factory to which these Rules apply shall for the purpose of removing serious cases of accident or sickness, provide in the premises and maintain in good condition a suitable conveyance unless he has made arrangements for obtaining such a conveyance from a hospital.
- (4) A record of all cases of accident and sickness treated at the room shall be kept and produced to the Inspector of Certifying Surgeon when required.
- **108.** Canteens:- Rules 108 to 114 shall come into force in respect of any class or description of factories on such dates as the State Government may, by notification in the official gazette, appoint in this behalf.
- (2) The occupier of every factory notified by the Chief Commissioner, and wherein more than two hundred and fifty workers are ordinarily employed shall provide in or near the factory an adequate canteen according to the standards prescribed in these Rules.

- (3) The Manager of a factory shall submit for the approval of the Chief Inspector plans and site plan, in duplicate, of the building to be constructed or adapted for use as a canteen.
- (4) The canteen building shall be situated not less than fifty feet from any latrine, urinal, boiler house, coal stacks, ash dumps and any other source of dust, smoke or abnoxious fumes.

Provided that the Chief Inspector may in any particular factory relax the provisions of this sub-rule to such extent as may require measures to be adopted to secure the essential purpose of this sub-rule.

- (5) The canteen building shall be constructed in accordance with the plans approved by the Chief Inspector and shall accommodate at least a dining hall, kitchen, store room, pantry and washing places separately for workers and for utensils.
- (6) In a canteen the floor and inside walls up to a height of 4 feet from the floor shall be made of smooth and impervious materials; the remaining portion of the inside walls shall be made smooth by cement plaster or in any other manner approved by the Chief Inspector.
- (7) The doors, windows of a canteen building shall be of fly proof construction and shall allow adequate ventilation.
- (8) The canteen shall be sufficiently lighted at all times when any person have access to it.
- (9) (a) In every Canteen-
 - (i) all inside walls of rooms and all ceilings and passages and staircases shall be lime-washed or colour-washed at least once each year or painted once in three years dating from the period when last lime-washed, or painted, as the case maybe;
 - (ii) all wood work shall be varnished or painted once in three years dating from the period when last varnished or painted;
 - (iii) all internal structural iron or steel work be varnished or painted once in three years dating from the period when last varnished or painted.

Provided that inside walls of the kitchen shall be lime-washed once every four months.

- (b) Record of dates on which lime-washing, colour-washing, varnishing of painting is carried out, shall be maintained in the prescribed Register **Form No.10.**
- (10) The precincts of the canteen shall be maintained in a clean and sanitary condition. Waste water shall be carried away in suitable covered drains and shall not be allowed to accumulate so as to cause a nuisance. Suitable arrangement shall be made for the collection and disposal of garbage.

109. Dining Hall:-

(1) The dining hall shall accommodate at a time at least 30 per cent of the workers working at a time :

Provided that, in any particular factory or in any particular class of factories, the Chief Commissioner may, by a notification in this behalf, alter the percentage of workers to be accommodated.

- (2) The floor area of the dining hall, excluding the area occupied by the service counter and any furniture except tables and chairs, shall be not less than 10 square feet per diner to be accommodated as prescribed in sub-rule (1),
- (3) A portion of the dining hall and service counter shall be partitioned off and reserved for women workers in proportion to their number. Washing place for woman shall be separate and screened to secure privacy.
- (4) Sufficient tables, chairs or benches shall be available for the number of diners to be accommodated as prescribed in sub-rule (1).

110. Equipment:-

- (1) There shall be provided and maintained sufficient utensils, crockery, cutlery, furniture and any other equipment necessary for efficient running of the canteen. Suitable clean clothes for employees serving in the canteen shall also be provided and maintained.
- (2) The furniture, utensils and other equipment shall be maintained in a class and hygienic condition. A service counter, if provided, shall have a top of smooth and impervious material. Suitable facilities including an adequate supply of hot water shall be provided for the cleaning of utensils and equipment.
- (3) Where the canteen is managed by a co-operative society, registered under the Bombay Co-operative Societies Act, 1952 as in force in the Union Territory of Delhi, the occupier shall provide and maintain the equipment as required under sub-rule (1) for such Canteen.

111. Prices to be charged:-

- (1) Food, drink and other items served in the canteen shall be sold on a non-profit basis and the prices charged shall be subject to the approval of the Canteen Managing Committee.
- (2) In computing the prices referred to in sub-rule (1) the following items of expenditure shall not be taken into consideration, but will be borne by the occupier:-
 - (a) the rent for the land and building;
 - (b) the depreciation and maintenance charges of the building and equipment provided for the canteen;
 - (c) the cost of purchase, repair and replacement of equipment including furniture, rockery, cutlery and utensils;

- (d) the water charges and expenses for providing lighting and ventilation;
- (e) the interest on the amount spent on the provision and maintenance of the building furniture and equipment provided for the canteen;
- (f) the cost of fuel required for cooking or heating food stuffs or water; and
- (g) the cost of uniforms; if any provided to them.
- (3) The charge per portion of foodstuff, beverages and any other item served in the canteen shall be conspicuously displayed in the canteen.

12. Account:-

- (1) All books of accounts, registers and any other documents used in connection with running of the canteen shall be produced on demand to an Inspector of Factories.
- (2) The accounts pertaining to the Canteen shall be audited, once every month, by registered accountants and auditors. The balance-sheet prepared by the said auditors shall be submitted to the Canteen Managing Committee not latter two month after the closing of the audited accounts.
- (3) **Provided that** the accounts pertaining to the canteen in a Government may be audited in such Department.

113. Managing Committee:-

- (1) The Manager shall appoint a Canteen Managing Committee which shall be consulted from time to time as to:
 - (a) the quality and quantity of foodstuffs to be served in the canteen;
 - (b) the arrangement of the menus;
 - (c) times of meals in the canteen; and
 - (d) any other matter as may be directed by the Committee.
- (2) The Canteen Managing Committee shall consist of an equal number of persons nominated by the occupier and elected by the workers. The number of elected workers shall be in the proportion of 1 for every 1,000 workers employed in the factory, provided that in no case shall there be more than 5 or less than 2 workers on the Committee.
- (3) The Manager shall determine and supervise the procedure for elections to the Canteen Managing Committee.
- (4) A Canteen Managing Committee shall be dissolved by the Manager two years alter the last election, no account being taken of a bye-election.

- **114. Shelters, Rest Rooms and Lunch Rooms:-** The shelters, or rest rooms and lunch rooms shall confirm to the following standards and the Manager of a factory shall submit for the approval of the Chief Inspector a site plan in duplicate of the building to be so constructed or adopted-
- (a) The building shall be soundly constructed and all the walls and roof shall be of suitable heat resisting materials and shall be waterproof. The floor and walls to a height of 3 feet shall be so laid or finished to provide a smooth, hard and impervious surface.
- (b) The height of every room in the building shall be not less than 12 feet from floor level to the lowest part of the roof and there shall be at least 12 square feet of floor area for every person employed.

Provided that

- (i) workers who habitually go home for their meals during the rest periods may be excluded in calculating the number of workers to be accommodated; and
- (ii) in the case of factories in existence at the date of commencement of the Act, where it is impracticable, owing to lack of space to provide 12 square feet of floor area for each person, such reduced floor area per person shall be provided as may be provided in writing by the Chief Inspector.
- (c) Effective and suitable provision shall be made in every room for securing and maintaining adequate ventilation by the circulation of fresh air and there shall also be provided and maintained sufficient and suitable natural or artificial lighting.
- (d) Every room shall be adequately furnished with chairs or benches with back-rests.
- (e) Sweepers shall be employed whose primary duty is to keep the rooms, building and precincts thereof in a clean and tidy condition

115. Creches:-

- (1) The creche shall be conveniently accessible to the mother of the children accommodated therein and so far as is reasonably practicable it shall not be situated in close proximity to any part of the factory where obnoxious fumes, dust or odours are given off or in which excessively noisy processes are carried in.
- (2) The building in which the creche is situated shall be soundly constructed and all the walls and roof shall be of suitable heat-resisting materials and shall be water-proof. The floor and internal walls of the creche shall be so laid or finished as to provide a smooth impervious surface.
- (3) The height of the rooms in the building shall be not less than 12 feet from the floor to the lowest part of the roof and there shall be not less than 20 sq. ft. of floor area for each child to be accommodated.

- (4) Effective and suitable provision shall be made in every part of the crèche for securing and maintaining adequate ventilation by the circulation of fresh air.
- (5) The creche shall be adequately furnished and equipped and in particular there shall be one suitable cot or cradle with the necessary bedding for each child, (provided that for children over two years of age it will be sufficient if suitable bedding is made available) at least one chair or equivalent seating accommodation for the use of each mother while she is feeding or attending to her child, and a sufficient supply of suitable toys for the older children.
- (6) A suitably fenced and shady open air play-ground shall be provided for the older children, Provided that the Chief Inspector may by order in writing exempt any factory from compliance with this sub-rule if he is satisfied that there is not sufficient space available for the provisions of such a play-ground.
- **116.** The case equivalent of the advantage accruing through the concessional sale to a worker of food-grains and other articles shall be 1computed at the end of the every wages period fixed under the provisions of the payment of Wage Act, 1936.
- **117.** For the purpose of computing cash equivalent of the advantage occurring through the concessional sale to a worker of food grains and other articles, the difference between the value of food grains and other articles at the average rates in the nearest market prevailing during the wages period in which over time was marked and value of food grains and other articles supplied at concessional rates shall be calculated and allowed for the number of overtime hours worked.

118. Wash Room:-

- (1) There shall be in or adjoining the creche a suitable wash room for the washing of the children and their clothing. The wash room shall conform to the following standards:-
 - (a) The floor and internal walls of the room to a height of 3 feet shall be so laid or finished as to provide a smooth impervious surface. The room shall be adequately lighted and ventilated and the floor shall be effectively drained and maintained in a clean and tidy condition.
 - (b) There shall be at least one basin or similar vessel for every four children accommodated in the creche at anyone time together with a supply of water provided, if practicable through taps from a source approved by the Health Officer. Such source shall be capable of yielding for each child a supply of at least five gallons of water a day.
 - (c) An adequate supply of clean clothes, soap and clean towels shall be made available for each child while it is in the creche.
- (2) Adjoining the wash room referred to above a latrine shall be provided for the sole use of the children in the creche. The design of latrine and the scale of accommodation to be provided shall either be approved by the Public Health Authorities, or where there is no Public Health Authority, by the Chief Inspector of Factories.

119. Supply of Milk and Refreshment:- At least half a pint of clean pure milk shall be available for each child on every day it is accommodated in the creche and the mother of such a child shall be allowed in the course of her daily work; 2 intervals at least 15 minutes each to feed the child. For children above two years of age there shall be provided in addition an adequate supply wholesome refreshment.

120. Clothes for Creche Staff:- The creche staff shall be provided with suitable clean clothes for use while on duty in the creche.

121. Welfare Officers:-

- (1) There shall be one Welfare Officer for factories employing between 500 to 2000 workers. Where the number of workers exceeds 2000, there shall be an additional Welfare Officer for every additional to thousand workers or fraction thereof over 500.
- (2) No person shall be eligible for appointment as a Welfare Officer, unless he
 - (a) possesses a degree of a University recognised by the Chief Commissioner in this behalf;
 - (b) has obtained a Degree or Diploma in Social Science from an institution recognised by the Chief Commissioner in this behalf; and
 - (c) has adequate knowledge of the language spoken by the majority of the workers in the factory which he is to be attached.

Provided that, in the case of a person, who is acting as a Welfare Officer to the commencement of this rule, the Chief Commissioner may, subject to such conditions as he may specify, relax all or any of the aforesaid qualifications,

Provided further that the Chief Commissioner may relax the above qualification if he is satisfied that the person is otherwise fully competent of discharge the duties,

- (3) (a) The post of a Welfare Officer shall be advertised in at least two newspapers, one which shall be in Mizo and one in English, having a wide circulation in the State.
 - (b) The selection shall be made from amongst the candidate applying for the post by a Committee appointed by the Occupier of the Factories.
 - (c) The appointment when made shall be notified by the Occupier the Chief Commissioner or such authority as the Chief Commissioner may specify for the purpose, giving full details of the qualifications etc. of the officer appointed and the conditions of his service,
- (4) (a) A Welfare Officer shall be given a status corresponding to the status of the other executive heads of the factory and shall be appointed at a minimum salary of Rs, 15,000.00 per month.
 - (b) The conditions of service of a Welfare Officer shall be the same as of other members of the staff of corresponding status in the factory, provided that no punishment shall be inflicted on a Welfare Officer without obtaining the prior approval of the Chief Commissioner.

- (5) The duties of a Welfare Officer shall be-
 - (i) to establish contracts and hold consultations with a view to maintaining harmonious relations between the factory management and workers.
 - (ii) to bring to the notice of the factory management the grievances of a worker or workers, with a view to secure expeditious redress and to act as a Liaison Officer between the management and labour.
 - (iii) to study and understand the point of view of labour in order to help the factory management to shape and formulate labour policies and to interpret these policies to the workers in a language understood by them;
 - (iv) to watch industrial relations with a view to use his influence in the event of a dispute arising between the factory management and workers and to bring about a settlement by persuasive efforts;
 - (v) to advise on fulfillment by the management and the concerned departments of the factory of their obligations, statutory or otherwise concerning Regulation of working hours, maternity benefit, medical care compensation for injuries and sickness and other welfare and social benefit measures;
 - (vi) to advise and assist the management in the fulfillment of its obligations statutory or otherwise, concerning prevention of personal injuries and maintaining a safe work environment in such factories where Safety Officer is not required to be appointed under the enabling provisions under section 4OB of the Act;
 - (vii) to promote such relations between the concerned departments of the factory and workers as are likely to bring about productive efficiency as well as amelioration in the working conditions and to help the workers in their adjustment and adoption of their working environments;
 - (viii) to encourage the formation of works and Joint Production Committees, and Safety-First and Welfare Committees, and to supervise their work;
 - (ix) to encourage provisions of amenities such as canteens, shelters for rest, creches, adequate latrine facilities, drinking water sickness and benevolent scheme payments, pension and superannuation funds, gratuity payments, granting of loans and legal advice to workers;
 - (x) to help the factory management in regulating the grant of leave with wages and explain to the workers the provisions relating to leave with wages and other leave privileges and to guide the workers in the matter of submission of applications for the grant of leave for regulating authorised absence;
 - (xi) to advise on questions relating to provisions of welfare facilities, such as housing facilities, food stuffs, social and recreational facilities, sanitation, individual personnel problems and education of children;

- (xii) to advise the factory management on question relating to training of new starters, apprentices, workers on transfer and promotion, instructions and supervisors, supervise and control notice-boards and information bulletins to further education of workers and to encourage their attendance at Technical Institutes;
- (xiii) to suggest measures which will raise the standard of living of workers and promote their well-being in general.
- (6) The Chief Commissioner may, by notification in the official Gazette, exempt any factory or class or description of factories from the operation of all or any of the provisions of this rule subject to such conditions as may be specified in the said notifications.
- (7) Welfare Officers not to deal with disciplinary cases .or Appear on behalf of the management against workers.

No Welfare Officer shall deal with any disciplinary case against a worker or appear before a Conciliation Officer, or in a Court or Tribunal on behalf of the factory management against a worker or workers.

CHAPTER VI: WORKING HOURS OF ADULTS

122. Compensatory Holidays:-

- (1) Except in the case of workers engaged in any work which for technical reasons must be carried on continuously throughout the day, the compensatory holidays to be allowed under sub-section (1) of Section 52 of the Act shall be so spaced that not more than two holidays are given in one week.
- (2) The Manager of the factory shall display, on or before the end of the month in which holidays are lost, a notice in respect of workers allowed compensatory holidays during the following month and of the dates thereof, at the place at which the notice of Periods of Works, prescribed under Section 61 of the Act is displayed. Any subsequent change in the notice in respect of any compensatory holiday shall be made not less than three days in advance of the date of that holiday.
- (3) Any compensatory holiday or holidays to which a worker is entitled shall be given to him before he is discharged or dismissed and shall not be reckoned as part of any period-of notice required to be given before discharge or dismissal.
- (4) (a) The manager shall maintain a Register in **Form No.14**: Provided that if the Chief Inspector of Factories is of the opinion that any muster roll or register maintained as part of the routine of factory or return made by the Manager, gives in respect of any or all of the workers in the factory the particulars required for the enforcement of Section 52 of the Act; he may, by order in writing, direct that such muster roll or register or return shall, to the corresponding extent be maintained in place of and be treated as the register or return required under this Rule for that factory.

- (b) The register maintained under Clause (a) shall be preserved for a period of three years after the last entry in it and shall be produced before the Inspector on demand.
- **123. Muster-roll for exempted factories:-** The Manager of every factory in which workers are exempted under Section 64 and 65 of the Act from the provisions of section 51 or 54 of the Act shall keep a muster-roll in **Form No.15** showing the normal piecework rate of pay, or the rate of pay per hour, of all exempted employees, in this master-roll shall be correctly entered the over-time hours of work and payments therefore of all exempted workers. The muster-roll in **Form No.14** shall always be available for inspection.
- **124. Overtime slip for Overtime work:-** Period of overtime work shall be entered in overtime slip in **Form No.16** in duplicate a copy of which duly signed by the Manager or by a person duly authorised by him in this behalf shall be given to the worker immediately after completion of this overtime work.

125. Notice of periods of work for adults:-

- (1) The notice of periods of work for adults shall be:
 - (a) in **Form 17** when all the adult workers in a factory are required to work within the same period.
 - (b) in **Form 18** in all other cases.
- (2) All notices shall be painted in bold letters on a wooden or metal plate and shall be displayed in a conspicuous place at the main entrance to the factory.
- **126. Register of adult workers:-** The muster-roll or the register, as the case may be, shall be written up fresh each year and shall be preserved for a period of 12 months after the last entry in it, and shall be produced before the inspector on demand.
- **127.** Persons defined to hold positions of supervision or Management:- The following persons shall be deemed to hold position of supervision or management provided they are not required to perform any manual labour as a regular part of their duties and they are employed in a supervisory capacity.
 - (i) All persons specified in **Schedule XV**.
 - (ii) Any other persons specified, who in the opinion of the Chief Inspector holds a position of supervision or management and if so declared by him in writing.
- **128. Persons to hold confidential position:-** The following persons shall deemed to hold confidential position in a factory:-
- 1. Stenographers.
- 2. Office Superintendent or Head Clerk.
- 3. All time keepers.
- 4. Head Cashiers and Cashiers.

- 5. Head Accountants and Accountants.
- 6. Secretary to Managing Director or Personal Assistant to the Manager.
- 7. Any other person who is in the opinion of the Inspector holds a confidential position and is so declared by him in writing.
- 129. List to be maintained of persons holding position of supervision or management or confidential position:- A list showing the names and designations of all persons in rule 127 and 128 shall be maintained in every factory and shall be produced before the Inspector whenever required.
- **130. Exemption of certain adult Workers:-** Adult Workers engaged in factories specified in column 2 of **schedule XVI** specified in column 3 of the said **Schedule** shall be exempted from the provisions of the sections specified in column 4 subject to the conditions if any specified in column 5 of the said Schedule.

Explanation: The following shall be considered to be urgent repairs.

- (a) Repairs to any part of machinery, plant or structure of a factory which are such a nature that delay in their execution involve, danger in their human life of safety or the stoppage of manufacturing process.
- (b) Break down repairs to the motive power, transmission or other essential plant of other factories, collieries, railways dockyards, harbours, tramways, motor transport, gas, electrical generating and transmission, pumping or similar essential or public utility service carried out in a general engineering works and foundaries and which are necessary to enable such concerns to maintain their main manufacturing process, production of service during normal working hours.
- (c) Repairs in connection without change of motive power, for example from steam to electricity or vice versa, when such work can not possibly be done without stoppage of the normal manufacturing process.

CHAPTER VII: EMPLOYMENT OF YOUNG PERSON

- **131. Notice of periods of work for children:-** The notice of periods of work for child workers shall be in **Form No.20.**
- 132. Register of child workers:- The Register of child workers shall be in Form No. 21.
- **133.** The cash equivalent of the advantage accruing through the concessional sale of food grains and other articles payable to workers proceeding on leave shall be the difference between the value at the average rates in the nearest market prevailing during the month immediately proceeding his leave and the value at the concessional rates allowed of food grains and other articles he is entitled to.

For the purpose of the cash equivalent monthly average market rate of food grains and other articles shall be computed at the end of every month.

CHAPTER VIII: LEAVE WITH WAGES

134. Leave with wages register:-

(1) The Manager shall keep a Register in **Form No.22** hereinafter called the Leave with Wages Register:

Provided that if the Chief Inspector is of the opinion that any muster-toll or register maintained as part of the routine of the factory, or return made by the manager, gives, in respect of any or all of the workers in the factory, the particulars required for the enforcement of Chapter VIII of the Act, he may, by order in writing, direct that such muster-roll or register or return shall, to the corresponding extent, be maintained in place of and be treated as the register of return required under this Rule in respect of that factory.

(2) The Leave with Wages register shall be preserved for a period of three years after the last entry in it and shall be produced before the Inspector on demand.

135. Leave Book:-

(1) "The Manager shall provide each worker who has become entitled to leave during a calendar Year, with a book in **Form No.23** (hereinafter called the Leave Book). Not later than the 31st January of the following calendar Year .The leave Book shall be the property of the worker and the Manager of his agent shall not demand it except to make the relevant entries therein whenever necessary and shall not keep it for more than a week, at a time.

Provided that in the case of a worker who is discharged or dismissed from service during the course of the year i.e. who is covered under sub-section (3) section 79 of the Act, the Manager shall issue an abstract from the "Register of Leave with Wages" **(Form No.22)** within a week from the date of discharge or dismissal, as the case may be.

