

MANAGEMENT OF SERIOUS ACCIDENTS

The definition of serious accident is given in para 2.06. Detailed action to be taken in case of serious accident is chronologically discussed in this chapter. In case of serious accident involving loss of human life or grievous hurt or damage to property or serious interruption of any important through line of communication, etc. the duties of different categories of Railway Officials have already been stipulated in Chapter-III of this manual. However, every official who proceed to the site of accident first shall act more efficiently to take the immediate decisions at his own discretion which is best for saving of lives and providing relief until rescue and relief team arrives.

6.01 Protection of site of accident :

Loco pilot of the train immediately switch on the flasher light of loco and protect the site of accident. On single line section, LP/ALP shall protect in front and Guard in rear of the train. In case of double line section, if the adjacent line is blocked or if it cannot be ascertained clearly, LP/ALP shall protect the adjacent line and Guard shall protect in rear of the obstructed line as mentioned in SR 6.03.01 and GR 9.10.

Station Master of either direction shall block their instruments in 'TOL' position and line blocked lever/slide collars shall be used on concerned levers/push buttons.

6.02 First Information from site of accident :

Train crew or railway official available at site shall give information of accident by quickest available communication to the station masters of either end, section controller or any

other official with whom he can communicate at the earliest. He shall inform location of accident, clearance of adjacent line, number of coaches derailed, chances of casualty, nature of assistance required, etc.

6.03 Accident Alarm Bell in control office and Sounding of Hooter -

An accident alarm bell is provided in Divisional and Central Control offices under the control of Dy. Chief Controller. On receiving the first information report of serious accident, Dy. CHC shall ring the alarm for 2 minutes to gather all officials of control office. He shall brief the first information to all of his counterparts. Simultaneously, he should also arrange for sounding hooter as mentioned in para 4.12 to dispatch ARME and ART as the case may be.

6.04 Information to Divisional Officials and Controlling station

As soon as the first information of accident is received, each departmental controller has to inform to respective Divisional officers in the following manner who in turn inform to respective HOD/PHOD at zonal HQ. (Refer Appendix-6)

- i) CHC / Dy CHC - DRM, ADRM, Operating, Safety, Medical and Central Control at HQ, RMS, Civil, Military and near by hospitals,
- ii) TLC/TPC - Electrical,
- iii) DPC - Mechanical,
- iv) S&T - S&T and Stores,
- v) Security - RPF and Police Authorities
- vi) Commercial - Commercial, Public Relations,

- vii) Engineering - Engineering, Accounts and Personnel

Section Controller shall also inform controlling station about accident. On receipt of information, Station Manager of controlling station shall proceed to the accident site as mentioned in Rule 1.02 (f).

Note : (i) Medical, Accounts and Personnel Departments shall be informed in case of Passenger Train is involved in accident.

(ii) In case goods train, medical department is to be informed in case of any injury to crew/guard.

(iii) Postal authorities are to be informed in case accident of mail carrying trains.

6.05. Working of ARME and ART —

a) Preliminary warning for ARME and/or ART :

- (i) If a passenger carrying train does not arrive at the next block station within 10 minutes or goods train does not arrive within 20 minutes after allowing for its normal running time from the station in rear, the Station Master on duty at the Station in advance shall immediately advise the station in rear and the control, and take other actions as detailed in GR 6.04 and SR 6.04.01.
- (ii) Without waiting for the message of requirement of ARME/ART, the section controller on duty on receipt of accident message shall immediately issue a preliminary warning to the nearest station where A.R.M.E van or AR.M.E scale-II is located and also the Crew Controller/SSE (C&W) and the Station Master of the station where the

Relief Train is located, so as to keep them in readiness for despatch pending further information. The Section Controller will also arrange for an engine to be made readily available for sending the ARME and/or A.R.T to the site, or for working as an Assisting Engine, if necessary. On receipt of further information that ARME is necessary, the same should be worked out at once or else, it may be cancelled subsequently.

