

Hazard Assessment And Risk Control Register (HACR)

| Hazard Identification, Risk Assessment And Risk Control Register (HIRA) | | | | | | | | | | | | |
|---|--|------------|--|-----------|-------------------------|--|--|-------------|-------------|------------|---|-------------|
| DEPARTMENT | Hand Casting | Date | Page No. | | | | | | | | | |
| Activity | Sub-Activities | E / R / IR | Hazard | Hazard No | RISK | Present control Method by Substitution, Control, Personal protective equipment | Elimination, Administrative control, Legal | Probability | Consequence | Risk Level | Significant Hazard / Non Significant Hazard | Priority No |
| 1) Material handling | | | | | | | | | | | | |
| 1) Material handling | 1) The chemicals are stored from store as trots from store & the chemicals are liquid & powder, present in the 20 ltr can & 25 kgs gunny bags respectively & components to PPE like basket trots, discharging the material in trots & help of trots & unload it to its respective place. | R | Sprain due to manual lifting. | 1 | III Health | provided two castor is lift the can & bags | provided two castor is lift the can & bags | -- | 1 | 2 | 2 | Low |
| 1) Material handling | | R | Chemical can may fall on leg. | 2 | Foot injury | safety shoes provided | — | — | 1 | 2 | 2 | Low |
| 1) Material handling | | R | Gummi bag may fall on leg. | 3 | Foot injury | safety shoes provided | — | — | 1 | 2 | 2 | Low |
| 1) Material handling | | R | Basket may fall on leg. | 4 | Foot injury | safety shoes provided | — | — | 1 | 2 | 2 | Low |
| 1) Material handling | | R | Chemical can spiller. | 5 | Body injury | pvc apron, nose mask, hand gloves, safety googles provided | — | — | 1 | 2 | 2 | Low |
| 1) Material handling | | R | Foot may come down between litter & slotted floor. | 6 | Foot injury | Gas avoid by providing MS plate welded to litter platform. | — | — | 1 | 2 | 2 | Low |
| 1) Material handling | | R | Chemical may splash on body | 7 | Burn injury, Eye Injury | pvc apron provided, Hand glove provided, pvc hand safety googles provided | — | — | 2 | 1 | 2 | Low |
| 2) Degreasing (UJAJI) | 1) Prepare the bath with using chemical KEM Economic AC 1100 & KEM Economic AC 1141. | R | Fumes of chemical may be inhaled by operator | 8 | III Health | Nose Mask Provided, Measuring & monitoring, Pneumatic Blower and scrubber provided | — | — | 2 | 2 | 4 | High |
| 2) Degreasing (UJAJI) | 2) maintain the bath temp in electric heaters for Erratum (temp 55 -65 deg C) and non-erratum (40 - 50 deg C) | R | Chances of fire to PTFE coated circuit due to over heating or short circuit. | 9 | Burn injury | fire extinguisher ABC types provided | — | — | 1 | 3 | 3 | Medium |
| Conveyor Loading | 1) Bring the hanger from hanger stand & hang on conveyor. Operator by walking on platform of P.T LINE | R | Hanger can fall down | 10 | Burn injury | Hanger looks like increase so that hanger can not fall | Legal | 2 | 2 | 4 | Medium | 3 |
| Conveyor Loading | 4) Start the air agitation | R | Basket fall down (Joint Clutching) | 11 | Joint injury | Measuring and monitoring of joint clutching | LC | 2 | 2 | 4 | Medium | 4 |
| Conveyor Loading | 1) Take the powder in powder/polyester spraying hopper | R | Strain due to operating R. | 12 | III Health | — | — | 1 | 2 | 2 | Low | — |
| Conveyor Loading | 5) Manually, chemical powder add in the bath by using PTFE | R | Inhalation of powder | 13 | III Health | Nose mask V110 is provided | — | — | 2 | 1 | 2 | Low |
| Conveyor Loading | 7) Discard the bath once in six months. And clean the bludge with fresh water | R | Add the chemical powder | 14 | III Health | Liquid fume provided, Nose mask provided, soft cloth provided | — | — | 1 | 2 | 2 | Low |
| Conveyor Loading | 1) Prepare the bath with using chemical KEM Economic AC 1212 (polyester & sand) & water | R | Inhalation of odour of chemical | 15 | III Health | Nose mask provided, Rubber hand gloves, Safety glasses provided | — | — | 1 | 2 | 2 | Low |
| Conveyor Loading | 2) Discard the tank once in three months & clean the tank by fresh water | R | Chemical splashes on body | 16 | Burn injury, Eye Injury | pvc apron provided, Hand glove provided, pvc hand safety googles provided | — | — | 1 | 2 | 2 | Low |
| Conveyor Loading | 3) Off hanger component cleaning | R | Odour of solution may cause nausea, vomiting | 17 | III Health | Nose mask, Rubber hand gloves, Safety glasses provided | — | — | 1 | 2 | 2 | Low |
| Conveyor Loading | 4) Air agitation start | R | Nitrogen may be leaked | 18 | III Health | PVC | — | — | 1 | 2 | 2 | Low |
| Conveyor Loading | 5) Air agitation start | R | Chemical contact with skin | 19 | Joint, III Health | PVC | — | — | 1 | 2 | 2 | Low |
| Conveyor Loading | 6) Chemical may goes to eyes | R | Eye Irritation | 20 | Eye Irritation | PVC | — | — | 1 | 2 | 2 | Low |
| er Kunkung (I,I,I,IV,IV,V,V,VI,VI) | 1) Take the full fresh water in the water reuse tank. | K | Start air valve for air flow | 21 | III Health | — | — | — | 1 | 2 | 2 | Low |
| er Kunkung (I,I,I,IV,IV,V,V,VI,VI) | 2) Dip the degreased component basket in the tank & overflow the water. | K | Fall of basket from the hoist | 22 | Injury | — | — | — | 1 | 2 | 2 | Low |
| er Kunkung (I,I,I,IV,IV,V,V,VI,VI) | 3) Air agitation start | K | Fall from height | 23 | Injury | — | — | — | 1 | 2 | 2 | Low |
| er Kunkung (I,I,I,IV,IV,V,V,VI,VI) | 4) Confirm diesel level in the upper tank | K | Injury | 24 | Injury | Killing provided to staircase. | — | — | 1 | 2 | 2 | Low |