- (2) If a worker loses his Leave Book, Manager shall provide him with another copy on payment of Rs.10 and shall complete it from his record.
- **136. Medical Certificate:-** If any worker is absent from work due to his illness and he wants to avail himself of leave with wages due to cover the whole or part of the period of his illness under the provisions of sub-section (7) of Section 9, he shall, if required by the Manager, produce a medical certificate signed a Registered Medical Practitioner or recognised Vaid or Hakim stating the cause of the absence and the period for which the worker, is, in the opinion of such medical practitioner, Vaid of Hakim unable to attend to his work or other reliable evidence to prove that he was actually sick during the period for which he leave is to be availed of.
- **137. Notice to Inspector of involuntary unemployment:-** The Manuel shall give, as soon as possible a notice to the Inspector of every case of involution unemployment of workers, giving numbers of unemployed and the reason of their unemployment. Entries to this effect shall be made in the Leave with Wages Register and the Leave book in respect of each worker concerned.

138. Notice by Worker:- Before or at the end of every calendar year, a worrier who may be required to avail of leave in accordance with sub-section (8 of Section 79 may give notice to the Manager of his intention not to avail himself of the leave with wages falling due during the following calendar year. The Manager shall make an entry to that effect in the Leave with Wages Register and in the Leave Book of the worker concerned.

139. Notice of Leave with wages:-

- (1) As far as circumstances parried members of the same family comprising husband, wife and children shall be allowed leave on the same date.
- (2) The Manaher may alter the dates fixed for leave only after giving a notice of four weeks to the worker.
- **140. Payment of wages if the worker dies.-** If a worker dies before he resumes work, the balance of his pay due for the period of leave with wage not availed of shall be paid to his nominees within one week of the intimation of the death of the worker. For this purpose each worker shall submit nomination in the following form duly signed by himself and attested by two witnesses.

141. Register to be maintained in case of exemption section 84 of the Act:-

- (1) Where an exemption is granted under Section 84 of the Act, the Manager shall maintain a Register showing the position of each worker as regards leave due, leave taken and wages granted.
- (2) He shall display at the main entrance of the factory, a notice giving full details of the system established in the factory for leave with wages and shall send a copy of it to the Inspector.
- (3) No alteration shall be made in the scheme approved by the Chief Commissioner at the time of granting exemption under Section 84 of the Act without its previous sanction.

CHAPTER IX: SPECIAL PROVISIONS

- **142. Dangerous Operations:-** Rule 142 shall come into force, in respect of any class or description of factories, on such dates as the State Government may, by notification in the Official gazette, appoint in this behalf.
- (1) The following operations (Manufacturing process or operation) when carried on in a factory are declared to be dangerous operations under Section 87 of the Act:-
 - 1. Manufacture of aerated water and processes incidental thereto.
 - 2. Electrolytic plating or oxidation of metal articles by use of an electrolyte containing chromic acid and other chromium compounds.
 - 3. Manufacture and repair of electric accumulators.
 - 4. Glass manufacture.

- 5. Grinding or glazing of metals.
- 6. Manufacture and treatment of lead and certain compounds of lead.
- 7. Generating petrol gas from petrol.
- 8. Cleaning or smoothing of articles by a jet of sand, metal shot or grit or other abrasive propelled by a blast of compressed air or steam.
- 9. Liming and tanning of raw hides and skins and processes incidental thereto.
- 10. Manufacture of Pottery.
- 11. Lead Processing.
- 12. Chemical works and processes incidental thereto.
- 13. Manufacture of articles from refractory materials.
- 14. Handling and processing of asbestos for manufacture of any article of asbestos and process of manufacture or otherwise in which asbestos is used in any form.
- 15. Handling or manipulation of corrosive substances.
- 16. Compression of Oxygen or Hydrogen produced by electrolysis of water.
- 17. Process of extracting of oil and fats from extraction plants.
- 18. Manufacture of manipulation of Manganese and its compounds.
- 19. Manufacture of manipulation of dangerous pesticides-
- 20. Manufacture, handling and use of Benzene and substances containing Benzene.
- 21. Manufacturing process or operation is Carbon Di Sulphide plants.
- 22. Manufacture and manipulation of carcenogenic dye intermediates.
- 23. Operation involving high noise levels.
- 24. Highly flammable compressed gases.
- 25. Operations in foundries.
- 26. Manipulation or stone or any other material containing Free Silica.

143. Notification of accidents and dangerous occurrences:-

- (1) When any accident or any dangerous occurance specified in the Schedule, which results in the death of any person or which result in such bodily injury to any person as is likely to cause his death, takes place in a factory, notice as mentioned in sub-rule (i) shall be sent also to:-
 - (a) the District Magistrate or Sub-Divisional Officer I.
 - (b) the officer in charge of the nearest police station, and
 - (c) the relatives of the injured or deceased person.
- (2) Any notice given as required under sub-rules (1) and (2) shall be confirmed by the manager of the factory to the authorities mentioned in these sub-rules within 12 hours of the accident or the dangerous occurrence by sending the Written report in **Form No.26** in the case of an accident or dangerous occurrence causing death or bodily injury to any person and in **Form 27** in the case of dangerous occurrence which has not resulted in any bodily injury to any person.
- (3) When any accident or dangerous occurrence specified in the Schedule takes place in a factory and it causes such bodily injury to any person and prevents the person injured from working for a period of 48 hours or more immediately following the accident or the dangerous occurrence, as the case may be, the manager of the factory shall send a report thereof to the Inspector in **Form No.26** within 24 hours after the expiry of 48 hours from the time of the accident or the dangerous occurrence.

Provided that if in the case of any accident or dangerous occurrence death occurs of any person injured by such accident or dangerous occurrence after the notices and reports referred to in the foregoing sub-rules have been sent the manager to the factory shall for with send a notice thereof by telephone, special messenger or telegram to the authorities and persons mentioned in sub-rule (1) and (2) and also have this information confirmed in writing within 12 hour of the death.

Provided further that, if the period of disability from working for 48 hour or more referred to in sub-rule (4) does not occur immediately following the accident, or the dangerous occurrence, but later on occurs in more than on spell, the report referred to shall be sent to the Inspector in the prescribed **Form 26** within 24 hours immediately following the hour when the actual total period of disability from working resulting from the accident or the dangerous occurrence becomes 48 hours.

144. Notice of poisoning or disease:- A notice in **Form No.28** should be sent forthwith both to the Chief Inspector and to the Certifying Surgeon, the Manager of a factory in which there occurs a case of lead, phosphorus, mercury, manganese, arsenic, carbon bisulphide or benzene poisoning by nitrous fumes, or by halogens or halogen derivatives of the hydrocarbons of the aliphatic series; or of chrome ulceration, anthrax silicosis, toxic anecemia, toxic jaundice primary opitheliomatous cancer of the skin; or pathological manifestations due to radium or other radioactive substances or X-rays.

CHAPTER X: SUPPLEMENTAL

145. Procedure in appeals:-

- (1) An appeal presented under Section 107 of the Act shall lie to the Chief Inspector or in cases where the order appealed against in an order passed by that officer, to the Chief Commissioner or to such authority as the Chief Commissioner may appoint in this behalf and shall be in the form of a memorandum setting forth concisely the grounds of objection to the order and bearing cut-fee strips in accordance with Article 11 of Schedule 11 to the Court fee Act, 1870, and shall be accompanied by a copy of the order appealed against.
- (2) Appointment of assessors.- On receipt of the memorandum of appeal the appellate authority shall if it thinks fit or if the appellant has requested that the appeal should be heard with the aid of assessors, call upon the body declared under sub-rule (3) to be representative of the industry concerned, to appoint an assessor within a period of 14 days. If assessor is nominated by such body, the appellate authority shall appoint a second assessor itself. It shall then fix a date for the hearing of the appeal and shall give due notice of such date to the appellant and the Inspector whose order is appealed against, and shall call upon the two assessors to appear upon such date to assist in the hearing of the appeal.
- (3) The appellant shall state in the memorandum presented under sub-rule (1) whether he is a member of one or more of the following bodies:- The body empowered to appoint the assessor shall:-
 - (a) if the appellant is a member of one of such bodies, be that body;
 - (b) if he is a member of two such bodies, be the body which the appellant desires should appoint such assessor; and
 - (c) if the appellant is not a member of any of the aforesaid bodies or if the does not state in the memorandum which of such bodies he desires should appoint the assessor, be the body which the appellate authority considers as the best fitted to represent the industry concerned.
- (4) Remuneration of assessors.- An assessor appointed in accordance with the provisions of sub-rule (2) and (3) shall receive for the hearing of the appeal, a fee to be fixed by the appellate authority, subject to a maximum of fifty rupees per dies. He shall also receive the actual traveling expenses. The fees and traveling shall be paid to the assessors by Government; but where assessors have been appointed at the request of the appellant and the appeal had been decided wholly or partly against him the appellate authority may direct that the fees and traveling expenses of the assessor shall be paid in whole or in part by the appellant.
- **146. Display of notices.-** The abstract of the Act and of the Rules required to be displayed in every factory shall be in **Form No. 29.** Rules prescribed under Section 110 of the Act.

- **147. Return:-** The occupier or manager of every factory shall furnish to the Chief Inspector or any other officer designated by the Chief Commissioner in this behalf the following returns, namely.-
- 1. Annual return:- On or before the 15 January of each year an annual return, in duplicate, in **Form No.30** relating to the following matters
 - (a) Average number of workers employed daily and normal hours worked per week;
 - (b) Leave with wages;
 - (c) Compensatory holidays;
 - (cc) Accident;
 - (d) Canteens in the case of factories notified by the Chief Commissioner; wherein more than 250 workers are ordinarily employed.
 - (e) Creches in the case of factories wherein more than 50 women workers are ordinarily employed;
 - (f) Shelters, rest rooms and lunch rooms in the case of factories wherein more than 150 workers are ordinarily employed;
 - (g) Welfare officer in the case of factories wherein 500 workers or more are ordinarily employed.
- 2. Annual return of holidays.- Before the end of each year, a return giving notice of all the days on which it is intended to close the factory during the next ensuing.- year. This return shall be submitted whether the factory is working or is not working during the year preceding the year to which the return relates.

Provided that the Chief Commissioner may dispense with this return in the case of any specified factory or any class of factories or of factories in any particular area.

Provided further that where the manager of any factory makes any departure from the list of hoildays, as aforesaid, prior intimation shall be given to the Chief Inspector

Provided also that in the case of a factory in which work is carried on only during certain period or periods of the year the manager shall if so required by the Chief Commissioner, or if the Chief Commissioner directs, through the Chief Inspector, submit the annual or half yearly return, as the case may be, within 15 days after the close of that period or after close of the last of those periods in the year, as the case may be.

- 3. Half-yearly return.- On or before the 15th January and 15th July of each year, a half-yearly return, in duplicate, in **Form No.31.**
- **148. Service of notices:-** The dispatch by post under registered cover of any notice or order shall be deemed sufficient service on the occupier 1 owner or manager of a factory of such notice or order.

- **149. Information required by the Inspector:-** The occupier, owner or manager of a factory shall furnish any information that an Inspector may require for the purpose of satisfying himself whether any provision has been duly carried out. Any demand by an Inspector, for any such information, if made, during the course of an inspection shall be complied with forthwith if the information is available in the factory or, if made in writing, shall be complied with within seven days of receipt thereof.
- **150. Muster-roll:** The manager of every factory shall maintain a muster-roll of all the workers employed in the Factory in **Form No.34** showing
 - (a) the name of each worker;
 - (b) the nature of the work and;
 - (c) the daily attendance of the worker.

Provided that, if the daily attendance is noted in the Register of Adult Workers in **Form No.19** or the particulars required under this Rule are noted in any other register, a separate muster-roll required under this rule need not be maintained.

- **151. Register of accidents and dangerous occurrences:-** The Manager of every factory shall maintain a Register of all accidents and dangerous occurrences which occur in the factory in **Form No.35.**
- **152. Maintenance of Inspection book:-** The Manager of every factory shall maintain a bound inspection book and shall produce it when so required by the Inspector or Certifying Surgeon.
- **153. Information regarding closure of factories:-** The Occupier or Manager of every factory shall report in writing to the Inspector any intended closure of the factory or any section or department thereof, immediately it is decided to do so, intimating the reasons for the closure, the number of workers on the register on the date of the report, the number of workers likely to be affected by the closure and the probable period of the closure. Intimation shall also be sent to the Inspector as soon as the factory or section or department of the factory as the case may be, starts working age.

Form of Application for grant of Certificate of Competency to a person (see rule 3)

1. Nam

- 2. Date of Birth
- 3. Name of the Organisation

(If not self employed)

- 4. Designation
- 5. Educational Qualification

(copies of testimonials to be attached)

6. Details of professionals experience

(in chronological order)

Name of	the	Period of Service	Designation	Area	of
Organisation				Responsibility	

- 7. Membership, if any, of professional bodies.
- 8. (i) Details of facilities (examination, testing etc.) at his disposal.
 - (ii) Arrangements for calibrating and maintaining the accuracy of these facilities.
- 9. Purpose for which competency certificate is sought (section or sections of the Act should be stated).
- 10. Whether the applicant has been declared as a Competent Person under any statute (if so, the details).
- 11. Any other relevant information.
- 12. Declaration by the applicant.

I	hereby,	declare	that	the	information	furnished	above	is 1	true,	Ι
undertake										

(a) that in the event of any change in the facilities at my disposal (either addition or deletion) or my leaving the aforesaid organisation, I will promptly inform the Chief inspector;

- (b) to maintain the facilities in good working order, calibrated periodically as per manufacturers instructions or as per National standards; and
- (c) to fulfill and abide by all the conditions stipulated in the certificate of competency and instructions issued by the Chief Inspector from time to time.

Place:
Date:
Signature of applicant
Declaration by the Institution (if employed)
I whose details are furnished above, is in our employment and nominate him on behalf of the organisation for the purposes of being declared as a competent person under the Act, I also undertake that I will-
(a) notify the Chief Inspector in case the competent person leaves our employment;
(b) provide and maintain in good order all facilities at the disposal as mentioned above;
(c) notify the Chief Inspector any change in the facilities (either addition or deletion).
Signature
Designation
Telephone No: Date
Official seal

Form of Application for grant of Certificate of competency to an Institution (see Rule 3(2)).

- 1. Name and full address of the organisation.
- 2. Orgainsation's status (specify whether Government, Autonomous, Cooperative, Corporate or Private).
- 3. Purpose for which competency certificate is sought specify section(s) of the Act.
- 4. Whether the Organisation has been declared as a competent person under this or any other statute. If so, give details.
- 5. Particulars of persons employed and possessing qualification and experience as set out in Schedule, annexed to sub-rule (1) of **Rule 3.**

Sl. No.	Name and Designation	Qualification	Section(s) and the Rules under which competency is sought for
1.			
2.			
3.			
4.			

- 6. Details of facilities (relevant to item 3 above) and arrangements made for their maintenance and period i.e. calibration.
- 7. Any other relevant information.
- 8. Declaration:

Ihereby,	on		1	oehalf
of	certify th	ne details	furnished	above
are correct to the best of my knowledge I un				

- (i) maintain the facilities in good working order, calibrated periodically as per manufacturers instructions as per National Standards; an
- (ii) to fulfil and abide by all the conditions stipulated in the certificate of competency and instructions issued by the Chief Inspector from time to time.

Place	& Signature	of	Head	of	the
Date	Institutions		or	of	the
	persons	auth	authorised		sign
	on	1	his		behalf
	Designation	.•			

			erson or an institution(see rule 3)				
2(ca (Na: com cert and plan	a) of the Factories A(Name me of the person) npetent person for the partificate for such building lifting tackles, pressur	Act and the rules may of the institution) of Shrunder our pose of carrying out to ags, dangerous machiner re plants, confined space e case may be, used in a second control of the case may be, used in a second control of the case may be, used in a second control of the case may be, used in a second control of the case may be, used in a second control of the case may be, used in a second control of the case may be, used in a second control of the case may be, used in a second control of the case may be a second control of the case	ers conferred on me under section de thereunder, hereby recognize iemployed in (Name of the Organisation) to be a ests, examinations, inspections and y, lifts and hoists, lifting machines e, ventilation system and process or factory located in under section and				
		omt to the conditions stipul	to This ated hereunder:-				
` '	i) Tests, examinations and inspections shall be carried out in accordance with th provisions of the Act and the Rules made thereunder;						
t		or by a person so author	ried out under direct supervision of ised by an institution recognised to				
	-	etency issued in favour or rganisation mentioned ir	of a person shall stand cancelled if his application;				
ì	informed of the names,		son shall keep the Chief Inspector eations of the persons authorised by ns.				
(v) .							
(vi)							
Sta Dat		Official seal	Signature of the Chief Inspector				

Note.- A separate certificate should be issued under each relevant section. A person or an institution may be recognised competent for the purpose of more than one section of the Act. Strike out the words not applicable.

(Prescribed under Rule 5)

APPLICATION FOR PERMISSION TO CONSTRUCT, EXTEND OR TAKE INTO USE ANY BUILDING AS A FACTORY

Applicant's Name

Applicant's Calling

Applicant's Address

Full Name & Postal address of factory Situation of the factory-

District

Town or village

Nearest Police Station

Particulars of plant to be installed

Signature of Applicant

Date

NOTE: This application shall be accompanied by the following documents:

- (a) A flow chart of the manufacturing process supplemented by a brief description of the process in its various stages;
- (b) Plans, in duplicate, drawn to scale, showing:-
 - (i) the site of the factory and immediate surroundings including adjacent buildings and other structures, roads, drains etc. and (ii) the plan elevation and necessary cross-sections of the various buildings, indicating all relevant details relating to natural lighting, ventilation and means of escape in case of fire. The plans shall also clearly indicate the position of the plant and machinery aisles and passage ways; and
- (c) Such other particulars as the Chief Inspector may require.

(Prescribed under Rule 6)

APPLICATION FOR REGISTRATION AND GRANT OR RENEWAL OF LICENSE FOR THE YEAR AND NOTICE OF OCCUPATION SPECIFIED IN SECTIONS 6 & 7 OF THE ACT.

(To be submitted in triplicate)

factory.....

1.	1. Full name of the factory with factory license No. if a	lready registered.
2.	2. (a) Full Postal address and situation of the factory.	
	(b) Full address to which communication relation sent	ng to the factory should be
3.	 Nature of manufacturing process/processes. (a) Carried on in the factory during the Last twelve already in existence) 	months (in the case of factories
	(b) to be carried on in the factories during the next to factories)	welve months (in the case of all
4.	4. Names and values of principal products manufactu	red during the last 12 months.
5.	5. (i) Maximum number of workers proposed to be enthe year	nployed on anyone day during
	(ii) Maximum number of workers employed on an months	y one day during the last 12
	(iii) Number of workers to be ordinarily employed in	the factory
6.	б. (i) Nature and total amount of power (H.P. installed)	installed or proposed to be
	(ii) Maximum amount of power (H.P.) proposed to be	e used
7.	7. Full name and residential address of the person whe factory for the purposes of the Act	9
8.	8. Full name and residential address of the occupier: (i) The Proprietor of the factory in case of concern	of private firm/ proprietory
	(ii) Directors in case of a public limited liability cor	npany/firm.
	(iii) Where a Managing Agent has been appointed and Directors thereof	the name of Managing agents
	(iv) Shareholders in case of a private company no Mappointed	
	(v) The Chief Administrative Head in case of a Gov	ernment or local fund

- 9. Full name and address of the owner of the premises or building (including the precincts thereof) referred to in Section 93..... In case of factory constructed or extended after the date of the commencement of 10. the Mizoram Factories Rules, 2014. (a) Reference number and date of approval of the plans or construction or extension of factory by the Chief Commissioner /Chief Inspector..... (b) Reference number and date of approval of the arrangements, if any made for the disposal of trade waste and effluents and the name of the authority granting such approval..... Amount of fee Rs......(Rupees)...... paid inTreasury on 11.vide challan No (enclosed) Signature of Occupier Date: Signature of Manager Date:
- Notes: 1. This form should be completed in ink in block letters or typed.
 - 2. If power is not used at the time of filling up this form; but is introduced later; the fact should be communicated to the Chief Inspector immediately.
 - 3. If any of the person named against item 8 is minor, the fact should be clearly stated.
 - 4. In the case of a factory, where under the provision of sub-sections 1 and 2 of Section 100 of the Act, a person has been nominated as the occupier, information required in item 8 should be supplied only in respect of that person.
 - 5. In the case of a factory where a managing Agent or Agents have been appointed as occupiers under the Indian Companies Act, 1913 VII of 1913), information required in item 8 should be supplied on y in respect of that person or persons.

NOTICE OF CHANGE OF MANAGER

(Prescribed under rule 16)

1.	name of factory with current license number							
2.	Postal address							
3.	Name of outgoing manager							
4.	Name of new manager with postal address of his residence and telephone number, if installed							
5.	Date of appointment of the new manager with parentage							
Date								
Signa	ture of new Manager							
Signa	ture of Occupier							
Place								

(Prescribed under Rule 7)

T	JCENCE	TO	$W \cap RK$	$\Delta F \Delta$	CTORV
		111	VV () I\ I\	Δ Γ Δ	

License is situated a stated here there unde	hereby granteinafter, suber.	Reg. No	sions of th	for use	premises as a fact	known as cory within	the limits
	Valid for						
Calendar Year	Maximum number of workers on any day	Maximum installed power capacity in	Fee	Date of payment	Excess fee of late payment	Date of payment	signature of the Issuing Authority
Granted under rule 7							
Renewed under rule 9							
•••••	•••••	• • • • • • • • • • • • • • • • • • • •	• • • • • • • • • • • • • • • • • • • •	• • • • • • • • • • • • • • • • • • • •	• • • • • • • • • • • • • • • • • • • •	• • • • • • • • • • • • • • • • • • • •	•••••
TRANSFEI	RS						
	_					•	

To whom transferred	Year of transfer	Date of payment transfer fee	signature of Issuing Authority

AMENDMENTS

Year When amended	Workers	Installed power capacity in H.P	date of payment of amendment fee	Date of fee	Signature of the issuing Authority

(Prescribed under Rule 20)

Certificate of Fitness
1. Serial No
Date
2. Name
3. Father's Name
4. Sex
5. Residence
6. Date of Birth, if available and / or age Certified
7. Physical Fitness
8. Descriptive marks
9. Reason for -
(1) refusal of certificate
(2) Certificate being revoked
or
Thumb Impression
Initials of Certifying Surgeon
Serial No
Date
I hereby certify that I have personally examined Name

Son / Daughter
Residing at
who is desirous of being employed in a factory, and that his / her age, as nearly as can be ascertained from my examination, is
His/ her descriptive marks are
arc
Thumb Impression
Certifying Surgeon

Note.- Exact details of cause of physical disability should be clearly stated.