(b) Despatch of ARME/ART :

- (i) Instructions as regards ordering and despatch of accident relief medical equipments and accident relief train have already been stipulated in para 4.14 of this manual.
- (ii) Movement of ARMV and ART should never be clubbed together. ARME and ARTs should be despatched within stipulated target time. These should not be stopped anywhere enroute for picking up any one except for loading of relief material.
- (iii) Two operating shunting staff of base station of ARME/ART should be nominated as break down shunting staff. Their duty involve (a) quick shunting operations for despatch ARME/ART and (b) attend the station immediately on hearing the hooter. These duties are in addition to normal duties and they are eligible to draw break down allowance like other break down staff. This must be ensured.
- (iv) However, in case of accident with injuries where the site of accident is approachable by road, immediate action should be taken to rush with the medical aid if can be reached more quickly by road than train. For

this purpose, the Railway's Road Ambulance vans should be kept in proper working condition, so that they are fit to undertake long journeys. Alternative road vehicles of the Railway may also be earmarked for transporting medical officers, paramedical staff and disaster equipment to the site of accident.

- (v) The Railway Medical Officer at a place where scale-II equipment has been provided shall proceed to the site of accident with his medical gang and entire scale-II equipment by first available means. For this purpose, any suitable rail or road vehicle shall be kept nominated normally. In case the nominated vehicle is not available or has become defective, an alternative arrangement must be made to transport the medical team and equipment even as per the procedure as mentioned in sub para (b) above. Considering the type of the accident, a part of the scale-II equipment may also be taken by the medical team with them.

6.06 Transport Arrangement :

Maximum number of Railway vehicles including vehicles of officers shall be moved to accident site for transportation of injured, man and material. Adequate number of road vehicles can be hired as per requirement.

6.07 Officers required to go to site :

At division, DRM along with MS, SR.DME, Sr.DSO, Sr. DSTE, Sr.DCM, Sr.DSC, Sr.DEE(G), Sr.DEN(Co), Sr.DEE(Tr.D)/Sr. DEE (OP) should move to the site and other officer shall present in Divisional Emergency Cell.

At Zonal HQs, GM will proceed to the site and COM shall stay in Central Emergency Cell at HQ for co-ordination work. Department wise, designation of officers who are

required to go to site and to stay at control office shall be decided by concerned CHOD/PHOD.

6.08 Opening of Emergency Cell :

In order to share the information of assistance, relief, rescue and restoration from accident site to various locations, divisional and Zonal HQ emergency cells shall be opened at Division and Zonal HQ at Multi Disaster Resistant Control Room. Fixed telephone numbers should be provided exclusively for permanent use of emergency telephones during accident. These numbers shall not be used for any other purpose. These telephone numbers are given at appendix -16.

a) Divisional Emergency Cell : The cell shall be opened in the Multi Disaster Resistant Control Room. This will exercise control, coordinate and arrange supplementary assistance to the site of accident. Sr.DOM/DOM shall function as Divisional Emergency Officer. Frequent bulletins from control shall be transmitted to zonal emergency cell. Requirements of all departments for movement of men and material to the site of accident shall be conveyed to the Divisional Emergency Officer who shall arrange their movement. This cell shall inform the Zonal Emergency Cell about any requirement from adjoining divisions and zones.

b) Zonal Emergency Cell : At Zonal HQ, Emergency Cell shall be opened in the Multi Disaster Resistant Control Room. CPTM shall be the Chief Emergency Officer who will be overall incharge of the cell. This will assist the division to cope up with the requirement of men and material and supplement the assistance from adjacent divisions/zones. This cell, if necessary arrange for assistance from Defence, Paramilitary establishments, State Govts, etc.

(c) Manning of Divisional/Zonal Emergency Cell :

Divisional and Zonal Emergency Cell shall be manned round the clock by officers. In addition to officers of the operating department, officers from all other branches shall also be deputed round the clock. Concerned branch officer shall prepare duty list of their branch officers to man the cells round the clock till restoration is made. There should be atleast 2 hours gap between the duty roster of officers of Division and HQ so that information can be shared without any confusion. They should also give updated information to the helpline booths.

(d) Liason with Railway Board : Zonal Emergency Cell shall maintain constant liason with Safety Directorate's Emergency Cell in Railway Board. 3 hourly progress report on the rescue and relief work shall be communicated to Board. Zone will take assistance of Board ...

- i) in getting material, locos and other relief arrangement from other Zonal Railways.
- ii) Regulation of coaching and freight trains
- iii) Opening of helpline booths at important locations enroute of the illfated train.
- iv) Movement of MR/MOSR, CRB and other Board Members to the site of accident.
- v) to get assistance of Defence, Para Military and State/Central Govt. agencies.