(Prescribed under Rule 28)

Humidity Register Department
Hygrometer Distinctive mark or number
Position in department

				Readings of Hygrometer							
				Between 7 and 9 a.m.		Betw 11a.n 2p.m. (in the	ween a. and but not e rest iod)	Between 5.30	n 4 and	If on humidity insert none	Remarks
date	Year	Month	Day	Dry Bulb	Wet Bulb	Dry Bulb	Wet Bulb	Dry Bulb	Wet Bulb		
1st											
2nd											
3rd											
4th											
5th											
6th											
7th											
8th											
9th											
10th											
11th											
12th											
13th											
14th											
15th											
16th											
17th											
18th											
19th											
20th											
21st											
22nd											
23rd											
24th											
25th											
26th											
27th											
28th											
29th											
30th											
31st											

Signed)
Certified that the above entries are correct
(Signed)

(Prescribed under Rule 22)

Record of Lime washing, Painting etc.

Part of factory e.g. name of room	Parts lime- washed, painted, varnished or oiled e.g. walls, ceiling, wood work etc.	Treatment, whether lime- washed, painted varnished or oiled	Date of wash varnis was (according)	Remarks		
1	2	3	Date 4	Month 5	Year	7
	2	3	+	3	0	1

Signature of Manager

FORM NO. 11

(Prescribed under Rule 62)

Prescribed for Report of Examination of Hoist or Lift/ Occupier/ (or owner) of Premises

Address:

- 1. (a) Type of hoist or lift and Identification number or description.
 - (b) Date of construction or re-construction (if ascertainable).
- 2. Design and construction.

Are all parts of the hoist or life of good mechanical construction sound material and adequate strength (so as ascertainable).

- 3. Maintenance. Are the following parts of the hoist or lift properly maintained and in good working order, If not, state what defects have been found:-
 - (a) Enclosure of hoistway or liftway.
 - (b) Landing gates and cage gate(s).
 - (c) Interlocks on the landing gates and cage gate(s).
 - (d) Other gates fastenings.
 - (e) Cage and platform and fittings guides, buffers, interior of the hoistway or liftway.
 - (f) Over-running devices.
 - (g) Suspension ropes or chain and their attachments.
 - (h) Safety gear, i.e. arrangements for preventing fall of platform or cage brakes.
 - (i) Brakes.
 - (j) Worm or super gearing.
 - (k) Other electrical equipment.
 - (l) Other parts.
- 4. What parts (if any were) inaccessible.
- 5. Repairs, renewals or alterations (if any) required and the period in which they should be executed.
- 6. Maximum safe working load subject to repairs, renewals or alterations (if any) specified in (5).

I/We verify that on
examine this hoist of life and that above is correct report of the result.
Signature Counter signature
If employed by a company or association give names and address.
Qualification
Address
Date

Note:-Details of any renewal or alterations required should be given in 5 above.

7.

Others.

(Prescribed under Rule 64)

REPORT OF EXAMINATION OF PRESSURE VESSEL

- 1. Name of Occupier (or Factory
- 2. Situation and address of Factory
- 3. Name, description and distinctive number of pressure vessel
- 4. Name and address of manufacturers
- 5. Nature of process in which it is used
- 6. Particulars of vessel:-
 - (a) Date of construction
 - (b) Thickness of walls
 - (c) Date on which the vessel was first taken into use
 - (d) Safe working pressure recommended by the manufacturer
 - (e) The history should be briefly given, and the examiner should state whether he has been the last previous report.
- 7. Date of last hydraulic test (if any) and pressure applied 8. Is the vessel in open, or otherwise exposed to whether or to damp.
- 8. What parts (if any where inaccessible)
- 9. What examination and tests were made? (specify pressure if hydraulic test was carried out.)
- 10. Condition of vessel (State any defects materially affection the safe working pressure or the safe working of the vessel).

External	 • • •	 ••	٠.	٠.	 •	 •	 •	•	• •	•
Internal										

- 11. Are the required fittings and appliance provided in accordance with the rules of pressure vessels?
- 12. Are all fitting and appliance properly maintained and in good condition?
- 13. Repairs (if any) required, and period within which they should be executed and any other condition which the person making the examination thinks it necessary to specify for accuring safe working.

14.	Safe working pressure, calculated from dimensions and from the thickness, and other data ascertained by the present examination, due allowance being made for conditions of working if unusual or exceptionally severe (State minimum thickness of walls measure during the examination)									
15.	Where repairs affecting the safe working pressure are required, state the working pressure									
	(a)	Before the expiration of the period specified in (14)								
	(b)	After the completion of the required repairs								
	•••••									
16.	Other	r observations								
descr acces exam	ribed a sible f ination	hat on								
Signa	iture .									
Quali	ficatio	n								
Addre	ess									
Date	Date									

If employed by a Company or Association give name and address.

(Prescribed under Rule 65)

REPORT OF EXAMINATION OF WATER-SEALED GASHOLDER

- 1. Name of occupier of factory.
- 2. Situation and address of factory.
- 3. Name, description, distinguishing number or letter and type of gasholder.
- 4. Name and address of the manufacturer.
- 5. (a) No. of lifts.
 - (b) Maximum capacity in cub-meters (cub. ft.)
 - (c) Pressure thrown by holder when full of gas.
- 6. Particulars of gas to be stored in the holder.
- 7. Particulars as to be condition of-
 - (a) Crown
 - (b) Side sheeting, including grips and cups.
 - (c) Guiding Mechanism (Roller carriages, rollers, pins, guide rails or ropes.).
 - d) Tank.
 - (e) Other structure, if any (columns, framing and bracing).
- 8. Particulars as to position of the lifts at the time of examination.
- 9. Particulars as to whether the tank and lifts were found sufficiently level for safe working and if not, as to the steps taken to remedy the defect.
- 10. Date of examination and by whom it was carried out.
- 11. Condition of vessel. (1) external. (2) internal.
- 12. Are all fittings, appliances properly maintained and in a good condition repairs, if any, required and period within which they should be execute and any other condition which the person making the examination thinks it necessary for safe working.

13. Other observations.

I certify	that or	ı the	gasholder	described	above	was	thoroughly	examined	and	such of
the tests	s as we	re ne	cessary m	ade on the	same	day	and that th	e above is	a tru	e report
of my ex	aminat	ion.								

Signature
Qualification
Address
Date
If employed by a Company or Association give name and address

(Prescribed under Rule 122)

Register of Compensatory Holidays

						Weekly r exemptir	ays lost due ler in	e to the	Date of o	compe					
Number			of Relay	Number & Date of Exempting order		to	_	September	October to December		_	September	December	Last rest days carried to the next year	Remarks
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16

Form No. 15

(Prescribed under Rule 123)

Overtime Muster Roll Exempted Workers

Month ending

		Departmen				Norma		Overtim					Dates on
Registe	e	t				1		e rate of			equivalent	earnin	which
r			which	e on	worked or	Hours	of Pay	pay	g	earning	of	g	overtime
			overtim	each	productio						advantage		payment
			e has	occasio	n in case						accruing		s made
			been	n	of piece						through the		
			worked		workers						concessiona		
											l sole of food		
											grains and		
											other		
											articles		
1	2	3	4	5	6	7	8	9	10	11	12	13	14

(Prescribed under Rule 124)

Overtime Slip for Overtime Work

Month ending20

No. in Register	Name	Department		of C.T. work on each					Normal earning		Total earning	Dates on which overtime payments made
1	2	3	4	5	6	7	8	9	10	11	12	13

(Prescribed under Rule 125)

Notice of Periods of Work for Adults

Name of Factory	On half working days	
Where Situated	Hours of starting work	
On ordinary working days	Hour of closing work	
Hours of starting work	Date on which notice first exhibited	
Hours of closing work		(Signed)
Period of rest interval From To		Manager

(Prescribed under Rule 125)

	Name of Factory	Place	District
--	-----------------	-------	----------

Period of Work									Me	n													Wo	me	n						Descrip	tion of g	roups
Groups					То	tal	nur	nbe	r of	me	n e	mpl	loye	d				7	îota	ıl n	um	ıber	· of	wo	me	n er	npl	loy	ed		Group		Remarks
			A			В			С			Ι)		Е			F			G			Н		I			J		letter	of	
Relays		1	2	3	1	2	3	1	2	3	1	2	3	1	2	3	1	2	3	1	2	3 1	l	2	3 1	2	3	1	2	3		Work	
On working day ;-																															A		
																							_										
From		-																													В		
То																															C		
From																															D		
To																															E		
On partial working day	/s;-																														F		
From																															G		
То																															Н		
From																															I		
То																															J		
	İ																			T	T		Ť			İ	Ť	Ť		İ			
		-i											i				i				-i	-i	-i-		Ti-	_		Ť	Ť	i			

Dated on which notice first exhibited
(signed)

(Prescribed under Rule 126)

Register of Adult Workers

							Number and Certificate, if		
Serial No.	Name	Father's Name	Residential Address	Nature of Work	group as in	Number of relay, if working in shifts	Number of Certificate and Date	Token Number giving reference to the Certificate	Remarks
1	2	3	4	5	6	7	8	9	10

(Prescribed under Rule 131)

Notice	OI .	Perioas	OÏ	work	ior	Child	workers	

Name of Factory Place District

Periods of Work							Description of	of groups	
Groups	P	1	E	3	(C			
Relays	1	2	1	2	1	2	Group Letter	Nature of Work	Remarks
From									

Dated on which this notice is first exhibited
Manager
(Signed)

(Prescribed under Rule 132)

Register of Child Workers

Serial No.	Name	Name		employment	certificate and its date	Number	group as in Form No.	Number of relay, if working in shifts	Remarks
1	2	3	4	5	6	7	8	9	10

(Prescribed under Rule 134 & 135)

Register of Leave with Wages

Serial No	Name of factory	Adult/ Child
Department		Name
Serial No. in the Register of Adult/ Child		Father's Name
workers		
Date of entry into service,		Date of Discharge
		Date of amount of payment in lieu of leave
		due

			Number of days worked during the calendar year				Leave to Cr	edit									
Calender	Wage	Wages	No. of days	No. of	No. of	No. of	Total	Balance of	Leave	Total	Whether	Leave	Bala	Norm	Cash	Rate of	Rema
year of				days of	days of	days	of col.	leave from		of	leave in	enjoyed	nce	al	equivalent	wages	rks
Service	From	during	performed	day-off	maternity	leave	4 to 7	preceding	during the		accordance				of	for the	
	То	the			leave	enjoyed		year	P		with scheme	to	leave	of	advantage	leave	
		wages							mentioned	10	under	No. of	to		according	period	
		period							in col. 1			days	credit		through	(total of	
											79(8) was				concessiona		
											refused					& 16)	
															food grains & other		
															articles		
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
	4			3	0	,		9	10	11	12	10	17	13	10	17	10

(Prescribed under Rule 134 & 135)

Leave Book

Shall be the same as Register of Leave with Wages (Form No. 20 but shall be made out separately for each worker or a thick bound sheet)

(Prescribed under Rule 20)

Health Register

(In respect of persons employed in occupations declared to be dangerous operations under Section 87) Name of Certifying Surgeon:

(a)	Shri	From	То
(b)	Shri	From	То
(c)	Shri	From	То

Seria	l Work	Name	Sex	Age (last	Date of	Date of	Reason	Nature of	Raw	Dates of	If	Recertified	If certifying	Signature
No.	No.	of		birthday)	employment	leaving	for	Job or	material	medical	suspended	fit to	of	with date
		Worker			on present	or	leaving	occupation	or By	Examination	from work,	resume	unfitness	of
					work	transfer	transfer		product	by Certifying	state	duty on	or	Certifying
						to other	or		handled	Surgeon	period of	(with	suspension	Surgeon
						work	discharge				suspension	signature	issued t o	
										Result of	with		worker	
										Medical	detailed	Certifying		
										Examination	reasons.	Surgeon)		
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15

Note.- (i) Column 8. Detail summery of reasons for transfer or discharge should be stated.

(ii) Column 11. Should be expressed as fit/ unfit/ suspended.

(Prescribed under Rule 65)

Test Report Dust Extraction System
1. Description of system
2. Hood
(a) Serial No. of Hood.
(b) Contaminant captured.
(c) Capture velocities (at points to be specified).
(d) Volume exhausted at Hood.
(e) Hood static pressure Design Actual Value
3. Total pressure drop at
(a) Joints
(b) Other points of system (to be specified)
4. Transport Velocity in Dust
(at points alone dust to be specified)
5. Air cleaning Device.
(a) Type used.
(b) Velocity at inlet.
(c) Static Pressure at inlet.
(d) Velocity at outlet.
(e) State Pressure at outlet.
6. Fan.
(a) Type used.
(b) Volume handled.
(c) Static pressure.
(d) Pressure drop at outlet of fan.

7. Fan Motor.
(a) Type.
(b) Speed and horse Power.
8. Particulars of defects, if any, disclosed during test in any of the above components.
I certify that on this
Signature
Qualification
Address
Date
If employed by a Company or Association give name and address.

(Prescribed under Rule 143)

NOTICE OF ACCIDENT OR DANGEROUS OCCURRENCE RESULTING IN DEATH OR

NOTICE OF ACCIDENT	OR DINGBROOD	OCCURRENCE	RESOLITION II	OIC
BODILY INJURY				

(See Instruction below)

This space to be completed by Inspector of Factories

(To be sent forthwith to the Inspector of Factories)

District

Date of Receipt

Number of Accident or dangerous Occurrences

Industry No.

Causation No.

Sex (M.W.B., or G)

Other particulars (e.g. fatal, leg injury, arm injury etc.)

Date of Investigation

Result of Investigation

- 1. Name of Factory
- 2. Address of Works where accident or dangerous occurrence happened
- 3. Nature of Industry
- 4. Branch or Department and exact place where the accident or dangerous, occurrence happened.
- 5. Injured person's name and address
- 6. Fan.
- (a) Sex
- (b) Age (last birthday and)
- (c) Occupation of injured person

7. Date and hour of accident or dangerous occurrence
(a) Type.
(b) Speed and horse Power.
8. Hour at which he started work on day of accident or dangerous occurrence.
9. (a) Cause or nature of accident or dangerous occurrence (a)
(b) If caused by machinery:
(i) Give name of the machine and part causing the accident or dangerous occurrence, and (b) (i)
(ii) State whether it was moved by mechanical power at the time (b) (ii).
(c) State exactly what injured person was doing at the time (e)
10. Nature and extent of injuries (e.g.) fatal, loss of finger, fracture of leg, scald, scratch followed by
11. If accident or dangerous occurrence is not fatal, state whether injured person was disabled for 48 hour or more
12. Name of medical officers in attendance or injured person.
I Certify that to the best of my knowledge and belief the above particulars are correct in every respect.
Signature of Occupier or Manage
Date of despatch of report
Note To be completed in legible handwriting or preferably typewritten.

(Prescribed under Rule 142)

(Vide para 2 of Schedule Under Rule 142)

(Notice of dangerous occurrence which does not result in death or Bodily injury).

- 1. Name and address of the factory
- 2. Name of the Occupier
- 3. Name of the Manager
- 4. Nature of Industry
- 5. Branch or Department and exact place where the dangerous occurrence took place
- 6. Date and Hour of occurrence

(State exactly what happened)

I certify that, to the best of knowledge and belief the above particulars are correct in every respect.

Signature of the Occupier / Manager

Date of despatch of Report

Note.- To be completed in legible handwriting or preferably typewritten. (This space to be completed by Inspector of Factories).

District Date of receipt

D.O.No.

Date of Investigation

Causation No.

Result of Investigation

(Prescribed under Rule 144)

To be filled in by the Chief Inspector, No. of case Remarks

NOTICE OF POISONING OR DISEASE

(See Instruction on reverse)

1.	Name of Factory
2	Address of factory
3.	Address of office or private residence of occupier
4.	Nature of industry
5.	Name and Works Number of Patient
6.	Address of Patient
7.	Sex and Age of Patient
8.	Precise occupation of Patient
9.	Nature of Poisoning or Disease from which patient is suffering
10.	Has the case been reported to the Certifying Surgeon
	Signature of Factory Manager
	Dated
	2 3. 4. 5. 6. 7. 8.

(Prescribed under Rule No.146)

ABSTRACT OF FACTORIES ACT, 1948 AND THE MIZORAM FACTORIES RULES, 2014.

(To be fixed in a conspicuous and convenient place at or near the main entrance to the factory)

Interpretation

"Factory" means any premises including the precincts thereof-

- (i) whereon ten or more workers are working, or were working on any day of the preceding twelve months, and in any part of which a manufacturing process is being carried on with the aid of power, or is ordinarily so carried on, or
- (ii) whereon twenty or more workers are working or were working on any day of the preceding twelve months, and in any part of which a manufacturing process is being carried on without the aid of power, or is ordinarily so carried on,

but does not include a mine subject to the operation of the Indian Mines Act, 1923 (IV of 1923), or a railway running shed.

"Worker" means a person employed, directly or through any agency, whether for wages or not in any manufacturing process or in cleaning any part of the machinery or premises used for a manufacturing process in any other kind of work incidental to, or connected with the manufacturing process, or the subject of the manufacturing process.

"Manufacturing process" means any process for making, altering, repairing ornamenting, finishing, packing, oiling, washing, cleaning, breaking up, demolishing, or otherwise treating or adopting any article or substance with a view to its, sale, transport, delivery or disposal, or pumping oil, water or sewage, or generating, transforming power or composing types for printing, printing by letter press, lithography, photogravure or other similar processes or book binding or constructing reconstructing, repairing, refitting, finishing or breaking up ships or vessels.

Working hours, holidays, intervals for rest, etc.

1. Hours of work (Adults). Sections 51 and 54.- No Adult worker shall be required, or allowed to work in a factory for more than 48 hours in any week and for more than 9 hours in any day, or with the previous approval of the Chief Inspector, the daily maximum specified in Sec. 51 may be exceeded in order to facilitate the change of shifts.

2. Relaxation of hours of Work (Adults). Section 64.- The ordinary limits on working hours of adults may be relaxed in certain special cases, e.g. workers engaged on urgent repairs; in preparatory or complementary work which must necessarily be carried on outside the limits laid down for the general working of the factory, in work which is necessarily so intermittent that the intervals during which they do not work while on duty ordinarily amount to more than the intervals for rest in work which for technical reasons must be carried on continuously throughout the day; in making or supplying articles of prime necessity which must be made or supplied every day; in a manufacturing process which cannot be carried on except during fixed seasons, or at times dependent on the irregular action of natural forces in engine rooms or boiler houses or in attending to power plant or transmission machinery, or in printing of news paper held upon account of the breakdown of machinery, or the loading or unloading of railway wagons.

Except in the case of urgent repairs, the relaxation shall not exceed the following limits-

- (i) the total number of hours of work in any day shall not exceed ten;
- (ii) the total number of hours of overtime work shall not exceed 50 for anyone quarter;
- (iii) the spreadover inclusive of intervals for rest shall not exceed 12 hours in anyone day.

In the case of any or all adult workers in any factory, the ordinary limits on working hours of adults may be relaxed, for a period or periods not exceeding in the aggregate 3 months in any year, to enable the factory to deal within exceptional press of work.

- 3. Payment for Overtime. Section 59.- Where a women works in a factory for more than 9 hours in any day or for more than 48 hours in any week he shall, in respect of overtime work, be entitled to wages at the rate of twice his ordinary rate wages.
- 4. Exemption of supervisory Staff. Section 64.- Chapter VI of the Act.- Working hours of adults-does not apply to persons holding position in a factory.
- 5. Weekly Holiday (Adult). Section 52.- No adult worker shall be t required or allowed to work in a factory on the first day of the week unless he has, or will have, a holiday for a whole day on one of the three days immediately before or after the said day, and the manager of the factory has, before the said day or the substituted day, whichever is earlier, delivered a notice at the office of the Inspector of his intention to require the worker to work on the said day and of the day which is to be substituted, and displayed a notice to that effect in the factory.

Provided that no substitution shall be made which will result in any worker working for more than ten days consecutively without a holiday for a whole day.

Where a worker in a factory, as a result of exemption from the ordinary provision relating to weekly holidays is, deprived of any of the weekly holidays he shall be allowed, within the month in which the holidays were due to him or within the two months immediately following that month compensatory holidays of equal number of the holidays so lost.

- 6. Intervals for Rest (Adults). Sections 55 and 56.- The periods of work of adult workers in a factory each day shall be so fixed that no period shall exceed 5 hours before he has had an interval for rest of at least half hour and that inclusive of his intervals for rest they shall not spread over more than 10 hours in any day or, with the permission of the Chief Inspector in writing, 12 hours.
- 7. Prohibition of Double Employment. Sections 60,71 and 99.- No child or, except in certain circumstances an adult worker, shall be required or allowed to work in any factory on any day on which he has already been working in any other factory.

If a child works in a factory on any day on which he has already been working in another factory, the parent or guardian of the child or the person having custody of or control over him or obtaining any direct benefit from his wages shall be punishable with fine, which may extend to Rs.5000.00 unless it appears to the court that the child so worked without the consent or connivance of such parent, guardian or person.