6.09 Dealing with Injured and Dead : General policy in case of accidents in which casualties occur is that of rapid evacuation to hospitals after rendering immediate and necessary first-aid treatment. Most trauma patients who have experienced shock and remain in that state of shock

for long duration will die. Medical attention within the first one hour of accident is very crucial to save the lives of passengers. **This hour is called Golden Hour.** Therefore the officials who reach first at site shall make every endeavour to extricate the injured passenger and shift them to nearby Govt./Railway Hospital after giving first aid. If no Govt./Railway Hospital is available nearby, victims can be sent to nearby private hospitals. Full powers in this connection will be exercised by General Manager.

Following action shall be taken :

- a) Maximum number of doctors should be deputed for this activity.
- (b) On arrival at the site of accident, the Railway Medical Officer after affording medical aid as best as possible, arrange for the removal of the injured promptly from the site of accident to the ARMV, nearest Railway, Civil, Military or private hospitals considering the seriousness of the injury and with the help of all available assistance. As far as possible a Railway Medical Officer must accompany the injured to the hospital and see that they are properly accommodated for further treatment.
- (c) Each of the seriously injured persons must be given a ticket, showing his name and address, name and address of nearest relative, the time and place of accident, probable diagnosis and treatment given. This ticket may be placed round the neck of the disabled or unconscious for guidance of the hospital and which may be eventually removed.
- (d) Officers of all departments including construction shall give every possible assistance to the Medical Officer

in his effort to reach the site of accident with his team and medical aid as also for shifting of the injured.

- (e) Train carrying injured persons from the site of accident shall be given priority over all other trains. The Controller and Deputy Chief Controller on duty of the section shall be responsible to arrange absolute priority for its journey. On non-controlled section or in case of suspension of control system, the Station Master on duty at the stations concerned must take every action in time to intimate the fact to the station in advance for running of such train on top priority and without any detention at any point.
- (f) In case, the injured persons are admitted in non-railway hospitals, the seniormost Medical Officer of the division will maintain close liaison with the hospital authority in order to ascertain the latest condition of the injured persons. If necessary, visit shall also be made to such hospitals.
- (g) The seniormost Medical Officer of the division/ Hospital shall be responsible to ensure recording the details of injuries and the treatment undertaken for each case as also the further disposal particulars of the injured.
- h) A complete list of the injured persons and dead with full particulars of the injuries, etc. shall be prepared separately by senior most medial officer with as much as information available with them.
- i) Medical and Commercial staff should be deputed at each hospital to get the updated information till the seriousness of the injured exist.
- j) Dead bodies taken out from coaches should be stacked at quite some distance from the track. Dead bodies should

be covered with shrouds/placed inside a plastic bag with zip and disposed as early as possible. A label having information about the person died should be tied with the body. Photography/Videography of the bodies shall be taken for identification, to be coordinated by medical department. In many cases relatives decide to perform last rites at the place of accident itself. In such case, railway render appropriate assistance to relatives for performing last rites.

- k) Exhibition of lists of dead and injured :
- (i) A complete list of the dead and injured must be exhibited at a conspicuous place at the site of accident, and if the accident has taken place between two stations, this list must be exhibited at both the adjacent stations. In addition, lists must also be exhibited at important station(s)/helpline booths; on each direction for suitable information of relatives and public. A list of such passengers should be available with commercial controller.
 - (ii) Responsible officials must be deputed at the station/helping booths where such list are exhibited to attend to all inquiries made by relatives and public, and to collect further information of the dead and injured where necessary.
 - (iii) In case of persons killed who have not been identified, their bodies should be serially numbered by means of small legible number inscribed on placard which should be placed at the head of

each body and the bodies with their numbers should be photographed before they are disposed off.

- (iv) In case of unidentified dead bodies, a complete description including approximate age, sex, complex etc. must be noted as also the description of clothing, jewellery and any other marks of scars on the body that may assist later in identification.