- 8. Prohibition of Employment of Children under 14 Section 67.- No child who has not completed his fourteenth year shall required or allowed to work in any factory.
- 9. Hours of Work (Children). Section 71-Nochild shall be employed or permitted to work in any factory for more than 4Y2 hours in any day and between the hours of 7 P.M. and 6 A.M. The period of work of all children employed in a factory shall be limited to two shifts which shall not overlap or spread over more than 5 hours each and each child shall be employed in only one of relays The provision relating to weekly holidays shall also apply to child workers and no exemption from this provision may be granted in respect of any child.
- 10. Prohibition of Employment of Women. Section 66.- No Woman shall in any circumstances be employed in any factory more than 9 hours in any day or between the hours of 7 P.M. and 6 A.M. There shall be no change of shifts except after a weekly holiday or any other holiday.

Leave with wages

- 11. Leave with Wages. Section 79 and 80/83 and Rules.- Every worker who has worked for a period of 240 days or more in a factory during a calendar year shall be allowed during the subsequent calendar year, leave with wages for a number of days calculated at the rate of-
 - (i) if an adult, one day for every twenty days of work performed by him during the previous calendar year;

(ii) if a child, one day for every 15 days of work performed by him during the previous calendar year;

Any days of layoff, by agreement or contract, or as permissible under the standing orders; in case of a female worker, maternity leave for any number of days not exceeding twelve weeks, and the leave earned in the year prior to that in which the leave is enjoyed shall be deemed to be days on which the worker has worked in a factory for the computation of the period of 240 days or more but he shall not earn leave for these days.

The leave admissible under Sec. 79 shall be exclusive of all holidays, whether, occurring during or at either end of the period of leave.

A worker whose service commences otherwise than on the first day of January, shall be entitled to leave with wages at the rate laid down in Sec. 79 (i) if he has worked for two-thirds of the total days in the remainder of the calendar year.

If a worker is discharged or dismissed from service during the course of the year he shall be entitled to leave with wages at the rates laid down in Sec. 79 (1) even if he has not worked in the entire calendar year.

Fraction of leave of half a day or more shall be treated as one full day's leave and fraction of less than half a day shall be omitted.

If a worker does not in anyone calendar year take the whole of the leave allowed to him, any leave not taken by him shall be added to the leave to be allowed to him in the succeeding calendar year provided total number of days of leave that may be carried forward to a succeeding year shall not exceed thirty in case of adult and forty in the case of a child. Unavailed leave shall be carried forward without any limit provided a worker who has applied for leave with wages but has not been given such leave in accordance with any scheme laid down under Sec. 79(8), (9).

A worker may at any time apply in writing to the manager of a factory not less than fifteen days before the date on which he wishes leave to being and thirty days before that date if he is employed in a public utility service provided that the number of time in which leave may be taken during any year shall not exceed three. If a worker wants to avail himself of leave with wages due to him to cover a period of illness he shall be granted leave even if application is not made within the time specified above.

An application for leave with wages which does not contravene any scheme lodged under sec. 79 (8), (9) shall not be refused if it is made within the time specified above.

If the employment of a worker who is entitled to leave under Section 79 terminated by the occupier before he has taken the entire leave to which he is entitled, or if having applied for and having not been granted such leave, the worker quits his employment before he has taken the leave, the occupier of the factory shall pay him the amount payable in respect of the leave not taken and such payment shall be made before the expiry of the second working day on which his employment is terminated.

Unavailed leave of a worker shall not be taken into consideration in computing the period of any notice required to be given before discharge or dismissal.

The manager shall maintain a leave with wages register in the prescribed Form No.14 and shall provide each worker with a book called the 'Leave Book' in the prescribed Form No.15. The Leave Book shall be the property of the worker and the manager or his agent shall not demand it except to make entries of the dates of holidays or interruptions in service and shall not keep it for more than a week at a time. If a worker loses his Leave Book, the manager shall provide him with another copy on payment of Rs.10 and shall complete it from his record.

Health

- 12. Cleanliness. Section 11.- Except in cases specially exempted all inside walls and partition, all ceilings or tops of rooms and all walls, sides arid tops of passages and staircases in a factory shall be kept white-washed or colour-washed. The white-washing or colour-washing shall be carried out at least once in every period of fourteen months. The floors of every workroom shall be cleaned at least once in every week by washing using disinfectant, where necessary or some other method.
- 13. Disposal of Wastes & Effluents. Section 12.- Effective arrangement shall be made in every factory for the disposal of wastes and effluents due to the manufacturing process carried on therein.
- 14. Ventilation and Temperature. Section 13.- Effective and suitable provision shall be made in every factory securing and maintaining in every workroom adequate ventilation by the circulation of fresh air and such a temperature as will secure to workers therein reasonable conditions of comfort and prevent injury to health.
- 15. Overcrowding. Section 16.- Unless exemption has been granted, there be in every workroom of a factory in existence on 1st April, 1949 at least 350 cubic feet and of a factory builds after this date at least 500 cubic feet of space for every worker employed therein and for this purpose no account shall be taken of any space which is more than 14 ft, above the level of the floor of the room,
- 16. Lighting. Section 17.- In every part of a factory where workers are working or passing, there shall be provided and maintained sufficient and suitable light, natural or artificial or both.
- 17. Drinking Water .Section 18.- In every factory effective arrangements shall be made to provide and maintain in suitable points, conveniently situated for all workers employed therein, a sufficient supply of wholesome drinking water,

In every factory wherein more than 250 workers are ordinarily employed the drinking water shall during the hot weather, be cooled by ice or other effective methods. The cooled drinking water shall be supplied in every canteen. Lunch room and rest room and also at conveniently accessible points throughout the factory,

- 18. Latrines and Urinals. Section 19 and Rules-In every factory sufficient latrine and urinal accommodation of the prescribed type (separate enclosed accommodation for male and female workers) shall be provided conveniently situated and accessible to workers at all times while they are at the factory. Every latrine shall be under cover and so partitioned off as to secure privacy and shall have a proper door and fastening. Sweepers shall be employed whose primary duty It would be to keep clean latrine, urinals and washing places.
- 19. Spittoons. Section 20.- In every factory, there shall be provided a sufficient number of spittoons of the type prescribed in convenient places and, they shall be maintained in a clean and hygienic condition, No person shall spit within the premises of a factory except in the spittoons provided for the purpose. Whoever spits in contravention of this provision shall be punishable with fine not exceeding five rupees.

Safety

- 20. Fencing of Machinery. Section 21-In every factory dangerous parts of machines e.g., every moving part of a prime mover and every fly-wheel connected to a prime mover etc., shall be securely fenced by safeguards of substantial construction which shall be kept in position while the parts of machinery they are fencing are in motion or in use.
- 21. Work on or near Machinery in motion. Section 22.- No women or young person shall be allowed to clean, lubricate, or adjust any part of a prime mover or of any transmission machinery while the prime mover or transmission machinery is in motion, or to clean, lubricate or adjust any part of any machine if the cleaning, lubrication or adjustment thereof would expose the woman or young person to risk injury from any moving part either of that machine or of any adjacent machinery.
- 22. Employment of young Persons on Dangerous Machinery Section 22.- No young person shall work at any machine declared to be dangerous unless he has been full instructed as to the dangers arising in connection with the machine and the precautions to be observed and has received sufficient training in work at the machine or is under adequate supervision by a person who has a thorough knowledge and experience of the machine.
- 23. Casing of new Machinery. Section 26.- In all machinery driven by power and installed in any factory after 1st August, 1950, every set screw, bolt or key on any revolving shaft, spindle, wheel or pinion shall be so sunk, encased or otherwise effectively guarded as to prevent danger; all spur, worm and other toothed or friction gearing which does not require frequent adjustment while in motion shall be completely encased, unless it is so situated as to be as safe as it would be if it were completely encased.

Whoever sells or lets on hire or as agent of a seller or hirer, causes or procures to be sold or let on hire, for use in a factory any machinery driven by power which does not comply with these provisions, shall be punishable with imprisonment for a term which may extend to three months or with fine which may extend to five hundred rupees or with both.

- 24. Prohibition of employment of Women and Children near Cotton Openers Section 27.- No woman or child shall be employed in any part of a factory for pressing cotton in which a cotton opener is at work.
- 25. Excessive Weights. Section 34.- No woman or young person shall unaided by another person lift, carry or move by hand, any material article, tool or appliance exceeding the following limits:-

Adult female - 65 lbs.

Adolescent male - 65 Ibs.

Adolescent female - 45 Ibs.

Male child - 35 Ibs.

Female child - 30 lbs.

- 26. Protection of Eyes. Section 35.- Effective screens or suitable goggles shall be provided for the protection of persons employed in or in the vicinity of processes which involve risk or injury to the eyes from particles or fragments thrown off in the course of the process or which involve risk of injury to the eyes by reason of exposure to excessive light.
- 27. Precautions in case of fire. Section 38.- Every factory shall be provided with adequate means of escape in case of fire for the persons employed therein. The doors affording exit from any room shall, unless they are of the sliding type be constructed to open outwards. Every window, door or other exit in affording a means of escape in a case of fire, other than the means of exit in ordinary use shall be distinctively marked. Effective and clearly audible means of giving warning in a case of fire to every person employed in the factory shall be provided. Effective measures shall be taken to ensure that wherein more than twenty workers are ordinarily employed in any place above the ground floor or where in explosive or highly inflammable materials are used or stored all the workers are familiar with the means of escape in ease of fire and have been adequately trained in the routine to be followed in such case.

Welfare

28. Washing Facilities. Section 42-Ineveryfactory adequate and suitable facilities for washing shall be provided and maintained for the use of the workers therein. Such facilities shall include soap and nail brushes or other suitable means of cleaning and the facilities shall be conveniently accessible and shall be kept in a clean and orderly condition.

If female workers are employed separate facilities shall be provided and so enclosed or screened that the interiors are not visible from any place where persons of the other sex work or pass.

- 29. Facilities for storing and Drying Clothing. Section 43 and Rule—In the case of certain dangerous operations e.g., lead processes, liming and tanning of raw hides and skins etc. Suitable placesior keeping clothing not worn during working hours and for the drying of wet clothing shall be provided and maintained.
- 30. Facilities for Sitting. Section 44.- In every factory suitable arrangements for sitting shall be provided and maintained for all workers obliged to work in a standing position in order that they may take advantage of any opportunities for rest which may occur in the course of their work.
- 31. First aid and Ambulance Room. Section 45.- There shall in every factory be provided and maintained so as to be readily accessible during all working hours first-aid boxes or cupboards equipped with the prescribed contents. Each first aid box or cupboard shall be kept in the charge of a separate responsible person who is trained in first aid treatment and who shall always be readily available during the working hours of the factory.

In every factory wherein more than 500 workers are employed there shall be provided and maintained and ambulance room of the prescribed size and containing the prescribed equipment. The ambulance room shall be in charge of a qualified medical practitioner assisted by at least on qualified nurse and such other staff as may be prescribed.

- 32. Canteens. Section 46 and Rules.- In specified factories wherein more than 250 workers are ordinarily employed a canteen or canteens shall be provided and maintained by the occupier for the use of this workers. Food, drink and other items served in the canteen shall be sold on a non-profit basis and the prices charged shall be subject to the approval of a Canteen Managing Committee which shall be appointed by the Manager and shall consist of an equal number of persons nominated by the occupier and elected by the workers. The number of elected workers shall be in the proportion of 1 for every 1,000 workers employed in the factory provided that in no case shall there be more than 5 or less than 2 workers on the Committee. The Committee shall be consulted from time to time on to the quality and quantity of food-stuffs to be served in the Canteen, the arrangement of the menus, etc.
- 33. Shelters, Rest Rooms and Lunch Rooms. Section 47.- In every factory wherein more than 150 workers are ordinarily, employed, adequate and suitable shelters or rest rooms and a suitable lunch room, with provision for drinking water, where workers can eat meals, brought by them, shall be provided and maintained for the use of the workers.
- 34. Creches. Section 48 and Rules.- In every factory wherein more than 50 women workers are ordinarily employed, there shall be provided and maintained a suitable room or rooms for the use of children under the age six years of such women. The Creche shall be adequately furnished and equipped and in particular there shall be one suitable cot or a cradle with the necessary bedding for each child, at least one chair or equivalent seating accommodation for the use of the mother while she is feeding or attending to her child and sufficient supply of suitable toys for older children.

There shall be in or adjoining the Creche a suitable wash-room for the washing of the children and their clothing. An adequate supply of clean cloths, soap and clean towels shall be made available for each child while it is in the Creche. At least half a pint of clean pure milk shall be available for each child on every day it is accommodated in the Creche and the mother of such a child shall be allowed in the course of her daily work suitable intervals to feed the child. For children above two years of age there shall be provided, in addition, an adequate supply of wholesome refreshments. A suitably fenced and shady open air play-ground shall also be provided for the older children.

- 35. Welfare Officers. Section 49.- In every factory wherein 500 or more workers are ordinarily employed the occupier shall employ in the factory such number of welfare Officers as may be prescribed. Special Provisions
- 36. Dangerous Operation. Section 87 and Rules.- Employment of women, adolescents and children is prohibited or restricted in certain operation declared to be dangerous, e.g. manufacture of aerated water, electroplating, manufacture and repair of electric accumulators, glass manufacture grinding or glazing of metals, manufacture and treatment of lead and certain compounds of lead, generating petrol gas from petrol, sandblasting, liming and tanning of raw hides and skins, and certain lead process in Printing Presses and Type Foundries.
- 37. Notice of Accidents. Section 88 and Rules.- Where in any factory an accident occurs which causes death or which causes bodily injury by reason of which the person injured is prevented from working for a period of 48 hours or more immediately following the accident or which, though not attended by personal injury or disablement is of one of the following types:-
 - (i) Bursting of vessel used for containing steam under pressure greater than atmospheric pressure other than plant which comes within the scope of the Indian Boilers Act;
 - (ii) Collapse or failure of a crane, derrick, hoist or other appliances used in raising or lowering persons or goods, or any part thereof, or the overturning of a crane;
 - (iii) Explosion or fire causing damage to any room or place in which persons are employed or fire in rooms of cotton pressing factories, where a cotton opener is in use;
 - (iv) Explosion of a receiver or container used for the storage at a pressure greater than atmospheric pressure of and gas or gases including air or any liquid or solid resulting from the compression of gas;
 - (v) Collapse or subsidence of any floor, gallery, roof, bridge, tunnel, chimney, wall or building, forming part of a factory or within the compound or curtilage of factory.

The Manager of the factory shall forthwith send notice thereof to the Chief Inspector, if the accident is fatal or of such a serious nature that it is likely to prove fatal, notice shall also be sent to the District Magistrate or the Sub Divisional Officer and the Officerin-Charge of the nearest Police Station.

38. Notice of Certain Diseases. Section 89 and Rules.- Where any worker in a factory contracts any of the following diseases the Manager of the factory shall send notice thereof forthwith both to the Chief Inspector and the Certifying Surgeon:

Lead, phosphorus, mercury, manganese, arsenic, carbon bisulphide or benzene poisoning by nitrous fumes, or by halogens or halogen derivatives of the hydrocarbon of the aliphatic series; or of chrome ulceration, anthrax, silicosis, toxic anaemia toxic jaundice, primary opitheliomatous cancer of the skin, or pathological manifestations due to radium or other radioactive substances or X-rays.

- 39. No Charge for Facilities and Conveniences. Section 114.- No fee or charge shall be realised from any worker in respect of any arrangements or facilities to be provided or any equipments or appliances to be supplied by the occupier under the provision of the Act.
- 40. Powers of Inspectors. Sections 9 and 82.- Inspectors have power to inspect factories any time and may require the production of registers, certificates etc, prescribed under the Act and the Rules.

Any Inspector may institute proceeding on behalf of any workers to recover any sum required to be paid by an employer under the provisions relating to leave with wages, which the employer has not paid.

- 41. Obligations of Workers. Sections 97 and 111-Noworker in a factory:-
 - (i) shall willfully interfere with or misuse any appliance, convenience or other thing provided in a factory for the purposes of securing the health, safety or welfare of the workers therein.
 - (ii) shall willfully and without any reasonable cause do any thing likely to endanger himself or others, and
 - (iii) shall willfully neglect to make use of any appliance or other thing provided in the factory for the purposes of securing the health or safety of the workers therein.

If any worker employed in a factory contravenes any of these provisions or any rule or order made thereunder he shall be punishable with imprisonment for a term which may extend to three months, or which may extend to Rs.1000 or with both.

If any worker employed in a factory contravenes any provision of the Act or any rules or orders made thereunder imposing any duty or liability on workers he shall be punishable with fine which may extend to Rs.2000.

42. Certificates of Fitness. Sections 68, 70 and 98.- No child who has completed his fourteenth year or an adolescent shall be required or allowed to work in any factory unless a certificate of fitness granted with reference to him is in the custody of the Manager of the factory and such child or adolescent carries, while he is at work, at token giving a reference to such certificate. Any fee payable for such a certificate shall be paid by the occupier and shall not be recoverable from the young person, his parents or guardian.

An adolescent who has been granted a certificate of fitness to work in a factory as an adult and who while a work in a factory carries a token giving reference to the certificate shall be deemed to be an adult for all the purposes of the provision of the Act relating to the working hours of adult and the employment of young persons. An adolescent who has not been granted a certificate of fitness to work in a factory as an adult shall, notwithstanding his age, be deemed to be a child for all the purposes of the Act.

Whoever knowingly uses or attempts to use, as a certificate of fitness granted to himself a certificate granted to another adolescent to work in a factory as an adult, or who having procured such certificate knowingly allows it to be used or an attempt to use it to be made, by another person, shall be punishable with imprisonment for a term which may extend to one month or with fine which may extend to Rs. 500 or with both.

43. Registers, Notices and Returns. Sections 61, 63, 72, 74, 79, 80 and 110.- A Register of adult workers in the prescribed Form No.12 and a register of child workers in the prescribed Form No.14 shall be maintained by the Manager of every factory.

A notice of periods of work for adults and a notice of periods of work of children in the prescribed Form No.14 or 15 and 12 shall be correctly maintained and displayed in every factory. No adult worker or child shall be required or allowed to work in any factory otherwise than in accordance with their respective notice of periods of work displayed in the factory.

The Owners Occupiers or Managers of factories shall submit the prescribed periodical returns to the Inspector regularly.

(Prescribed under sub-rule (1) of rule 147)

ANNUAL RETURN

For the Year ending 31st December, 19
1. Registration number of factory.
2. Name of factory.
3. Name of occupier.
4. Name of the manager.
5. District.
6. Full postal address of factory.
7. Nature of industry.
Number of workers and particulars of employment
8. No. of days worked in year.
9. No. of Man-days worked during the year.
(a) Men.
(b) Women.
(c) Children.
10. Average number of workers employed daily (See explanatory note).
(a) Adults.
(i) Men.
(ii) Women.
(b) Adolescents
(i) Male.
(ii) Female.
(c) Children
(i) Male.

(ii) Female.		
11. Total No. of man-hours worked including overtime.		
(a) Men.		
(b) Women.		
(c) Children.		
12. Average number of hours worked per day work (See explanatory note).		
(a) Men.		
(b) Women.		
(c) Children.		
13. (a) Does the factory carry out any process or operation declared as dangerous under Section 87. (See rule 95).		
Name of the dangerous Process of operations carried on	Average No. of persons employed daily in each of the processes or operations given in Col. 1	
(i)		
(ii)		
(iii) etc.		
Leave with wages		
14. Total number of workers employed during the year.		
(a) Men.		
(b) Women.		
(c) Children.		
15. Number of workers who were entitled to annual leave with wages during the year.		
(a) Men.		
(b) Women.		
(c) Children.		

16. Number of workers who were granted leave during the year.

(a) Men.

- (b) Women.
- (c) Children.
- 17. (a) Number of workers who were discharged, or dismissed from the service, or quit employment, or were superannuated, or who died while in service during the year.
- (b) Number of such workers in respect of whom wages in lieu of leave were paid.
- 18. (a) Number of Safety Officers required to be appointed as per notification under Section 40-B.
- (b) Number of Safety Officers appointed.

AMBULANCE ROOM

19. Is there an ambulance room provided in the factory as required under Section 45?

CANTEEN

- 20. (a) Is there a canteen provided in the factory as required under Section 46?
- (b) Is the canteen provided managed:
- (i) departmentally, or
- (ii) through a contractor?

SHELTERS OR REST ROOMS AND LUNCH ROOMS

- 21. (a) Are there adequate and suitable shelters or rest rooms provided in the factory as required under Section 47?
- (b) Are there adequate and suitable lunch rooms provided in the factory as required under Section 47?

CRECHES

22. Is there a creche provided in the factory as required under Section 48?

WELFARE OFFICERS

- 23. (a) Number of Welfare Officers to be appointed as required under Section 49?
- (b) Number of Welfare Officers appointed.

ACCIDENTS

- 24. (a) Total number of accidents (See explanatory note):
- (i) Fatal.
- (ii) Non-fatal.
- (b) Accidents in which workers returned to work during the year to which this return relates.
- (i) Accidents (workers injured) occurring during the year in which injured workers returned to work during the same year.
- (aa) Number of accidents.
- (bb) Man-days lost due to accidents.
- (ii) Accidents (workers injured) occurring in the previous year in which injured workers returned to work during the year to which this return relates :
- (aa) Number of accidents.
- (bb) Man-days lost due to accidents.
- (c) Accidents (workers injured) occurring during the year in which injured workers did not return to work during the year to which the return relates.
- (i) Number of accidents.
- (ii) Man-days lost due to accidents.

SUGGESTION SCHEME

- 25 (a) Is a suggestion Scheme in operation in the factory
- (b) If so, the number of suggestions
- (i) Received during the year
- (ii) Accepted during the year
- (c) Amount awarded each prizes during the period
- (i) Total amount awarded
- (ii) Value of the maximum cash prize awarded

(iii) Value of maximum cash prize awarded Certified that the information furnished above is to the best of my knowledge and belief, correct.

Signature of the manager	
Date	

Explanatory Notes:

- 1. The average number of workers employed daily should be calculated by dividing the aggregate number of attendance on working days (that is, men-days worked) by the number of working days in the year. In reckoning attendance, attendance by temporary as well as permanent employed should be counted, and all employees should be included, whether they are employed directly or under contractors. Attendance on separate shifts (e.g. night and day shifts) should be counted, separately. Days on which the factory was closed for whatever cause, and days on which the manufacturing processes were not carried on should not be treated as working days. Partial attendance for less than half a shift on a working day should be ignored, while attendance for half a shift or more on such day should be treated as full attendance.
- 2. For seasonal factories, the average number of workers employed during the working season and the off-season should be given separately. Similarly the number of days worked and average number of man hours worked per week during the working and off-season should be given separately.
- 3. The average number of hours worked per week means the total actual hours worked by all workers during the year excluding the rest intervals but including overtime work divided by the product of total number of workers employed in the factory during the year and 52. In case the factory has not worked for the whole year, the number of weeks during which the factory worked should be used in view of the figure 52.
- 4. Every person killed or injured should be treated as one separate accident. If in one occurrence six persons were injured or killed it should be counted as six accidents.
- 5. In item 24(a), the number accident which took place during the year should be given. In case of non-fatal accidents only

Prescribed under sub-rule (3) of rule 147

HALF YEARLY RETURN
Period ending 30th June 19 / 31st December 19
Name of Factory
Name of Occupier
Name of Manager
1. District
2. Postal Address
3. Nature of industry
4. Average number of workers employed daily
Men
Women
Adolescent:
Male
Female
Children:
Male
Female
5. Number of days worked during the half year ending 30th June 19/ 31st December 19
Signature of Occupier Signature of Manager

Date of Dispatch

Date of Dispatch

The average daily number should be calculated by dividing the aggregate number of attendances on working days by the number of working days during the half-year .In reckoning attendances by temporary as well as permanent employees should be counted, and all employees should be included, whether they are employed directly or under contractors. Attendances on separate shifts (e.g. night and day shifts) should be counted separately. Days on which the factory was closed, for whatever cause and days on which the manufacturing processes were not carried on should be treated as working days.

Prescribed under sub-rule (5) of Rule 147

ANNUAL RETURN - CRECHE

Year ending 31stDecember	19
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- 1. Industry
- 2. Name of factory
- 3. Number of women workers ordinarily employed
- 4. Number of children admitted in the creche
- 5. Average daily attendance of children at the creche
- (a) 2 years and below
- (b) Above 2 years.
- 6. Details of facilities provided with regard to :-
- (a) Milk
- (b) Food
- (c) Clothes
- (d) Toys
- (e) Medical Aid
- (f) Other
- 7. Details of staff employed
- (i) Doctors:-
- (a) Males
- (b) Females
- (ii) Nurses
- (iii) Teachers
- (iv) Ayahs
- (v) Sweepers

8. General remarks.	
Signature of Occupier	Signature of Manager

Date of Dispatch

Date of Dispatch

(Prescribed under Rule 150)

MUSTER ROLL
Name of Factory
Place where situated
Working Hours

		Monday to Friday Saturday			of (Con	nm	enc	em	ien	t of	Re	est	Pe	eric	d		Time of Completion of work
Serial No.		Nature of Work	Fo	r th	ne F	Peri	od	eno	din	g	• • • •	• • • •	••••	•••	••••		•	Remarks
			1	2	3	4	5	6	7	8	9							

Note.- Separate page should be used for workers employed during different period of work.

(Prescribed under Rule 151)

REGISTER OF ACCIDENTS AND DANGEROUS OCCURRENCES

Name of injured persons (if any)	Date of accident or dangerous occurrence	Date of report (in Form No.18) to Inspector	Nature of accident or dangerous occurrence	Date of return of injured person to work	No. of days injured person was absent from work
1	2	3	4	5	6

(Prescribed under Rule 60)

P ART I

1. Name of the Worker
2. Serial No. as in the register of workers, under section 62 of the act
3. Father's Name
4. Age and date of birth
5. Nature of work
6. Qualifications, if any, or period of service on similar work
7. Date when tight fitting clothing were provided
8. Signature or thumb impression of workers
9. Remarks
Signature of Occupier

SCHEDULE I

(Prescribed under Rule 7)

Fees for the grant of license for a factory for one to five years.

No of work	ers				
Upto 20	21to50	51 to 100	101to250	251to500	500andAbove
_	_	_	_	_	_
Rs.	Rs.	Rs.	Rs.	Rs.	Rs.
100	300	500	700	1000	1500
200	600	1000	1400	2000	3000
300	900	1500	2100	3000	4500
400	600	2000	2800	4000	6000
500	1200	2500	3500	5000	7500

SCHEDULE II

(Prescribed under Rule 21)

PART A

Blast furnaces.

Bricks and title works in which unglazed bricks or tiles are made.

Cement works.

Chemical works. Copper mills.

Gas works. Iron and steel mills.

Stone, slate and marble works.

The following parts of factories.

Rooms used only for the storage of articles.

Rooms in which the walls or ceiling consist of galvanized iron, glazed bricks, glass, slate, asbestos, bamboo, thatch.

Parts in which dense steam is continuously evolved in the process.

Parts in which pitch, tar or like material is manufactured or is used to substantial extent, except in brush works. The parts of a glass factory known the glass house. Rooms in which graphite is manufactured or is used to substantial extent in any process.

Parts in which coal, coke, oxide or iron, ochre, lime or stone is crushed or ground Parts of walls, partitions, ceilings or tops of rooms which are at least 20 feet above the floor.

Ceilings or tops of rooms in cement works, bleach works or dye works with the exception of finishing rooms or ware-houses.

Inside walls of oil mills below a height of 5 feet from the ground floor level.

Inside walls in tanneries below a height of 5 feet from the ground floor level where a wet process is carried on.

PART B

Coach and motor body works.

Electrical generating or transforming stations.

Engineering works.

Factories in which sugar is refined or manufactured.

Foundaries other than foundaries in which brass casting is carried on.

Gun factories.

Those parts of factories where unpainted or unvarnished wood manufactured

SCHEDULE III

(Prescribed under Rule 24)

Dry bulb	Wet bulb	Dry bulb	Wet bulb	Dry bulb	Wet bulb	
60.0	58.0	77.0	75.0	94.0	86.5	
61.0	59.0	78.0	76.0	95.0	87.0	
62.0	60.0	79.0	77.0	96.0	87.5	
63.0	61.0	80.0	78.0	97.0	88.0	
64.0	62.0	81.0	79.0	98.0	88.5	
65.0	63.0	82.0	80.0	99.0	89.0	
66.0	64.0	83.0	80.5	100.0	98.5	
67.0	65.0	84.0	81.0	101.0	90.0	
68.0	66.0	85.0	82.0	102.0	90.0	
69.0	67.0	86.0	82.5	103.0	90.5	
70.0	68.0	87.0	83.0	104.0	90.5	
71.0	69.0	88.0	83.5	105.0	91.0	
72.0	70.0	89.0	84.0	106.0	91.0	
73.0	71.0	90.0	84.5	107.0	91.5	
74.0	72.0	91.0	85.0	108.0	91.5	
75.0	73.0	92.0	85.5	109.0	92.0	
76.0	74.0	93.0	86.0	110.0	92.0	

SCHEDULE IV

(Prescribed under Rule 39)

PART I

Part of factories in which light sensitive photographic materials are made or used in an exposed condition.

PART II

Cement Works.

Works for the crushing and grinding of limestone.

Gas works.

Coke oven works.

Electrical stations.

Flour mills.

Melting and breweries.

Parts of factories in which the following processes are carried on.

Concrete or artificial stone making.

Conversion of iron into steel.

Smelting of iron ore. Iron or steel rolling.

Hot rolling or forging tempering or annealing of metals.

Glass blowing and other working in molten glass.

Tar distilling

Petroleum refining and blending.

SCHEDULE V

(Prescribed under Rule 59)

COTTON TEXTILES

- 1. Cotton Openers, Scutchers, Combined Openers and Scutcher and Lap Machines, Hard Waste breakers, etc.-
 - (1) All Cotton Openers, Scutchers, Combined Openers and Scutchers, Scutchers and Lap Machines, Hard Waste Breakers and similar machines shall be driven by separate motors or from counter shafts provided with fast and loose pulleys and efficient belt shifting devices.
 - (2) In all Openers, Combined Openers and Scutchers, Scutchers, Scutchers.lap machines, Hard Waste Breakers and similar machines, the beater covers and doors which give access to any dangerous part of the machine shall be fitted with effective interlocking arrangements which shall prevent-
 - (a) the covers and doors being opened while the machine is in motion;
 - (b) the machine being re-started until the covers and doors are close;

Provided that in res pect of doors of openings, other than dirt doors or desk doors such openings shall be so fenced as to prevent access to any dangerous part of the machine if effective interlocking arrangement is not provided.

(3) In all Openers, Combined Openers and Scutchers, Scutchers, Scutcher-lap machines, Hard waste Breakers and similar machines, the openings giving access to the dust chamber shall be provided with permanently fixed fencing, which shall, while admitting light, yet prevent contact between any portion of a worker's body and the beater grid bars.

Provided that the latter requirement in respect of the automatic locking device shall not apply while stripping or grinding operations are carried out.

Provided further the stripping or grinding operations shall be carried out only by specially trained adult workers wearing tight fittings clothing whose names have been recorded in the register prescribed in this behalf as required in sub-section (1) of Section 22.

2. Combined Openers and Scutchers, Scutcher-lap, Silver Lap, Lap Machines, Dorby Doublers and Ribbon Machines.- (1) The lap forming rollers shall be fitted with a guard or cover which shall prevent access to the intake of the lap roller and fluted roller as long as the weighted rack is down; or (2) The guard or cover shall be so locked that it cannot be raised until the machine is stopped and the machine cannot be started until the guard or cover is closed.

- 3. Carding Machines.- All Cylinder doors shall be secured by an automatic locking device which shall prevent the door being opened until the cylinder has ceased to revolve and shall render it impossible to restart the machine until the door has been closed.
- 4. Speed Framers.- Headstocks shall be fitted with automatic locking arrangements which shall prevent the doors giving access to jack box wheels opened while the machinery is in motion and shall render it impossible to restart the machine until the doors have been closed.
- 5. Self-acting Mules.- The drive shall be from counter-shafts which shall be provided with fast and loose pulleys and efficient belt shifting devices.
- 6. Calendering Machines etc..- In respect of calendering machines, mangles and similar machines, all such machines shall be provided with an efficient "nip" guard along the whole length on the intake side of each pair of bow Is and similar parts which shall be so fitted and maintained, whilst the rollers of bowls are in motion, as to prevent access to the point of contact of the rollers or bowls.

SCHEDULE VI

(Prescribed under Rule 59)

Wood-Working

Machinery

- 1. Definition.- For the purposes of this Schedule :-
 - (a) Wood-Working machine means a circular saw, band saw, planning machines, chain mortising machine or vertical spindle moulding machine operating of Wood or Cork.
 - (b) Circular saw means a circular saw working in a bench (including a rack bench) but des not include a pendulum or similar saw which is moved towards the wood for the purpose of cutting operation.
 - (c) Balld saw means a band saw, the cutting portion of which runs in a vertical direction but does not include a log saw or band resawing machine.
 - (d) Planning machine means a machine for overhand plannings or for thicknessing or for both operations.
- 2. Stopping and starting device—An efficient stopping and starting device shall be provided on every wood-working machine. The control of this device shall be in such a position as to be readily and conveniently operated by the person in charge of the machine.

- 3. Space around machines.- The space surrounding every wood-working machine in motion shall be kept free from obstruction.
- 4. Floors.- The floor surrounding every wood-working machine shall be maintained in good and level condition, and shall not be allowed to become slippery, and as far as practicable shall be kept free from chips or other loose material.
- 5. Training and Supervision:-
 - (1) No person shall be employed at a wood .- working machine unless he has been sufficiently trained to work that class of machine, or unless he works under the adequate supervision of person who has a thorough knowledge of the working of the machine.
 - (2) A person who is being trained to work a wood-working machine shall be fully and carefully instructed as to the dangers of the machine and the precautions to be observed to secure safe working of the machine.
- 6. Circular Saws.- Every circular saw shall be fenced as follows:-
 - (a) Behind and in direct line with the saw there shall be a riving knife, which shall have a smooth surface, shall be strong rigid and easily adjustable, and shall also conform to the following conditions:
 - (i) The edge of the knife nearer the saw shall from an area of a circle having a radius not exceeding the radius of the largest saw used on the bench.
 - (ii) The knife shall maintained as close as practicable to the saw having regard to the nature of the work being done at the time and at the level of the bench table the distance between the front edge of the knife and the teeth of the saw shall not exceed half an inch.
 - (iii) For a saw of a diameter of less than 24 inches, the knife shall extent upwards from the bench table to within one inch of top of the saw and for a saw of a diameter of 24 inches or over shall extend upwards from the bench table to a height of at least nine inches.
 - (b) The top saw shall be covered by a strong and easily adjustable guard, with a flange at the side of the saw farthest from the fence. The guard shall be kept so adjusted that the said flange shall extend below the roots of the teeth of the saw. The guard shall extend from the top of the riving knife to a point as practicable at the cutting edge of the saw.
 - (c) The part of the saw below the bench table shall be protected by two plates of metal or other suitable material one on each side of the saw; such plates shall not be more than six inches apart, and shall extend from the axis of the saw outwords to a distance of not less than two inches beyond the teeth of the saw. Metal plates, if not beaded, shall be of a thickness of at least 1/10 inch, or if beaded be of a thickness of at least 1/20 inch.

- 7. Push Sticks.- A push stick or other suitable appliance shall be provided for use at every circular saw and at every vertical spindle moulding machine to enable the work to be done without unnecessary risk.
- 8. Band Saws.- Every band saw shall be guarded as follows:-
 - (a) Both sides of the bottom pulley shall be completely encased by sheet or expanded metal or other suitable material.
 - (b) The front of the top pulley shall be covered with sheet or expended metal or other suitable material.
 - (c) All portions of the blade shall be enclosed or otherwise securely guarded except the portion of the blade between the bench table and the top guide.
- 9. Planning Machines.-
 - (1) A planning machine (other than a planning machine which is mechanically fed) shall not be used for overhand planning unless it is fitted with a cylindrical cutter block.
 - (2) Every planning machine used for overhand planning shall be provided with a "brige" guard capable of covering the full length and breadth of the cutting slot in the bench and so constructed as to be easily adjusted both in a vertical and horizontal direction.
 - (3) The fee roller of every planing machine used for thicknessing except the combined machine for overhand planing and thicknessing, shall be provided with an efficient guard.
- 10. Vertical Spindle moulding machines.- The cutter of every vertical spindle moulding machine shall be guarded by the most efficient guard having regard to the nature of the work being performed.
 - (2) The wood being moulded at a vertical spindle moulding machine shall, if practicable, be held in a zig or holder of such construction as to reduce as far as possible the risk of accident to the worker.
- 11. Chain mortising machines.- The chain of every chain mortising machine shall be provided with a guard which shall enclose the cu tiers as far as practicable.
- 12. Adjustment and maintenance of guards.- The guards and other appliance required under this Schedule shall be-
- (a) maintained in an efficient state,
- (b) constanty kept in position while the machinery is in motion, and
- (c) so adjusted as to enable the work to be done without unnecessary risk.

18. Exemptions.- Paragraphs 6, 8, 9 and 10 shall not apply to any wood working machine in res pect of which it can be proved that other safeguards are provided, maintained and used which render the machine as safe as it would be if guarded in the manner prescribed in this Schedule.

SCHEDULE VII

(Prescribed under Rule 59)

RUBBER MILLS

1. Installation of machines.- Mills for breaking down, cracking, grating, mixing, refining and warming rubber or rubber compounds shall be so installed at the top of the front roll is not less than forty-six inches above the floor or working level.

Provided that in existing installations where the top of the front roll is below this height a strong rigid distance bar guards shall be fitted across the front of the machine in such position that the operator cannot reach the nip of the rolls.

- 2. Safety Devices.-
- (1) Rubber mills shall be equipped with :-
 - (a) hoppers so constructed or guarded that it is impossible for the operators to come into contact in any. manner with the nip of the rolls;
 - (b) horizontal safety-trip rods or tight wire cables across both front and rear, which will, when pushed or pulled, operate instantly to disconnect the power and apply the brakes, or to reverse the rolls.
- (2) Safety-trip rods or tight wire cables on all rubber mills shall extend across the entire length of the face of the rolls and shall be located not more than sixty nine inches above the floor or working level.
- (3) Safety-trip rods and tight wire cables on all rubber mills shall be examined and tested daily in the presence of the Manager or other responsible person and if any defect is disclosed by such examination and test the mill shall not be used until such defect has been remedied.

SCHEDULE VIII

(Prescribed under Rule 59)

Shears, Slitters and Guillotin Machines

- 1. Definition.- For the purpose of this schedule-
 - (a) "Guillotin" means a machine ordinarily equipped with straight bevel-edged blade operating vertically against a stationery raising edge and used for cutting, metallic or non-metallic substances;

- (b) "Shears" or "Shearing machine" means a machine ordinarily equipped with straight, bevel-edged blade operating vertically against reasisting edges, or with rotary overlapping cutting wheels, and used for shearing metals or non-metallic substances;
- (c) "Slitter" or "Slitting Machine" means a machine ordinarily equipped with circular disc-type knives and used for trimming or cutting into metal or non-metallic substances or for slitting them into narrow strips; for the purpose of this schedule, this term includes bread or other food slicers equipped with rotary knives or cutting discs.
- 2. Guilloting and Shears.-
- (1) Where practicable, a barrier metal guard of adequate strength shall be provided at the front of the knife, fastened to the machine frame and shall be so fixed as would prevent any part of the operator's body to reach the descending blade from above, below or through the barrier guard or from the sides;

Provided that in case of machines used in the paper printing and allied industries, where a fixed barrier metal guard is not suitable on account of the height and volume of the material being fed, there shall be provided suitable starting devices which require simultaneous action of both the hands of the operator or an automatic device which will remove both the hands of the operator from the danger zone at every descent of the blade.

- (2) At the back end of such machines, an inclined guard shall be provided over which the slit pieces would slide and be collected at a safe distance in a manner as would prevent a person at the back from reaching the descending blade.
- (3) Power driven guillotine cutters, except continuous feed trimmers be equipped with-
 - (a) starting devices which require the simultaneous action of both hands to start the cutting motion and of at least one hand on a control during the complete stroke of the knife; or
 - (b) an automatic guard which will remove the hands of the operator from the danger zone at every descent of the blade, used in conjunction with one hand starting devices which require two distinct movements of the devices to start the cutting motion, and so designed as to return positively to the non-starting position after each complete cycle of the knife.
- (4) Where two or more workers are employed at the same time on the same powerdriven guillotine cutter equipped with two hand control, the device shall be so arranged that each worker shall be required to use both hands simultaneously on the safety trip to start the cutting motion, and at least one hand on a control to complete the cut.

- (5) Power-driven guillotine cutters, other than continuous trimmer, shall be provided, in addition to the brake or other stopping mechanism, with an emergency device which will prevent the machine from operating in the event of failure of the brake when the starting mechanism is in the non-starting position,
- 3. Slitting machine.-
 - (1) Circular disc-type knives on machines for cutting metal and leather, paper, rubber, textiles or other non-metallic substances shall, if within reach of operators standing on the floor or working level, be provided with guards enclosing the knife edges at all times as near as practicable to the surface of the material, and which may either-
 - (a) automatically adjust themselves to the thickness of the material, or
 - (b) be fixed or manually adjusted so that the space between the bottom of the guard and the material will not exceed 6 mm (1/4 in.) at an time.
 - (2) Portions of blades underneath the tables or benches of slitting machine shall be covered by guards.
- 4. Index cutters and vertical paper slotters.- Index cutters, and other machines for cutting strips from the ends of books, and for similar operations shall be provided with fixed guards, so arranged that the fingers of the operator cannot come between the blades and the tables.
- 5. Corner Cutters.- Corner cutters used in the manufacture of paper boxes shall be equipped with-
 - (a) suitable guard, fastened to the machine in front of the knives an provided with slots or perforations to afford visibility of the operations; or
 - (b) other guards equally efficient for the protection of the fingers of the workers.
- 6. Band knives.- Band wheels on band knives, and all portions of the blade except the working side between the sliding guide and the table on vertical machines, or between the wheels guards on horizontal machine, shall be completely enclosed with hinged guards of sheet metal not less than = 1 m (0.04 in.) in thickness or of other material of equal strength.

SCHEDULE IX

(Prescribed under Rule 62)

Class or description of hoist or	Requirement which shall not apply
lift	
I	II
Hoists or lifts mainly used for	Sub-Section I (b) in so far as it requires agate at the
raising materials for charging	bottom landing; sub-section I (d);
blast furnaces or lime kilns.	
	sub-section I (e), Sub-section I (b) in so far as it
mechanical power and which are	requires the hoist way of liftway enclosure to be so
not used for carrying persons.	constructed as to prevent any person or thing from
	being trapped between any part of the hoist or lift and
	any fixed structure or moving part; sub-section I (e).

SCHEDULE X

(Prescribed under Rule 66)

	Persons	Maximum weight of material article, tool or appliance (In Kilograms)
(a)	Adult male	55
(b)	Adult female	30
(c)	Adolescent male	30
(d)	Adolescent female	20
(e)	Male child	16
(f)	Female child	14

SCHEDULE XI

(Prescribed under Rule 67)

Dry grinding of metals or articles of metal applied by hand to revolving wheel or disc driven by mechanical power. Turning (external or internal) of non-ferrous metals or of cast iron or articles of such metals or such iron where the work is done dry, other than a precision turning where the use of goggles or a screen would seriously interfere with the work or turning by means of hand tools.

Welding or cutting of metals by means of an electric oxyacetylene or similar process.

The following processes when carried on by means of hand tools or other portable tools:

Fettling of metal involving the removal of metal.