6.10. Relief to the victims, Passengers and their relatives :

Injured passengers and their relatives are to be treated with utmost courtesy, concern and sympathy to alleviate their trauma and discomfort. In case of loss of human life or injuries to person(s), broadly, relief arrangements constitute the following.—

- a) **Opening of Helpline enquiry booths :** To provide information regarding injured and dead; diversion, cancellation and short termination of trains, helpline enquiry booths shall be opened by commercial department at originating, terminating, junction stations, Divisional headquarters, Zonal headquarters, etc. These shall be manned round the clock by staff having knowledge in English, Hindi, Regional language, etc. who shall get the updated information from Divisional/Zonal Emergency Cell. They pass on information to the relatives of passengers about the location of passenger, condition of passenger, hospital details in which passenger is admitted, etc. Telephone Numbers of Help line booths in East Coast Railway is given at Appendix-15.

b) Supply of refreshments, food and beverages to the passengers and staff at the site of accident –

- (i) Refreshment, food and beverages may be supplied free of charges to the affected passengers in an accident, either they are injured, uninjured or stranded at the site of accident or at stations where they are shifted for further action. These may be arranged from the Railway and/or outside sources as necessary.
- (ii) The Senior Divisional Commercial Manager or in his absence the Divisional /Assistant Commercial Manager will be responsible to take all necessary action from any source for the purpose mentioned in para (i) above. The Station catering officials/ Vendors should be called for assistance whenever required.
- (iii) Supply of free refreshments, food and beverages to the injured/uninjured passengers of the affected train should be made at a reasonable scale.
- (iv) The Seniormost Officer at site shall have the powers to arrange conveyance for the affected passengers free of charge by any available mode of transport and also to incur expenditure if necessary for supplying free food to the injured & uninjured passengers and for carriage of passengers luggage etc.
- (v) Proper account should be kept of the expenditure incurred duly supported by the vouchers to enable post-audit of the same after the event is over. A statement of the expenditure incurred should be signed and put up by the authorised officer to the Divisional Railway Manager within

a period of one month after the accident for his sanction duly post-audited with reference to the funds provided for on this account as also the supporting vouchers for the expenditure incurred. In case any specific area where glaring instance of excess expenditure in comparison to the event is observed, it should be specifically brought to the notice of Divisional Railway Manager so that corrective action for non-recurrence of such a situation in future, is taken. The General Manager will lay down, in consultation with the FA & CAO, from time to time, the overall limits for the purpose of sanctioning of expenditure, beyond which specific sanction of the General Manager with finance concurrence may have to be obtained for regularising the expenditure after the event in such cases. The post-audit report should incorporate the various aspects of item-wise report and observations of Sr. DFM/DFM and clarification of the authorised officer for sanction by the competent authority. The check note of the Sr. DFM/DFM should indicate the extent of check that was possible with reference to vouchers submitted.

- (vi) Free food will also be supplied to the staff, including officers, engaged in restoration operation at the site of accident and under the supervision of a responsible official. Where free food is supplied, payment of diet allowance is not permissible. However, no special arrangements will be made for officers separately nor will cash reimbursement in lieu of free food be permissible. Proper account should also be kept by the official arranging food and put up to the competent

authority for post-facto sanction. Other necessary facilities required for the staff engaged in restoration may be extended to them for smooth operation of restoration work.

- (vii) Break down allowance shall be payable to the staff attending brakedown duties as per rates revised from time to time.

c) Despatch of free messages, in case of serious accidents.—

Message to the close relatives conveying the news of safety of those travelling by a train involved in a serious accident should be despatched free of cost. However, the circumstances under which such message should be sent free of cost would depend on the merits of the case. The senior-most officer-in-charge of the local arrangement should decide and approve in each case when this facility is to be granted. This message should be issued by most expeditious means of communication to the contact person, the address of which may be found with the injured or dead or from any other source. Other instructions in this regard are issued from time to time.

d) Payment of Ex-gratia/Compensation :

- (1) (a) In the event of a train accident resulting in the death of a passenger travelling by the train, compensation should be paid irrespective of whether bonafide authority to travel has been produced or not.
- (b) The amount of ex-gratia relief payment to the dependents of dead or injured passengers involved in train accidents or untoward incidents as defined under sections 124 and 124A should be as under —