Cutting out or cutting off cold rivets or bolts from boilers or other plant, or from ships.-

Chipping or scaling of boilers or ships plates.

Breaking or dressing of stone, concrete or slag.

SCHEDULE XII

(Prescribed under Rule 67)

- 1. Welding or cutting of metals by means of an electrical, oxyacetylene or similar process.
- 2. All work on furnaces where there is risk of exposure to excessive light or infrared radiations.
- 3. Process such as rolling casting or forgoing of metals where there is risk of exposure to excessive light or ultraviolet or infra-red radiations.

SCHEDULE XIII

(Prescribed under Rule 70)

First Aid Fire Fighting Equipment (1) The different type of fires and first aid fire fighting equipments suitable for use on them are as under:

Class of Fire	Suitable type of Appliances
A. Fires in ordinary combustibles (wood,	Chemical Extinguishers of soda ash, gas/
vegetables, fibres, paper & the like)	expelled water and antifreeze types, and
	water buckets.
B. Fires in flammable liquids, paints,	Chemical Extinguishers of foam carbon-
grease, solvents and the like	dioxide and dry powder types and sand
	buckets.
C. Fires in gaseous substances	Chemical Extinguishers of carbon dioxide
under pressure	and dry powder types.
D. Fires in reactive Chemicals,	Special type of dry powder Extinguishers
active metals and the like	and sand buckets.
E. Fires in electrical equipments	Chemical Extinguishers of carbon dioxide
	and dry powder types and sand buckets.

- (2) One 9 liters water buckets shall be provided for every 100 sq. mm. of the floor area or part thereof and one 9 liters water type extinguishers shall be provided to six buckets or part thereof with a minimum of one extinguisher an and two buckets part per compartment of the building. Buckets may be dispensed with provided supply of extinguishers is double that indicated above.
- (3) Acceptable replacements for water buckets and water type extinguishers in occupancies where class B fires are anticipated, are as under:-

Acceptable Replacements	Buckets of Water	Water type Extinguishers
For one buckets	For two buckets	For each 9 litres, (or 2 gallons, extinguishers
Dry and carbon- dioxide extinguisher	1 bucket 3kg. (or 7lbs.)	3 bucket 9kg. (or 20lbs.) 9kg. (or is not less than 2 20lbs.) extinguishers
Dry powder	2kg. (or 5lbs.)	5kg. (or 11lbs.) 5kg. (or is one or more 11lbs.) extinguishers
Foam extinguishers	9 liters (or 2 gallons)	9 liters (or 2 gallons) 9 liters (or 2 gallons)

- (4) The following provision shall be complied with where class fires are anticipated:
 - (a) For rooms containing electrical transformers switch gears motors and/ or other electrical apparatus only, not less than two kg. Dry -powder or carbon-dioxide type extinguishers shall be provided within 15 m. of the apparatus.

- (b) Where motors and/or other electrical equipments are installed in rooms other than these containing such equipment only one 5 kg. Dry powder or carbon-dioxide extinguisher shall be installed within 15 m. of such equipment in addition to the requirements of mentioned at (2) and (3) above. For this purpose the same extinguisher may be deemed to afford protection to all apparatus within 15 m. thereof.
- (c) Where electrical motors are installed on platforms, one 2 kg. Dry powder or carbon-dioxide type extinguisher shall be provided on or below each platforms. In case of a long platform with a number of motors, one extinguisher shall be acceptable as adequate for every 3 motors on the common platform. The above requirements will be in addition to the requirements mentioned at item (2) and (3) above.
- (5) The first-aid fire fighting equipments shall be so distributed over the entire floor area that a person has to travel not more than 15 m. to reach the nearest equipment.
- (6) Selection of sites for the installation of first-aid fire fighting equipment
 - (a) While selecting sites for first-aid fire fighting equipment, due consideration shall be given to the nature of the risk to be covered. The equipment shall be placed in conspicuous position and shall be readily accessible for immediate use in all parts of the occupancy. It should always be borne in mind while selecting sites that first-aid fire fighting equipments are intended only for use in incipient fires and their values may be negligible if the fire is not extinguished or brought under control in the early stages.
 - (b) Buckets and extinguishers shall be placed at convenient and easily accessible location either on hangers or on stands in such away that their bottom is 750 mm above the floor level.
- (7) The operating instructions of the extinguishers shall not be defaced or obliterated. In case the operating instructions are obliterated or have become illegible due to passage of time fresh transfers of the same shall be obtained from the manufacturers of the equipment and affixed to the extinguishers.

SCHEDULE XIV

(Prescribed under Rule 70)

Equipment to be provided with Trailer pump

For light trailer pump of a capacity of 680 litres/minute -

- 1 Armoured suction hose of 9 meters length, with wrenches
- 1 Metal suction strainer
- 1 Basket strainer
- 1 Two-way suction collecting head
- 1 Suction adapter
- 10 Unlined or rubber lined 70 mm delivery hose of 25 meters length complete with quick-release couplings.
- 1 Dividing breaching piece
- 2 Branch-piece with 15 mm nozzles
- 1 Diffuser nozzle
- 1 Standpipe with black cap
- 1 Hydrant key
- 4 collapsible canvas buckets
- 1 Fire hook (preventor) with cutting edge
- 1 25 mm manila rope of 30 meters length
- 1 Extension ladder of 9 meters length (where necessary)
- 1 Heavy axe
- 1 Spade
- 1 Pick axe
- 1 Crowbar
- 1 Saw
- 1 Hurricane lamp

- 1 Electric torch
- 1 Pair rubber gloves

For large trailer pump of capacity of 1800 litres /minute-

- 1 Armoured suction hose of 9 meters length, with wrenches
- 1 Metal strainer 1 Basket strainer
- 1 Three way suction collecting head
- 1 Suction adapter
- 14 Unlined or rubber lined 70 mm delivery hose of 25 meters length complete with quick-release couplings
- 1 Dividing breaching piece
- 1 Collecting breaching piece
- 4 Branch pipes with one 25 mm, two 20 mm and one diffuser nozzles
- 2 Standpipe with black cap
- 2 Hydrant key
- 6 Collapsible canvas buckets
- 1 Coiling hook (preyentor) with cutting edge
- 1 50 mm manila rope of 30 meters length
- 1 Extension ladder of 9 meters length (where necessary)

1 Heavy axe 1 Saw

1 Spade 1 Hurricane lamp 1 Pick axe 1 Electric torch

1 Crowbar 1 Pair rubber gloves

Note: If it appears to the Chief Inspector of factories that in any factory the provision of breathing apparatus is necessary he may be order in writing require the occupier to provide suitable breathing apparatus in addition to the equipment for light trailer pump or large trailer pump as the case may be.

SCHEDULE XV

(Prescribed under Rule 77)
Format of Safety Data Sheet

1. Chemical Identity			
Chemical Name		Chemical Classification	
Synonyms		Trade Name	
Formula		C.A.S. No.	U.N. No.
Regulated identification	Shipping Name Codes / Label	Hazchem m N	
	Hazardous Waste I.D. No.		
1.	1.2.110.	3.	
2.		4.	
2. Physical and Chemical data			
Boiling range/ point	0C	Physical State	Appearance
Melting/ Freezing point	0C	Vapour pressing at 350C mm	HG odour
	Solubility in water at 300C		Others
specificGravity water=1	PH		
3. Fire and explosive Hazard data			
Flammability	Yes/No Lel		Autoignition Temperature 0C
TDG Flammability	UEL % Flash Point	0C	Hazardous
Explosion sensitivity		*	Combustion
to impact		Electricity	Products
Hazardous Polymerisation			
Combustible Liquid	Explosive Material		Corrosive Material
Flammable Material	Oxidiser		Others
Pyrophoric material		Organic Peroxide	
4. Reactivity Data			
Chemical Stability			
Incompatibility with other material			
Reactivity			
Hazardous Reaction Products			
	-10	66-	
1			

5. Health Hazard data				
Routes of Entry				
Effects of Exposure/ Symptoms				
Emergency treatment				
TLV (ACGIH)	Ppm mg/m3	STEL	Ppm	Mg/m3
Permissible	Ppm mg/m3	Odour Treshold	Ppm	Mg/m3
Exposure Limit		LD	_	
LD50				
Nepa	Hazard Signal	Health Flammability	Stability	Special
6. Preventive Measures				
Personal Protective Equipment				
Handling and Storage Precautions				
7. Emergency and First-aid Measures				
Fire	Fire Extinguishing Media			
Fire	Special Procedures			
	Unusual Hazards			
Exposures	First-aid Measures Antidotes/ Dosages			
Spills	Steps to be taken Waste Disposal Methods			
8. Additional				
information / reference				
9. Manufacturer/ Suppliers Data				
Name of Firms		Contact Person in emergency		
Mailing Address		Local bodies involved		
Telephone / Tales No.		Standards Packing		
Telegraphic Address		Tremcard Details/ Ref.		
		others		
10. Disclaimer				
		-167-		

SCHEDULE XVI

(Prescribed under Rule 84)

Equipment for Occupational Health Centre in Factories-

- 1. A glazed sink with hot and cold water always available.
- 2. A table with a smooth top at least 180 cm x 105 cm.
- 3. Means for sterilizing instruments.
- 4. A couch.
- 5. Two buckets or containers with close fitting lids.
- 6. A kettle and spirit store or other suitable means of boiling
- 7. One bottle of spirtus ammeniac aromatious (120 ml).
- 8. Two medium size sponges.
- 9. Two 'Kidney' trays.
- 10. Four cakes of toilet, preferably antiseptic soap.
- 11. Two glass tumblers and two wine glasses."
- 12. Two clinical thermometers.
- 13. Two tea spoons.
- 14. Two graduated (120 ml.) measuring glasses.
- 15. One wash bottle (1000 cc) for washing eyes.
- 16. One bottle (one litre) carbolic lotion 1 in 20.
- 17. Three chairs.
- 18. One Screen.
- 19. Oneeluctric hand torch.
- 20. An adequate supply of tetanus toxide.
- 21. Coramine liquid (60 ml).
- 22. Tables-antihistaminic, antispasmedic (25 each).

- 23. Syringes with needles-2cc, 5cc and 10cc.
- 24. Two needle holders, big and small.
- 25. Suturing needles and materials.
- 26. One dissecting forceps.
- 27. One dressing forceps.
- 28. One scapels.
- 29. One stethoscope.
- 30. Rubber bandage-pressure bandage.
- 31. Oxygen cylinder with necessary attachments.
- 32. One Blood pressure apparatus.
- 33. One pateller Hammer.
- 34. One peak-flow meter for lung function measurement.
- 35. One stenach wash set.
- 36. Any other equipment recommended by the Factory Medical Officer according to specific need relating to manufacturing
- 37. In addition-
- (1) For factories employing 51 to 200 workers-
- 1. Four plain wooden splints 900 mm X 100 mm X 6 mm
- 2. Four plain wooden splints 350 mm X 75 mm X 6 mm
- 3. Two plain wooden splints 250 mm X 50 mm X 12 mm
- 4. One pair artery forceps.
- 5. Injections-morphia, pethidine, atropine, adrenaline, coramine, novacan (2 each).
- 6. One surgical scissors.
- (2) For factories employing above 200 workers-
- 1. Eight plain wooden splints 900 mm X 100 mm X 6 mm
- 2. Eight plain wooden splints 350 mm X 75 mm X 6 mm

- 3. Four plain wooden splints 250 mm X 50 rem X 12 mm
- 4. Two pair artery forceps.
- 5. Injections-morphia, pethedine, atropine, adrenaline, coramaine, novacan (4 each).
- 6. Two surgical scissors.

SCHEDULE XVII

(Prescribed under Rule 103)

INDICATIVE CRITERIA AND LIST OF CHEMICALS

INDICATIVE CRITERIA

Part I

(a) Toxic Chemicals: Chemicals having the following values of acute toxicity and which owing to their physical and chemical properties are capable of producing major accident hazards.

S1.	Degree of	Medium	lethal	dose	Medium	lethal	dose	Mediu	m	le	thal
No.	Toxicity	by the	oral	route	by the	dermal	route	concer	itratio	n	by
	_	Toxicity	(LD50	body	(dermal	LD50	body	inhala	tion	(Mg	/Kg)
		weight	of	test	weight	of	test	route	(four	ho	urs)
		animals)			animals)		LD50		(m	ıg/1)
								inhala	tion	in	test
								animal	ls		
1.	Extremely toxic	1 – 50			1 – 200			0.1 - 0	.5		
2.	Highly toxic	51 – 500			201 – 20	000		0.5 - 2	.0		

(b) Flammable chemicals:

- (i) Flammable gases/ chemicals which in the gaseous state at normal pressure and mixed with air become flammable and the boiling point of which at normal pressure is 20°C or below;
- (ii) Highly flammable liquids: Chemicals which have a flash point lower than 23°C and the boiling point of which at normal pressure is above 20°C;
- (iii) Flammable liquids: Chemicals which have a flash point lower than 65°C and which remain liquids under pressure, where particular processing conditions, such as high pressure and high temperature, may create major accident hazards;

(c) Explosives: Chemicals which may explode under the effect of flame, heat or photo-chemical conditions or which are more sensitive to shocks or friction than dinitrobenzene.

PART II-LIST OF HAZARDOUS AND TOXIC CHEMICALS

S. No.	Name of chemical
1	. Acetone
2	. Acetone Cyanohydrine
3	. Acetyl Chloride
4	. Acetylene (Ethlyne)
5	. Acrolein (2-Propenal)
6	. Acrylonitrile
7	. Aidicarb
8	. Aldrin
9	. Alkyl Phthalate
10	. Allyl Alcohol
11	. Allylamine
12	. Alpha Naphthyl Thiourea (Autu)
13	. Aminodiphenyl-4
14	. Aminophenol-2
15	. Amiton
16	. Ammonia
17	. Ammonium Nitrate
18	. Ammonium Nitrate in Fertilizers
19	. Ammonium Sulfamate
20	. Anabasine
	-171-

21.	Aniline
22.	Anisidine-P
23.	Antimony and Compounds
24.	Antimony Hydride (Stibine)
25.	Arsenic Hydride (Arsine)
26.	Arsenic Pentoxide, Arsenic (v) Acid and Salts
27.	Arsenic Trioxide, Arsenious (iii) Acids and Salts
28.	Asbestos
29.	Azinphos-Ethyl
30.	Azinphos-Methyl
31.	Barium Azide
32.	Benzene
33.	Benzidine
34.	Benzidine Salts
35.	Benzoquinone
36.	Benzoyl Chloride
37.	Benzoyl Peroxide
38.	Benzyl Chloride
39.	Benzyl Cyanide
40.	Beryllium (powders and Compounds)
41.	Biphenyl
42.	Bis (2-Chloromethyl) Ketone
43.	Bis (2, 4, 6 Trinitrophenyl) Amine
44.	Bis (2-Chloroethyl) Sulphide
	-172-

45.	Bis (Chloromethyl) Ketone
46.	Bis (tert-Butylperoxy) Butane-2,2
47.	Bis (tert-Butylperoxy) Cyclohexane-1,1
48.	Bis-1, 2 (Tribromophenoxy) Ethane
49.	Bis Phenol
50.	Boron and Compounds
51.	Bromine
52.	Bromine Pentafluoride
53.	Bromoform
54.	Butadiene-1, 3
55.	Butane
56.	Butoxy Ethanol
57.	Butylglycidal Ether
58.	Butyl Peroxyacetate, tert
59.	Butyl Peroxyisobutyrate, tert
60.	Butyl Peroxyisopropyl Carbonate, tert
61.	Butyl Peroxymaleate, Tert
62.	Butyl Peroxyprivalate, Tert
63.	Butyl Vinyl Ether
64.	Butyl-n-Mercaptan
65.	Butylamine
66.	C9-Aromatic Hydrocarbon Fraction
67.	Cadmium and Compounds
68.	Cadmium Oxide (fumes)
	-173-

69.	Calcium Cyanide
70.	Captan
71.	Captofol
72.	Carbaryl (Sevin)
73.	Carbofuran
74.	Carbon Disulphide
75.	Carbon Monoxide
76.	Carbon Tetrachloride
77.	Carbophenothion
78.	Cellulose Nitrate
79.	Chlorates (use in explosives)
80.	Chlordane
81.	Chlorfenvinphos
82.	Chlorinated Benzen
83.	Chlorine
84.	Chlorine Dioxide
85.	Chlorine Oxide
86.	Chlorine Trifluorid
87.	Chlormequat Chlo
88.	Chloroacetal Chlori
89.	Chloroacetaldehyde
90.	Chloroaniline-2
91.	Chloroaniline-4
92.	Chlorobenzene
	-174-

93.	Chlorodiphenyl
94.	Chloroepoxypropa
95.	Chloroethanol
96.	Chloroethyl Chloro
97.	Chlorofluorocarbo
98.	Chloroform
99.	Chloroformyl, -4, M
100.	Chloromethane
101.	Chloromethyl Ether
102.	Chloromethyl Meth
103.	Chloronitrobenzene
104.	Chloroprene
105.	Chlorosulphonic Ac
106.	Chlorotrinitrobenze
107.	Chloroxuron
108.	Chromium and Co
109.	Cobalt and Compo
110.	Copper and Compo
111.	Coumafuryl
112.	Coumaphos
113.	Coumatetralyl
114.	Cresols
115.	Crimidine
116.	Cumene
	-175-

117.	Cyanophos
118.	Cyanothoate
119.	Cyanuric Fluoride
120.	Cyclohexane
121.	Cyclohexanol
122.	Cyclohexanone
123.	Cycloheximide
124.	Cyclopentadiene
125.	Cyclopentane
126.	Cyclotetramethylene tetra nitramine
127.	Cyclotrimethylene trinitramin
128.	DDT
129.	Deca bromodiphenyl oxide
130.	Demeton
131.	Di-Isobutyl Peroxide
132.	Di-n-Propyl Per oxy dicarbona
133.	Di-sec-Butyl Per oxy dicarbona e
134.	Dialifos
135.	Diazodinitrophenol
136.	Diazomethane
137.	Dibenzyl Peroxydicarbonate
138.	Dichloroacetylene-o
139.	Dichlorobenzene-o
140.	Dichlorobenzene-p
	-176-

141.	Dichloroethane
142.	Dichloroethyl Ether
143.	Dichlorophenol, -2, 4
144.	Dichlorophenol, -2, 6
145.	Dichlorophenoxy Acetic Acid, -2 4 (2, 4-D)
146.	Dichloropropane, -1, -2
147.	Dichlorosalicylic Acid, -3,5
148.	Dichlorvos (DDVP)
149.	Dicrotophos
150.	Dieldrin
151.	Diepoxy Butane
152.	Diethyl Peroxydi Carbonate
153.	Diethylene Glycol Dinitrate
154.	Diethylene Triamine
155.	Diethyleneglycol Butyl Ether/ Diethyleneglycol
156.	Butyl Acetate
157.	Diethylenetriamine (DETA)
158.	Diglycidyl Ether
159.	Dihydroperoxypropane, -2, 2 ';'2.
160.	Di-isobutyryl Peroxide
161.	Dimefox
162.	Dimethoate
163.	Dimethyl Phosphoramidocyanidic Acid
164.	Dimethyl Phthalate
	-177-

165.	Dimethylcarbomyl
166.	Dimethylnitrosamine
167.	Dinitrophenol, Salts
168.	Dinitrotoluene
169.	Dinitro-o-Cresol
170.	Dioxane
171.	Dioxathion
172.	Dioxolane
173.	Diphacinone
174.	Diphosphoramide Octamethyl
175.	Dipropylene Glycolmethylether
176.	Disulfoton
177.	Endodsulfan
178.	Endrin
179.	Epichlorohydrine
180.	EPN
181.	Epoxypropane, 1, 2
182.	Ethion
183.	Ethyl Carbamate
184.	Ethyl Ether
185.	Ethyl Hexanol, -2
186.	Ethyl Mercaptan
187.	Ethyl Methacrylate
188.	Ethyl Nitrate
	-178-

189.	Ethylamine
190.	Ethylene
191.	Ethylene Chlorohydrine
192.	Ethylene Diamine
193.	Ethylene Dibromide
194.	Ethylene Dichloride
195.	Ethylene Glycol Dinitrate
196.	Ethylene Oxide
197.	Ethyleneimine
198.	Ethylthiocyanate
199.	Fensulphothion
200.	Fluenetil
201.	Fluoro, -4, -2-Hydroxybutyric Acid and Salts, Esters, Amides
202.	Fluoroacetic Acid and Salts, Esters, Amides
203.	Fluorobutyric Acid, -4, and Salts, Esters, Amides
204.	Fluorocortonic Acid, -4 and Salts, Esters, Amides
205.	Formaldehyde
206.	Glyconitrile (Hydroxyacetonitrile)
207.	Guanyl, -1, -4-Nitrosaminoguanyl-1-Tetrazene
208.	Heptachlor
209.	Hexachloro Cyclopentadiene
210.	Hexachlorocyclohexane
211.	Hexachlorocyclomethane
212.	Hexachlorodibenzo-p Dioxine, 1,2,3,7,8,9
	-179-

213.	Hexafluopropene
214.	Hexamethylphosphoramide
215.	Hexamethyl, -3,3,6, -9,9-1,2,4,5, Tetraroxacyclononane
216.	Hexamethylendiamine
217.	Hexane
218.	Hexanitrostilbene, -2, 2, 4, 4, 6, 6
219.	Hexavalent Chromium
220.	Hydrazine
221.	Hydizine Nitrate
222.	Hydrochloric Acid
223.	Hydrogen
224.	Hydrogen Bromide (Hydrobromic Acid)
225.	Hydrogen Chloride (Liquified Gas)
226.	Hydrogen Cyanide
227.	Hydrogen Fluoride
228.	Hydrogen Selenide
229.	Hydrog-en Sulphide
230.	Hydroquinone
231.	Iodine
232.	Isobenzan
233.	Isodrin
234.	Isophorone Di-isocyanate
235.	Isopropyl Ether
236.	Juglone (5-Hydroxynaphthalene-l, 4-Dione)
	-180-

237.	Lead (Inorganic fumes & dusts)
238.	Lead 2,4,6 Trini troresorcinoxide (Lead Styphnate)
239.	Lead Azide
240.	Leptophos
241.	Lindane
242.	Liquified Petroleum Gas (LPG)
243.	Maleic Anthydride
244.	Manganese & Compounds
245.	Mercapto Benzothiazole
246.	Mercury Alkyl
247.	Mercury Fulminate
248.	Mercury Methyl
249.	Methacrylic Anhydride
250.	Methacrylonitrile
251.	Methacryloyl Chloride
252.	Methamidophos
253.	Methanesulphonyl Fluoride
254.	Methanthiol
255.	Methoxy Ethanol (2-Methyl Cellosolve)
256.	Methoxyethylmercuric Acetate
257.	Methyl Acrylate
258.	Methyl Alcohol
259.	Methyl Amylketone
260.	Methyl Bromide (Bromomethane)
	-181-

261.	Methyl Chloride
262.	Methyl Chloroform
263.	Methyl Cyclohexene
264.	Methyl Ethyl Ketone Peroxide
265.	Methyl Hydrazine
266.	Methyl Isobutyl Ketone
267.	Methyl Isobutyl Ketone Peroxide
268.	Methyl Isocyanate
269.	Methyl Isothiocyanate
270.	Methyl Mercaptan
271.	Methyl Methacrylate
272.	Methyl Parathion
273.	Methyl Phosphonic Dichloride
274.	Methyl-N, 2,4,6 Tetranitroaniline
275.	Methylene Chloride
276.	Methylenebis, -4, 4 (2, -Chloraniline)
277.	Methyltrichlorosilane
278.	Mevinphos
279.	Molybedenum & Compounds
280.	N-Methyl-N, 2, 4, 6-Tetranitraniline
281.	Nephtha (Coal Tar)
282.	Naphthylamine, 2
283.	Nickel & Compounds
284.	Nickel Tetracarbonyl
	-182-

285.	Nitroaniline-O
286.	Nitroaniline-P
287.	Nitrobenzene
288.	Nitrochlorobenzene-P
289.	Nitrocyclohexane
290.	Nitroethane
291.	Nitrogen Dioxide
292.	Nitrogen Oxides
293.	Nitrogen Trifluoride
294.	Nitroglycerin
295.	Nitrophenol-P
296.	Nitropropane-1
297.	Nitropropane-2
298.	Nitrosodimethylamine
299.	Nitrotoluene
300.	Octabromophenyl Oxide
301.	Oleum
302.	Oleylamine
303.	OO-Diethyl S-Ethylsulphonyl-methyl
304.	OO-Diethyl S-Ethylsulphonyl-methyl Phosphorothioate
305.	OO-Diethyl S-Ethylthiomethyl Phosphorothioate
306.	OO-Diethyl S-Isopropylthiometh Phosphorodithioate
307.	OO-Diethyl S-Propylthiometh Phosphorodithioate
308.	Oxyamyl
	-183-

309.	Oxydisulfoton
310.	Oxygen (Liquid)
311.	Oxygen Difluoride
312.	Ozone
313.	Paroxon (Diethyl 4-Nitrophenyl Phosphate)
314.	Paraquat
315.	Parathion
316.	Parathion Methyl
317.	Paris Green (Bis Aceto Hexametar-senitotetra Copper)
318.	Pentaborane
319.	Pentabromodiphenyl Oxide
320.	Pentabromophenol
321.	Pentachloro Naphthalene
322.	Pentachloroethane
323.	Pentachlorophenol
324.	Pentaerythritol Tetranitrate
325.	Pentane
326.	Peracetic Acid
327.	Perchloroethylene
328.	Perchloromethyle Mercaptan
329.	Pentanone, 2, 4, -Methyl
330.	Phenol
331.	Phenyl Glycidal Ether
332.	Phenylene p-Diamine
	-184-

333.	Phenyl Mercury Acetate
334.	Phorate
335.	Phosacetim
336.	Phosalone
337.	Phosfolan
338.	Phosgene (Carbonyl Chloride)
339.	Phosmet
340.	Phosphamidon
341.	Phosphine (Hydrogen Phosphide)
342.	Phosphoric Acid and Esters
343. Este	phosphoric Acid Bromoethyl Bromo (2. 2-Dimethylpropyl) Bromoethyl
344. Este	Phosphoric Acid Bromoethyl Bromo (2, 2-Dimethylpropyl) Chloroethyl
345.	Phosphoric Acid Chloroethyl Bromo (2,2-Dimethoxyl propyl) Chloroethyl Ester
346.	Phosphorous and Compounds
347.	Phostalan
348.	Picric Acid (2, 4, 6 Trinitrophenol)
349.	Polybrominated Biphenyls
350.	Potassium Arsenite
351.	Potassium Chlorate
352.	Promurit (1-(3, 4-Dichlorophenyl)-3 Triazenethiocarboxamide)
353.	Propanesultone-1, 3
354.	Propen-l, 2-Chloro-l, 3-Diol-Diacetate
355.	Propylene Oxide -185-

356.	Propyleneimine
357.	Pyrazoxon
358.	Selenium Hexafluoride
359.	Semicarbazide Hydrochloride
360.	Sodium Arsenite
361.	Sodium Azide
362.	Sodium Chlorate
363.	Sodium Cyanide
364.	Sodium Picramate
365.	Sodium Selenite
366.	Styrene, 1, 1, 3, 2 Tetrachloroethane .
367.	Sulfotep
368.	Sulphur Dichloride
369.	Sulphur Dioxide
370.	Sulphur Trioxide
371.	Sulphuric Acid
372.	Sulphoxide, 3-Chloropropyloctyl
373.	Tellurium
374.	Tellurium Hexafluoride
375.	Терр
376.	Terbufon
377.	Tetrabromobisphenol-A
378.	Tetrachloro, 2, 2, 5, 6, 2, 5-Cyclohexadiene-1, 4 Dione
379.	Tetrachlorodibenzo-p-Dioxin, 2 3, 7, 8 (TCDD)
	-186-

380.	Tetraethyl Lead			
381.	Tetrafluoroethane			
382.	Tetramethylenedisulphotetramine			
383.	Tetramethyl Lead			
384.	Tetranitromethane			
385.	Thallium & Compounds			
386.	Thionazin			
387.	Thinoyl Chloride			
388.	Tirpate			
389.	Toluene			
390.	Toluene-2-4-Di-isocyanate			
391.	Toluidine-o			
392.	Toluene 2, 6-Di-isocyanate			
393.	Trans-1, 4-Chlorobutene			
394.	Tri-1 (Cycrohexyl) Stannyl-1H-1, 2, 4-Trazole			
395.	Triamino-1, 3, 5, 2, 4, 6 Trinitroxenzene			
396.	Tribromophenol, 2, 4, 6			
397.	Trichloro Acetylchloride			
398.	Trichloro Ethane			
399.	Trichloro Naphthalene			
400.	Trichloro (Chloromethyl)Silane			
401.	Trichlorodichlorophenyl Silane			
402.	Trichloroethane, 1, 1, 1			
403.	Trichloroethyl Silane			
404.	Trichloroethylene			
405.	Trichloromethanesulphenyl chloride			
406.	Trichlorophenol, 2, 2, 6			
407.	Trichlorophenol, 2,4,5 -187-			

408.	Triethylamine
409.	Triethylenemelamine
410.	Trimethyl Chlorosilane
411.	Trimethylpropane Phosphite
412.	Trinitroaniline
413.	Trinitroanisole, 2, 2, 4, 6
414.	Trinitrobenzene
415.	Trinitrobenzoic Acid
416.	Trinitrocresol
417.	Trinitrophenetole, 2, 5, 6
418.	Trinitroresorcinol, 2, 4, 6 (Styphni Acid)
419.	Trinitrotoluene
420.	Triorthocresyl Phosphate
421.	Triphenyl tin Chloride
422.	Turpentine
423.	Uranium & Compounds
424.	Vanadium & Compounds
425.	Vinyl Chloride
426.	Vinyl Fluoride
427.	Vinyl Toluene
428.	Warfarin
429.	Xylene
430.	Xylidine
431.	Zinc & Compounds
432.	Zirconium & Compounds

SCHEDULE XVIII

(Prescribed under Rule 103)

- (a) The threshold quantities set out below relate to each installation or group of installations belonging to the same occupier where the distance between installations is not sufficient to avoid, in foreseeable circumstances, any aggravation of major accident hazards. These threshold quantities apply in any case to each group of installations belonging to the same occupier where the distance between the installations in less than 500 meters.
- (b) For the purpose of determining the threshold quantity of hazardous chemical at an isolated storage, account shall also be taken of any hazardous Chemical which is:-
 - (i) In that part of any pipeline under the control of the occupier having control of the site, which is within 500 meters of that site and connected to it;
 - (ii) At any other site under the control of the same occupier any part of the boundary of which is within 500 meters of the said site; and
 - (iii) In any vehicle, vessel, aircraft or hovercraft under the control of the same occupier which is used for storage purpose either at the site or within 500 meters of it.

But no account shall be taken of any hazardous chemical which is in a vehicle, vessel, aircraft or hovercraft used for transporting it.

S1. No.	ities (Tonnes)		
			For application of Rules 61-UH to 61-UM
(1)	(2)	(3)	(4)
1.	Acrylonitrile	350.000	5.000.000
2.	Ammonia	60.000	600.000
3.	Ammonium nitrate (a)	350.000	2,500.000
4.	Ammonium nitrate fertilizers (b)	1,250.000	10,000.000
5.	Chlorine	10.000	25.000
6.	Flammable gases as defined in Schedule 1, paragraph (b) (i)	50.000	3,000.000
7.	Highly flammable liquids as defined in Schedule 1, paragraph (b) (ii)	10,000.000	10,000.000
8.	Liquid oxygen	200.000	2,000.000
9.	Sodium Chlorate	25.000	250.000
10.	Sulphur dioxide	20.000	500.000
	-189-	1	

11.	Sulphur trioxide	15.000	100.000	
12.	Carbonyl Chloride	0.750	0.750	
13.	Hydrogen Sulphide	5.000	50.000	
14.	Hydrogen Fluoride	5.000	50.000	
15.	Hydrogen Cyanide	5.000	20.000	
16.	Carbon disulphide	20.000	200.000	
17.	Bromine	50.000	500.000	
18.	Ethylene oxide	5.000	501.000	
19.	Propylene oxide	5.000	50,000	
20.	Propenal (Accrolein)	20.000	200.000	
21.	Bromomethane (Methyl Bromide)	20.000	200.000	
22.	Methyl Isocyanate	0.150	0.150	
23.	Tetraethyllead or Teramethyllead	5.000	50.000	
24.	1, 2 Dibromoethane (Ethylene dibromide)	5.000	50.000	
25.	Hydrogen Chloride (Liquified gas)	25.000	250.000	
26.	Diphenyl Methane di-isocyanate (MOl)	20.000	200.000	
27.	Toluene di-Isoscyanate (TDI)	10.000	100,000	

Footnotes:

- (a) This applies to ammonium nitrate and mixture of ammonium nitrate where the nitrogen content derived from the ammonium nitrate is greater than 28 per cent ,by weight and to aqueous solutions of ammonium nitrate where the concentration J; of ammonium nitrate is greater than 90 per cent by weight.
- (b) This applies to straight ammonium nitrate fertilizer and to compound fertilizers " where the nitrogen content derived from the ammonium nitrate is greater than 28 per cent by weight (a compound fertilizer contains ammonium nitrate together with phosphate and/or potash).

SCHEDULE XIX

(Prescribed under Rule 103)

- (a) The quantities set out below relate to each installation or group of installations belonging to the same occupier where the distance between the installation is not sufficient to avoid, in foreseeable circumstances, any aggravation of major accident hazards. These quantities apply in any case to each group of installations belonging to the same occupier where the distance between the installations is less than 500 meters.
- (b) For the purpose of determining the threshold quantity of hazardous chemical in an industrial installation, account shall also be taken of any hazardous chemical which is:-

- (i) in that part of any pipeline under the control of the occupier having control of the site, which is within 500 meters of that site and connected to it;
- (ii) at any other site under the control of the same occupier any part of the boundary of which is within 500 meters of the said site; and
- (iii) in any vehicle, vessel, aircraft or hovercraft under the control of the same occupier which is used for storage purpose either at the site or within 500 meters of it.

But no account shall be taken of any hazardous chemical which is in a vehicle, vessel, aircraft or hovercraft used for transporting it.

PART I

S1.	Chemicals	Threshold Quantities		CAS
No.			Numbers	
		For application		
		of Rules 61-UC,		
		61-UE, 61-UF and 61-UK and		
		61-UM	10 01-03	
(1)	(2)	(3)	(4)	(5)
	Group 1-Toxic Chemicals			
1.	Aldicarb	100 kg		116-06-3
2.	4-Aminodiphenyl	1 kg		92-67-1
3.	Amiton	1 kg		78-53-5
4.	Anabasine	100 kg		494-52-0
5.	Arsenic pentoxide, Arsenic (V) acid and Salts	500 kg		
6.	Arsenic trioxide, Arsenious (III) acid and salts	100 kg		
7.	Arsine (Arsenic hydride)	10 kg		7784-42-1
8.	Azinphos-ethyl	100 kg		2642-71-9
9.	Azinophos-methyl	100 kg		86-50-0
10.	Benzidine	1 kg		92-87-5
11.	Benzidine salts	1 kg		
12.	Beryllium (powders, compounds)	10 kg		
13.	Bis (2-chloroethyl) sulphide	1 kg		505-60-2
14.	Bis (chloromethyl) ether	1 kg		542-88-1
15.	Carbofuran	100 kg		1563-66-2
16.	Carbophenothion	100 kg		786-19-6
17.	Chlorfenvinphos	100 kg		470-90-6
18.	4-(Chloroformyl) morpholine	1 kg		15159-40-7
19.	Chloromethyl methyl ether	1 kg		107-30-2
		-191-		

20.	Cabalt metal, oxides, carbonates, sulphides as powders	1 t	
21.	Crimidine	100 kg	535-89-7
22.	Cyanthoate	100 kg	3734-95-0
23.	Cycloheximide	100 kg	66-81-9
24.	Demeton	100 kg	8065-48-3
25.	Dialifos	100 kg	10311-84-9
26.	OO-Diethyl S-ethylsulphenyl methyl phosphorothioate	100 kg	2588-05-8
27.	OO-Diethyl S-ethylsulphonyl methyl phosphorothioate	100 kg	2588-06-9
28.	OO-Diethyl S-ethylthiomethyl Phosphorodithioate	100 kg	2600-69-3
29.	OO-Diethyl S-isopropylthiomethyl phosphorodithioate	100 kg	78-52-4
30.	OO-Diethyl S-propylthiometh) phosphorodithioate	100 kg	3309-68-0
31.	Dimefox	100 kg	115-26-4
32.	Dimethylcarbamoyl Chloride	1 kg	79-44-7
33.	Dimethylnitrosamine	1 kg	62-75-0
34.	Dimethyl Phosphoramidocyanidic acid	1t	63917-41
35.	Diphacinone	100 kg	82-66-6
36.	Disulfoton	100 kg	298-04-4
37.	EPN	100 kg	2104-64-5
38.	Ethion	100 kg	563-12-2
39.	Fensulfothion	100 kg	115-90-2
40.	Fluenetil	100 kg	4301-50-1
41.	Fluoroacetic acid	1 kg	144-49-0
42.	Fluoroacetic acid, salts		
43.	Fluoroacetic acid, esters	1 kg	
44.	Fluoroacetic acid, amides	1 kg	
45.	4-Fluorobutyric acid	1 kg	462-23-7
46.	4-Fluorobutyric acid, salts	1 kg	
47.	4-Fluorobutyric, esters	1 kg	
48.	4-Fluorobutyric acid, amides	1 kg	
49.	4-Fluorocrotonic acid	1 kg	37759-72-1
50.	4-Fluorocrotonic acid, salts	1 kg	
51.	4-Fluorocrotonic acid, esters	1 kg	
52.	4-Fluorocrotonic acid, amides	1 kg	
53.	4-Fluoro-2-hydroxybutyric acid	1 kg	
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54.	4-Fluoro-2-hydroxybutyric acid, salts	1 kg		
55.	4-Fluoro-2-hydroxybutyric acid, esters	l kg		
56.	4-Fluoro-2-hydroxybutyric acid, amides	l kg		
57.	Glycolonitrile (hydroxyacetonitrile)	100 kg		107-16-4
58.	1,2,3,7,8,9 Hexachlorodibenzo-lp-dioxin	00 kg		
59.	Hexamethylphosphorarnide	l kg		680-31-9
60.	Hydrogen Selenide	10 kg		7783-07-5
61.	Isobenzaru	100 kg		297-78-9
62.	Isodrin	100 kg		465-73-6
63.	Juglone (5-Hydroxynaphthalene-1,4-Dione)	100 kg		481-39-0
64.	4, 4-Methylenebis (2-Chloroaniline)	10 kg		101-14-4
65.	Methyl isocyanate	150 kg	150 kg	624-83-9
66.	Mevinphos	100 kg		7786-34-7
67.	2-Naphthylamine	1 kg		
68.	Nickel metal, oxides, carbonates sulphide, as powders	,1t		
69.	Nickel tetracarbonyl	10 kg		13463-39-3
70.	Oxydisulfoton	100 kg		2497-07-6
71.	Oxygen difluoride	10 kg		7783-41-7
72.	Paraoxon (diethyl 4-nitrophenyl phosphate)	100 kg		311-45-5
73.	Parathion	100 kg		56-38-2
74.	Parathion-methyl	100 kg		298-00-0
75.	Pentaborane	100 kg		19621-22-7
76.	Phorate	100 kg	100 kg	298-02-2
77.	Phosacetim	100 kg		4104-14-7
78.	Phosgene (Carbonyl chloride)	750 kg	750 kg	75-44-5
79.	Phosphamidon	100 kg		13171-21-6
80.	Phosphine (Hydrogen phosphide)	100 kg		7803-51-2
81.	Promurit (1-(3,4 Dichlorophenyl) 3-triazenethio carboXamlde}	-100 kg		5836-73-7
82.	1, 3-Propanesultone	1 kg		1120-71-4
83.	1-Propen-2-chloro-l, 3-dio diacetate	110 kg		10118-72-6
84.	Pyrazoxon	100 kg		108-34-9
85.	Selenium hexafluoride	10 kg		7783-79-1
86.	Sodium selenite	100 kg		10102-18-8
87.	Stibine (Antimony hydride)	100 kg		7803-52-3
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88.	Sulfotop	100 kg		3689-24-5
89.	Sulphur dichloride	1t	1t 10545-	
90.	Tellurium hexafluoride	100 kg		7783-80-4
91.	TEPP	100 kg		107-49-3
92.	2, 3, 7, 8-Tetrachlorodibenzo-P dioxin (TCDD)	1 kg		!746-01-6
93.	Tetramethylenedisulphotetramine	1 kg		80-12-6
94.	Thionazin	100 kg		297-97-2
95.	Tirpate (2, 4 -Dimethyl-l, 3-dithiolane 2-Carboxaldehyde O-methyl carbo moyloxime)	100 kg		26419-73-8
96.	Trichloromethane-sulphenyl chloride	100 kg		594-42-3
97.	1-Tri (cyclohexyl) stannyl-1H-1, 2, 4-triazole	100 kg		41083-11-8
98.	Triethylenemelamine	10 kg		51-18-3
99.	Warfarin	100 kg		81-81-2
	Goup2-Toxic chemicals (Quantity > 1 tonne)			
100.	Acetone cyanohydrin (2- Cyanopropan-2-ol)	200 t		75-86-5
101.	Acrolein (2-Propenal) (1, 2-dibromomethane)	20 t		107-02-8
102.	Acrylonitrile	20 t	200 t	107-13-1
103.	Allyl alcohol (2-Propen-1-ol)	200 t		107-18-6
104.	Allylamine	200 t		107-11-9
105.	Ammonia	50 t	500 t	7664-41-7
106.	Bromine	40 t		7726-95-6
107.	Carbon disulphide	20 t	200 t	75-15-0
108.	Chlorine	10 t	25 t	7782-50-5
109.	Diphenyl methane di-isocyanate (MDI)	20 t		101-68-8
110.	Ethylene dibromide (1, 2-dibromomethane)	5 t		106-93-4
111.	Ethyleneimine	50 t		151-56-4
112.	Formaldehyde (concentration > = 90%)	5 t		50-00-0
113.	Hydirogen chloride (Uquefied gits)	25 t	250t	7647-01-0
114.	Hydrogen cyanide	5 t	20 t	74-90-8
115.	Hydrogen fluoride	5 t	50 t	7664-39-3
116.	Hydrogen sulphid	5 t	50 t	7783-06-4
117.	Methyl bromide (Bromomethane)	20 t		74-83-9
118.	Nitrogen oxides	50 t		11104-93-1
119.	Propyleneimine	50 t		75-55-8
120.	Sulphur dioxide	10 t	250 t	7446-09-5
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121.	Sulphur trioxide	15t	75 t	7446-11-9
	Tetraethyllead	5 t		78-00-2
	Tetramethyllead	5 t		75-74-1
	Toluere di-isocyanate (TDI)	10 t		584-84-9
	Group 3-Highly reactive chemicals			
125.	Acetylene (ethyne)	5 t		74-86-2
	A. Ammonium nitrate (1)	350 t	2500 t	6484-52-2
	b. Ammonium nitrate in the form of fertiliser (2)	1250 t		
127.	2, 2-Bis (tert-butyl-peroxy) butane (concentration > = 70%)	5 t		2167-23-9
128.	1, 1-Bis (tert-butyl-peroxy) cyclohexane (cencentration > = 80%)	5 t		3006-86-8
129.	Tert-Butyl peroxyacetate (concentration > = 70%)	5 t		107-71-1
130.	Tert-Butyl peroxyisobutyrate (concentration > = 80%)	5 t		109-13-7
131.	Tert-Butyl peroxyisopropyl carbonate (concentration > = 80%)	5 t		2372-21-6
132.	Tert-Butyl peroxymaleate (concentration > = 80%)	5 t		1931-62-0
133.	Tert-Butyl peroxypivalate (concentration > = 77%)	50 t		927-07-1
134.	Dibenzyl peroxydicarbonate (concentration > = 90%)	5 t		2144-45-8
135.	Di-sec-butyl peroxydicarbonate (concentration > = 80%)	5 t		19910-65-7
136.	Diethyl peroxydicarbonate (concentration > = 30%)	50 t		14666-78-5
137.	2, 2-Dihydroperoxypropane (concentration > = 30%)	5 t		2614-76-8
138.	Di-isobutyl peroxide (concentration > = 50%)	50 t		3437-84-1
139.	Di-n-propyl peroxydicarbonate (concentration > = 80%)	5 t		16066-38-9
140.	Ethylene oxide	5 t	50 t	75-21-8
141.		50 t		625-58-1
142.	3,3,6,6,9,9-Hexamethyl-1,2,4, 5- tetroxacy-clonane (concentration > = 75%)	50 t	50 t	22397-33-7
143.	,	2 t	50 t	1333-74-0
144.	3 0	200 t		7782-44-7
145.	Methyi ethyl ketone peroxide (concentration > = 60%)		5 t	1338-2-1-4
146.	Methyl isobutyl ketone peroxide (concentration > = 60%)			37206-20-5
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147.	Perilcetic acid (concentration > = 60%)	50 t		79-21-0
148.	Propylene oxide	5 t	5 t	75-56-9
149.	Sodium chlorate	25 t		7775-09-9
	Group 4-Explosive chemicals			
150.	Barium azide	50 t		18810-58-7
151.	Big (2, 4, 6-trinitrophenyl) amine	50 t	131-73-7	
152.	Chlorotrinitrobenzene	50 t		28260-61-9
153.	Cellulose nitrate (concentration > = 12.6% nitrogen)	50 t		9004-70.:0
154.	Cyclotetramethylene tetranitramine	50 t		2691-41-0
155.	Cyclotrimethylenetri nitroamiI'le	50 t		121-82-4
156.	Diazodinitrophenol	10 t		7008-81-3
157.	Diethylene glycol dinitrate	10 t		693-21-0
158.	Dinitrophenol, salts	50 t		
159.	Ethylene glycol dinitrate	10 t		628-96-6
160.	1, Guanyl-4-nitrosamineoguanyl 1-tetrazene	10 t		109-27-3
161.	2, 2',4,4', 6,6'-Hexanitrostilbene	50 t		20062-22-0
162.	Hydrazine nitrate	50 t		13464-97-6
163.	Lead azide	50 t		13424-46-9
164.	Lead styphnate (lead 2,4,6-trinitroresorcinoxide)	50 t		15245-44-0
165.	Mercury fulminate	10 t		628-86-4
166.	N-Methyl-N, 2,4,6-tetranitroaniline	50 t		479-45-8
167.	Nitrogylcerine	10 t	10 t	55-63-0
168.	Pentaerythritol tetranitrate	50 t		78-11-5
169.	Picric acid (2,4,6 Trinitrophenol)	50 t		88-89-1
170.	Sodium picrarnate	50 t		83152-7
171.	Styphnic acid (2,4,6 Trinitroresorcinol)	50 t		82~71-3
172.	1,3,5 Triamino-2,4,6 Trinitrobenzene	50 t		3058-38-6
173.	Trinitroaniline	50 t		26952-42-1
174.	2,4,6 Trinitroanisole	50 t		606-35-9
175.	Trinitrobenzene	50 t		25377-32-6
176.	Trinitrobenzoic acid	50 t		35860-50-5
177.	Trinitrocresol	50 t		28905-71-7
178.	2, 4, 6-Trinitrophenetole	50 t		4732-14-3
179.	2, 4, 6 Trinitrotoluene	50 t 50 t		118-96-7