- (i) In case of death - Rs. 15000/-
- (ii) In case of grievous injuries-
- upto 30 days of hospitalization-Rs. 5000/-
 - upto further 6 months of hospitalization - Rs.1000/- per week or part there of the period of indoor treatment.
 - up to further 6 months of hospitalization - Rs. 500/- per week or part there of the period of indoor treatment.
- (iii) In case of simple injuries - Rs. 500/-
- (c) The maximum period for which ex-gratia payment is payable to the grievous injured will be 13 months.
- (d) The period of treatment as indoor patient for more than 30 days would need to be certified by a railway doctor for the purpose of ex-gratia payment. In case the injured is taking treatment other than Railway Hospital, the treatment has to be certified by a railway doctor.
- (2) No ex-gratia payment would be admissible to the trespassers, persons electrocuted by OHE and road users at unmanned level crossings.
- (3) The amount of ex-gratia admissible to road users who meet with an accident due to Railway's Prima facie, liability, at manned level crossings, would be as follows :—
- (i) In case of death - Rs. 6000/-
 - (ii) Grievous injuries - Rs. 2500/-
 - (iii) Simple injuries - Nil.

- (4) Ex-gratia payments should also be made to railway servants killed or injured while on duty by a moving train, for example working on track and run over accidentally by a moving train.
- (5) Payments should be sanctioned/arranged preferably on the spot by a senior scale or Higher Officer nominated by the General Manager after making such enquiries as can be reasonably made on the spot after the immediate need by way of medical attendance etc to injured persons are attended to.
- (6) These ex-gratia payments except, in the case of road-users at manned level crossings, are not to be taken into account at the time of disposal of the formal claims for compensation.
- (7) In order to ensure that the payment is made to the actual person involved in the accident, the officer making the ex-gratia payment should record all evidence in writing after satisfying himself as also regarding the bonafide kith and kins of the injured/dead in the cases the payment is required to be made to them.
- (8) Sr. DCM/DCM shall keep coordination with Sr. DMO for the purpose and arrange payment of ex-gratia every week at the doorstep of injured person.

NOTE :- Those walking along the track and whose presence on railway premises is not connected with the business of the Railway are to be treated as trespassers.

e) Accommodation to the relatives of the deceased.—

As an additional relief measures to the persons involved in train accidents and to their relatives, who arrive at the site of

accident/hospitals, the relatives of the deceased may be allowed to use the waiting rooms and/or retiring rooms free of charge if considered necessary, without detriment to the convenience of other passengers.

f) Issue of complimentary passes to the victims of the railway accidents.—

Complimentary passes may be issued to the next of kin of victims who are discharged from the hospital as also to the surviving victims as per the instructions issued from time to time. However, while issuing such passes, sufficient safeguard may be adopted so that these passes are not misused.

g) Running of special trains for victims/Passengers/Relatives :

Special passenger trains for carrying relatives to the site of accident shall be run from originating and destination stations having same stoppages as that of ill fated train for picking up relatives enroute. This shall be coordinated by Zonal Emergency Cell and Board. A special train either with unaffected coaches of the illfated train or another rake shall be run up to the destination to carry uninjured/first aid given passengers.

h) Assistance to be rendered to the relatives/next of kin of dead passengers :

Correct information regarding place/hospital where dead bodies are kept should be given. If available, photography / Videography of dead bodies may be shown for identification. After satisfying that the dead body is related to them, they shall be handed over to them after obtaining medical death certificate from railway doctor and post mortem report from a govt. doctor.

They shall be given ex-gratia payment and forms for lodging claim for compensation through RCTs. They shall also be arranged for their return journey back to their native place.

i) Relief to the minor children left as orphans.—

In case parents are killed in the accident and minor children travelling with their parents are left as orphans and no relatives come forward to take charge of the children, relief to such orphans may be arranged as per the extant rules.

6.11 Advice to other passengers and/or consignors regarding accident.—

- a) Whenever it is known that there will be difficulty in getting passengers, mails, parcels, luggages or goods traffic through on any part of the line owing to any accidents, etc. though a notice for stopping through booking may not have been received, the Station superintendents / Station Masters shall arrange to give information of the fact to the passengers and/or consignors who may take a decision in regard to their journey and/or booking of parcels, luggages and goods.
- (b) In case passengers already booked and wish to return or cancel the ticket for abnormally delayed on account of an accident, the Station Superintendents / Station Masters or Commercial staff as the case may be should take all necessary action promptly in regard to refund of fare or endorsement on the tickets as per rules.