Part II - Classes of chemicals not specifically named in Part I

Sl. No.	Classes in Chemical	Threshold Quantitie	es
		For application of Rules 61-UC, 61- UE, 61-UF, 61-UK and 61-UM	of Rules 61-UH
(1)	(2)	(3)	(4)
	Group 5 -flammable Chemicals		
1.	Flammable gases: Chemicals which in gaseous state at normal pressure and mixed with air become flammable and the boiling point of which at normal pressure is 20°C or below;		200 t
2.	Highly flammable liquids: Chemicals which have a flash point lower than 23°C and the boiling point of which at normal pressure is above 20°C;		50000 t
3.	Flammable liquids: Chemicals which have a flash point lower than 65OC and which remain liquid under pressure, where particular processing conditions, such as high pressure and high temperature, may create major accident hazards.		200 t

Footnotes:

- (1) This applies to ammonium nitrate and mixture of ammonium nitrate where the nitrogen content derived from the ammonium nitrate is greater than 28% by weight and aqueous solutions of ammonium nitrate where the concentration of ammonium nitrate is greater than 90% by weight.
- (2) This applies to straight ammonium nitrate fertilisers and to compound fertilizers where the nitrogen content derived from the ammonium nitrate is greater than 28% by weight (a compound fertilizer contains ammonium nitrate together with phosphate and/or potash).

CAS Number (Chemical Abstracts Service Number) means the number assigned to the chemical by the Chemical Abstracts Service.

SCHEDULE XX

(Prescribed under Rule 103)

1. Factories involving in production, processing or treatment of organic or inorganic chemicals using for this purpose among others:
(a) alkylation
(b) amination by ammonolysis
(c) carbonylation
(d) condensation
(e) dehydrogenation
(f) esterification
(g) halogenation and manufacture of halogens
(h) hydrogenation
(i) hydrolysis
(g) oxidation
(k) polymerization
(l) sulphonation
(m) desulphurisation, manufacture and transformation of sulpur containing compounds
(n) nitration and manufacture of nitrogen containing compounds
(o) manufacture of phosphorus containing compounds
(p) formulation of pesticides and of pharmaceutical products
(q) distillation
(r) extraction
(s) sotvation
(t) mixing

2.

Factories involving in distillation, refining or other processing of petroleum or petroleum products.

- 3. Factories involving in total or partial disposal of solid or liquid chemicals by incineration or chemical decomposition.
- 4. Factories involving in production, processing or treatment of energy gases, for example: LPG, LNG, SNG.
- 5. Factories involving in dry distillation of coal or lignite.
- 6. Factories involving in production of metals or non-metals by a wet process or by means of electrical energy.

SCHEDULE XXI

(Prescribed under Rule 103)

Information to be furnished Regarding Notification of a Major accident
Report No
of the particular accident
1. General data
(a) Name of the site
(b) Name and address of the occupier
(Also state the telephone/telex number)
(c) (i) Registration number
(ii) Licence number
(As may have been allotted under any statute applicable to the site, e.g. the Factories Act)
(d) (i) Nature of Industrial activity
(Mention what is actually manufactured, stored etc.)
(ii) National Industrial Classification, 1987 at the four digit level
2. Type of major accident
Explosion Fire Emission of Hazardous chemical
3. Description of the major accident
(a) Date, shift and hour of the accident
(b) Department/Section and exact place where the accident took place
(c) The process/ operation undertaken in the Department/Section where the accident took place (Attach a flow chart, if necessary)
(d) The circumstances of the accident and the hazardous chemical involved

4. Emergency measures taken and measures envisaged to be taken to alleviate short term effects of the accident.
5. Causes of the major accident
Known (to be specified)
Not known
Information will be supplied as soon as possible
6. Nature and extent of damage
(a) Within the establishment
-casualties
-Killed
-Injured
-Poisoned
-Persons exposed to the major accident
-Material damage
-Damage is still present
-Danger no longer exists
(b) Outside the establishment
-casualties
-Killed
-Injured
-Poisoned
-Persons exposed to the major accident
-Material damage
-Damage to environment
-Damage is still present
-Danger no longer exists

- 7. Data available for assessing the effects of the accident on persons and environment,.
- 8. Steps already taken or envisaged:
- (a) to alleviate medium or long-term effects of the accident.
- (b) to prevent recurrence of similar major accident.
- (c) Any other relevant information.

SCHEDULE XXII

(Prescribed under Rule 103)

Information to be furnished for the Notification of Site

Particulars to be included in a notification of site

- 1. The name and address of the occupier making the notification.
- 2. The full postal address of the site where the notifiable industrial activity will be carried on.
- 3. The area of the site covered by the notification and of any adjacent site which is required to be taken into account by virtue of Schedule 18 (b) and Schedule 19(b).
- 4. The date on which it is anticipated that the notifiable industrial activity will commence or if it has already commenced a statement to that effect.
- 5. The name and maximum quantity liable to be on the site of each hazardous chemical for which notification is being made.
- 6. Organisation structure, namely, organisation diagram for the proposed industrial activity and set up for ensuring safety and health.
- 7. Information relation to the potential for major accidents, namely-
 - (a) identification of major accident hazards,
 - (b) the condition of events which could be significant in bringing one about
 - (c) a brief description of the measures taken. 8. Information relating to the site namely-
 - (a) a map of the site and its surrounding area to a scale large enough to show any features that may be significant in the assessment of the hazard or risk associated with the site;

- (i) area likely to be affected by the major accident,
- (ii) population distribution in the vicinity.
- (b) a scale plan of the site showing the location and quantity of all significant inventories of the hazardous chemicals;
- (c) a description of the processes or storage involving the hazardous chemicals, the maximum amount of such a hazardous chemical in the given process or storage and an indication of the conditions under which it is normally held;
- (d) the maximum number of persons likely to be present on site-
- 9. The arrangement for training of workers and equipment necessary to safety to such workers.

SCHEDULE XXIII

(Prescribed under Rule 103)

Information to be furnished in a Safety Report

- 1. The name and address of the person furnishing the information.
- 2. Description of the industrial activity, namely-
 - (a) Site.
 - (b) Construction design.
 - (c) Protection zones (explosion, protection, separation distances).
 - (d) Accessibility of plant.
 - (e) Maximum number of persons working on the site and particularly of those persons exposed to the hazard.
- 3. Description of the processes, namely-
 - (a) technical purpose of the industrial activity,
 - (b) basic principles of the technological process,
 - (c) process and safety-related data for the individual process stages,
 - (d) process description,
 - (e) safety related types of utilities.

- 4. Description of the hazardous chemicals, namely-
 - (a) chemicals (quantities, substance data on physical and chemical properties, safety related data on explosive limits, flash point thermal stability, toxicological data and threshold limit values, lethal concentrations,
 - (b) the form in which the chemicals may occur or into which they may be transformed in the event of abnormal conditions,
 - (c) the degree of purity of the hazardous chemicals.
- 5. Information on the Preliminary Hazard Analysis, namely-
 - (a) type of accident,
 - (b) system elements or foreseen events that can lead to a major accident,
 - (c) hazards,
 - (d) safety relevant components.
- 6. Description of safety relevant units, among others-
 - (a) Special design criteria,
 - (b) controls and alarms,
 - (c) pressure relief systems,
 - (d) quick acting valves,
 - (e) collecting tanks/ dump tanks,
 - (f) sprinkler systems,
 - (g) fire protection.
- 7. Information on the hazard assessment, namely-
 - (a) identification of hazards,
 - (b) the causes of major accidents,
 - (c) assessment of hazards according to their occurrence frequency,
 - (d) assessment of accident consequences,

- (e) safety systems,
- (f) known accident history.
- 8. Description of information on organisational systems used to carry on industrial activity safety, namely-
 - (a) maintenance and inspection schedules,
 - (b) guidelines for the training of personnel,
 - (c) allocation and delegation of responsibility for plant safety,
 - (d) implementation of safety procedures.
- 9. Information on assessment of the consequences of major accidents, namely
 - (a) assessment of the possible release of hazardous chemicals or of energy.
 - (b) possible dispersion of released chemicals,
 - (c) assessment of the effect of the release (size of the affected area, health effects, property damage).
- 10. Information on the mitigation of major accidents, namely-
 - (a) fire brigade,
 - (b) alarm systems,
 - (c) emergency plan containing system of organisation used to fight the emergency, the alarm and the communication routes, guidelines for fighting the emergency, examples of possible accident sequences,
 - (d) co-ordination with the District Collector or the District Emergency Authority and its off-site emergency plan,
 - (e) notification of the nature and scope of the hazard in the event of a accident,
 - (f) antidotes in the event of a release of a hazardous chemical.

SCHEDULE XXIV

(Prescribed under Rule 103)

Details to be furnished in the On-site Emergency Plan

- 1. Name and address of the person furnishing the information.
- 2. Key personnel of the organization and responsibilities assigned to them in case of an emergency.
- 3. Outside organization if involved in assisting during on-site emergency
 - (a) Type of accidents
 - (b) Responsibility assigned.
- 4. Details of liaison arrangement between the organizations.
- 5. Information on the preliminary hazard analysis
 - (a) Type of accidents
 - (b) System elements or events that can lead to a major accident
 - (c) Hazards
 - (d) Safety relevant Components
- 6. Details about the site
 - (a) Location of dangerous substances
 - (b) Seat of key personnel
 - (c) Emergency control room.
- 7. Description of hazardous chemicals at plant site
 - (a) Chemicals (Quantities and toxicological data)
 - (b) Transformation if any which could occur
 - (c) Purity of hazardous chemicals.
- 8. Likely dangers to the plant
- 9. Enumerate effects of:
 - (i) stress and strain caused during normal operation;

- (ii) fire and explosion inside the plant and effect if any of fire and explosion out side.
- 10. Details regarding
 - (i) Warning, alarm & safety and security systems.
 - (ii) Alarm and hazard control plans in line with disaster control and hazard control planning, ensuring the necessary technical and organizational precautions.
 - (iii) Reliable measuring instruments, control units and servicing of such equipments.
 - (iv) Precautions in designing of the foundation and load bearing parts of the building.
 - (v) Continuous surveillance of operations.
 - (vi) Maintenance and repair work according to the generally recognized rules of goods engineering practices.
- 11. Details of communication facilities available during emergency and those required for an off-site emergency.
- 12. Details of fire fighting and other facilities available and those required for an off-site emergency.
- 13. Details of first aid and hospital services available and its adequacy.

SCHEDULE XXV

(Prescribed under Rule 127)

- 1. Manager
- 2. Assistant Manager
- 3. Chief Engineer
- 4. Chief Chemists
- 5. Departmental head
- 6. Electrical/Mechanical. Engineers (Maintenance)
- 7. Labour Officers
- 8. Overseers

- 9. Boiler In-charge
- 10. Technical Experts
- 11. Head Store Keepers
- 12. Laboratory In-charge
- 13. Power House Superintendent

Working in power house

- 14. Assistant Power House Superintendent
- 15. Workshop In-charge
- 16. Foreman
- 17. Inspectors Working in Engg.
- 18. Chargemen Work shop
- 19. Workshop Overseers/or works in-charge Working in Spinning & Weaving Factory.
- 20. Head Electricians
- 21. Supervisors
- 22. Jobbers
- 23. Overseers
- 24. Weaving & Spinning Masters
- 25. Foremen Mechanics.

SCHEDULE XXVI

(Prescribed under Rule 130)

	Class of factory	Nature of exempted work		Conditions of exemption
1	2	3	4	5
(a) 64 (2)(a) and 64 (3)	All factories	Urgent repairs	Sections 51,	(i) No worker shall be employed on such repairs for more than 15 hours on any working day, 39 hours during any three consecutive days or 60 hours during each period of seven consecutive days, commencing from his first employment on such repairs.
				(ii) Interval of at least half an hour for food and rest shall be given after a period of work not exceeding six hours on each working day to all workers employed on such works.
				(iii) Within 24 hours of commencement of the work, notice shall be sent to the inspector describing to nature of the urgent repairs and the period probably required for their completion and a copy of the notice shall be affixed on a conspicuous place near the main entrance to the factory before the workers are put on urgent repairs.
				(vi) Exemption from the provisions of section 54 shall apply only in the case of adult male workers.
	<u> </u>	-209-	1	

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	2. The steam or water pipes or pump of a factory or work on extrusion machines		(ii) No worker shall be employed for more than 10 hours on any one day.
(b) 64 (2)(b) and 64(3)		54, 55 & 61	(i) No worker shall be employed for more than 54 hours in any one week. The total number of hours of overtime work shall not exceed 50 for any one quarter.
			statement giving the names of all persons who have worked for more than 9 hours in any one day or more than 48 hours of the preceding week in a factory, such statement shall also show total number of hours worked each day of the week. (vi) If the Inspector is of the opinion that any work being carried on or likely to be carried on in a factor as "Urgent Repairs" is manager and order to that effect and the manager shall in respect of such work not allow any worker to work in contravention of the provision of Sections 51, 52, 54, 55 and 56 and shall comply with section 61.
			(v) Shall send weekly, during the continuance of the work of urgent repairs

	3. Work of examining for repairing any machinery or other parts of the plant which is necessary for carrying on the work in a factory.		(iii) Interval of at least half an hour for a rest shall be given on each working to all workers employed in such work.
	4. Work in Boiler houses and engine rooms such as lighting fires in order to raise steam or generate gas preparatory to the commencement of regular work in the factory or work on extrusion machines.		(vi) The spread over including interval for rest shall not exceed 12 hours on any one day.
(c) 64 All Factories (2)(c) and 64(3)		54, 55 & 61	As at (i), (ii), (iii) & (iv) against entry (b)
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64 (3)	Electric supply undertaking generating electricity	_	(i) The total number of hours of over time work of any workers shall not exceed 50 for any one quarter.
			(ii) No worker shall be employed for more than 14 consecutive days without rest period of at least 24 consecutive hours. Holidays so lost shall be fixed in accordance with Section 53 of the Act.
			(iii) No worker, shall be allowed to work or for more than 10 hours on any one day or for more than 56 hours in one week.
			(iv) in the absence of a worker who has failed to report for duty a shift worker shall be allowed to work the whole or part of a subsequent Shift provided that:-
			(a) the next shift or shift worker shall not commence before a period of 8 hours had elapsed.
			(b) Within 24 hours of the commencement of the subsequent shift notice shall be sent the Inspector describing the circumstances under which the worker is required to work in the subsequent shift.
			(v) Interval of at least half an hour for rest shall be given on each working day to all workers employed in such work.
			(vi) The exemption shall be restricted to only male adult workers.
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	Work performed by workers on operation of transforming plant, switches and synchronous condensers.	54, 55 & 61		
Disposal works and water supply	Works performed by			
hydrogenation factories.	The work, viz. refining bleaching filtering, generation of hydrogen hydrogenating and decade rising processes, compression of oxygen, Cylinder filling and work in electrical power plant.			
factories Ice Factories		54, 55 & 61 Section 51, 52, 54, 55 & 61		
		61	` '	 above

	Work of firemen		
	employed in		
	1 J	61	
	Work on		
	attending to		
_	generators and	61	
oxygen and Acetyelene Gas	compressors.		
Carbonic Acid			Such workers shall be
_	-		allowed to take light
	Carbonic Acid		refreshment or meals at
	Gas.		the place of their
			employment in room
			specially, reserved for the
			purpose or in a canteen
			provided in the factory,
			once during any period
Inch and Ot - 1	O		exceeding four hours.
	Operation of		
_	blast furnaces,	` '	
0	steel melting furnaces rolling		
similar plants			
attached to	1111115.		
any other			
factory			
	All work on	Section 52.	As at (ii) and (iv) above
Factories iron			against this entry such
and steel	furnaces.		workers shall be allowed to
	Operation of		take light refreshment or
 _	cupola or steel		meals at the place of their
-	melting		employment in a room
	furnaces		specially, reserved for the
	including other		purpose or in a canteen
	work connected		provided in the factory,
	therewith and		once during any period
	incidental		exceeding four hours.
	thereto.		
	014		
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		Work on choppers, digesters, kneaders, strainers		As at (ii) above against this entry and (ii), (iii) against entry (b).
		washers, beaters, paper making machine, pumping,		
		plants, reclars, cutters and power plants.		
			Section 55	As at (iii) against entry (b).
		curing process.		ris at (iii) against circly (b).
		Worlz performed	Section 51	As at (i) to (iv) against entry
] 1 1	-	by kiermen.	52, 54, 55 & 61	
(or departments			
1 1 2	Of factories and bleaching finishing mercerizing and dyeing department of factories.		Section 51, 52, 54, 55 & 61	
	Departments of factories	connection with	Section 51, 52, 54, 55 & 61	
	Hides & skin Factories		Section 51, 52, 54, 55, 56 & 61	As at (iii) against entry (b)
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				(i) No worker shall be employed for more than 14 consecutive days without holiday of 24 consecutive hours.
				(ii) The total number of hours of over time work shall not exceed 50 in any one quarter.
				(iii) All workers working in excess of 48 hours per week in a factory shall be paid in respect of such additional hours at the rate of twice the ordinary rate in accordance with the provisions of section 59 of the Act.
				(iv) Every worker shall be given a compensatory holiday in accordance with section 53 of the Act.
				(v) Interval of at least half an hour food and rest shall be given to all the workers employed on such works.
(e) 64 (2) (c) & 64 (3)	Dairies	All work	Section 52	(vi) The work of such workers on Sunday shall not exceed 4 hours.
(f) 64 (2) (h) & 64 (3)	Engine room & boiler houses	Workers employed on operation of engines and boilers.	Section 52	As at(ii) against entry (d)
(g) 64 (2) (i) & 64 (3)	All Newspaper	Teleprinter Service		As at (i), (ii), (iii), (iv) against entry at (b).
(h) 64 (2) (j)	All factories	Ο,	Section 51, 54 & 61	As at (i), (ii), (iii), (iv) against the entry at item (d) 64 (2) (d) and 64 (3)
				(i) No worker shall be allowed to work for more than 60 hours in one week.
				(ii) The spread over inclusive of Interval for rest shall not exceed 12 hours in any one day.
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