6.12. Transhipment Arrangements.—

- a) In the event of an accident, when it becomes obvious that the line will remain suspended for a longer period,

the transhipment of passengers, etc., from one train to the other may be commenced with the least possible delay. When the transhipment is considered necessary, the Senior Divisional Operations Manager will arrange to issue all concerned message for necessary arrangements.

- (b) The Senior Divisional Commercial Manager or in his absence, the Divisional / Assistant Commercial Manager of the Division will be in charge of the transhipment of passengers, their luggages, mails and parcels, etc. The guard of the train will be responsible to ensure that the parcels are transhipped correctly. In case of emergency, the Commercial Inspector of the section may take charge of the transhipment work till the arrival of the Commercial Manager as mentioned above.

Passengers and luggages should be sent by the nearest available route when transhipment is not feasible or not considered necessary.

- (c) Transhipment of Postal mails : The person in charge of the transhipment work must give a special attention in the transhipment of postal mails. It should be ensured that during the transhipment, the mails are accompanied by the sorter/person in charge of the postal mails.
- (d) Transhipment of Travelling Cash Safe : In the event of an accident, when transhipment of Travelling Cash Safe is considered necessary, the person-in-charge of the transhipment work must take a special care in regard to its proper arrangement for transhipment and protection in co-ordination with Security Department. However, cash safes usually sent by the route interrupted, will be despatched normally by alternative routes. The person

in charge of the work should issue all concerned message in this regard.

6.13. Maintenance of Accident log book —

- (a) Accident log must be maintained in the Divisional Control Office/Emergency office of the division by CHC/ Dy.CHC on special duty and in the Central Control/Emergency Office at Chandrasekharpur, Bhubaneswar by CHC/Dy.CHC on shift duty in which record must be kept in chronological order of all information and action taken in connection with the accident. Overwritings and correction should be avoided while recording entries. The log must include the following:—
- (1) In Divisional Control Office/Emergency Office—
 - (i) Date and time the control was informed of the accident.
 - (ii) Location at which the accident occurred.
 - (iii) Short description of the accident and detailed particulars of the train(s).
 - (iv) Particulars of the assistance called for.
 - (v) Time of sounding hooter and information given to all concerned officials.
 - (vi) Time of medical relief equipment ordered, left for site of accident, reason for late start from base station, enroute detention, arrival at site, etc.
 - (vii) Time relief train was ordered, left for site of accident, reason for late start from base station, enroute detention, arrival at site, etc.

- (viii) Officials accompanied ART/ARME or by road and time of arrival at site.

NOTE : In regard to items (vi) and (vii), if relief trains arrived from different stations, particulars of all such trains must be maintained separately with locomotive and composition.

- (ix) Details of the accident, such as number and details of persons killed, and of those sustained grievous, simple and trivial injury, number of vehicles derailed, capsized, details of damages, probable suspension of traffic, prima facie cause of accident, approximate cost of damage, etc.
- (x) Senior most officer at site is only authorised to communicate the prima-facie cause of accident.
- (xi) Complete record of all important telephonic conversations with the officials concerned in connection with the accident as also with the officials at the site.
- (xii) Complete record of all instructions issued or received in connection with the accident.
- (xiii) Progress of rescue services and relief operation.
- (xiv) Number and description of passenger carrying trains affected indicating their detention, diversion and cancellation, as also total number of other trains affected.
- (xv) Date and time, obstruction was cleared, coach/wagon wise,

- (xvi) How the damaged vehicles were disposed of,
 - (xvii) Date and time the track was made over for running of traffic,
 - (xviii) Date and time of normal working resumed,
 - (xix) Time and number of first train allowed to pass after resumption of normal working,
 - (xx) Detailed reasons if first commercial train does not move within 30 minutes from resumption of normal working.
 - (xxi) Any other item if necessary.
- (2) In Central Control / Emergency Office at Chandrasekharpur, Bhubaneswar —
- (i) Date and time the control was informed of the accident.
 - (ii) Location at which the accident occurred,
 - (iii) Details of the accident, such as nature of accident with its location, number of vehicles derailed/capsized, number of persons killed and of those sustained grievous, simple or trivial injury, details of damages, probable suspension of traffic, prime facie cause of accident, approximate cost of damage, etc.
 - (iv) Information given to all concerned officials,
 - (v) Details of the assistance called for,
 - (vi) Time medical relief equipment was ordered and arrived at the site of accident,
 - (vii) Time relief train was ordered and arrived at the site of accident.

- (viii) Complete record of all information received and instructions issued,
 - (ix) Progress of rescue services and relief operation,
 - (x) Number and description of passenger carrying trains affected indicating their detention, diversion and cancellation, as also total number of other trains affected.
 - (xi) Date and time, obstruction was cleared, track made over for running of traffic and normal working resumed.
 - (xii) Detailed reasons if first commercial train does not move within 30 minutes from resumption of normal working.
 - (xiii) Any other item if necessary.
- (b) Log shall also be maintained at the site of accident by nominated safety counsellor of Sr. DSO. He will note down all the events in chronological order at the site and transmit to control/emergency cell of the division.
- (c) The Chief Controller/Emergency officer will be responsible to ensure that the log registers are maintained in the control/emergency offices as mentioned above. Similarly, Sr. DSO/DSO at the site of accident will be responsible to ensure maintenance of log registers at site till normal working is resumed.
- 6.14 Analysing cause of accident at site :**
- i) **Preservation of clues :** (a) Officer or senior subordinate of any department who may happen to be present at

the time of an accident or who first arrives at the scene of an accident shall, irrespective of whether he is on or off duty, record the statements of the staff concerned and take whatever steps may be necessary to record or preserve evidence which subsequently might not be available. All clues shall be preserved with a view to enable reconstruction of the scene at a later date. This is essential even though the civil and police officials who have inspected the scene of the accident and photographs may have been taken. For this purpose, the concerned official shall specially take steps to note the condition and exact position of - (i) Vehicles, (ii) Track, (iii) points, (iv) signals, (v) levers operating the points and signals, (vi) Breakage of axle, spring, locking bolt and cotter etc., (vii) Any obstruction, (viii) Any tampering, (ix) Engine and its speed recorder, etc. This should be done before commencement of actual restoration operation.

- (b) A complete rough dimensioned sketch of the accident showing the position of vehicles and their condition, permanent way including any detached damaged components, should be made out by the Engineering official and signed by the concerned Sr.Sub-ordinates jointly along with joint note. In case of any signal or level crossing at the site of the accident, a detail position of the same should also be indicated in the sketch.
- (c) In case of sabotage and suspected sabotage, every possible action shall be taken to ensure that any finger prints or foot prints observed at the site of accident are not obliterated. Action shall also be taken to note and preserve the foot prints and finger prints carefully for further necessary action.

- (d) Statements of responsible passengers or eyewitnesses with their names and addresses who may have witnessed the scene of accident should be recorded which may have a bearing on the cause of the accident afterwards when an officer bringing out any noteworthy points. These statements should be signed jointly by the passenger/ eye-witness, Railway Official and Civil or Police authority.
- (e) The Railway Official/Supervisors who may happen to be present at site at the time of accident or who arrives first at the site of accident, shall also scrutinise, the train register/Logbook, Station Diary, Private number book, Caution Order, etc. and initial them with date and time indicating the irregularities noticed. In case these records are connected with the cause of the accident, immediate action must be taken to seize the relevant records and seal. In case where defects of any instrument or/and interlocking gear may have caused or contributed to an accident, the instrument or/and the interlocking gear concerned shall be sealed and not be opened/used except on the authority of the Divisional Railway Manager or his duly authorised representative.
- (f) In case of serious accident with loss of human life or grievous hurt, the restoration work should normally be limited to the removal of dead bodies and injured persons from the debris, if any, and wherever possible communication may be restored by laying a diversion, if it is expected that the Commissioner of Railway Safety may have the benefit of personal examination of the site of accident undisturbed. In case, circumstances compel the removal of debris in part or whole before arrival of the Commissioner of Railway Safety at site, complete and detailed notes should be

recorded by the senior most officer present/Sr.DSO after witnessing by the officers of department concerned. The notes should be given to the Commissioner of Railway Safety on arrival. All sleeper, rails, vehicles in part or whole and other fittings removed from the site under the emergent circumstances should be carefully preserved for inspection by the Commissioner of Railway Safety. In such cases, telephonic permission of CRS should be obtained to start the restoration work.

- (g) Whenever possible, photographs of the wreckage shall be taken, which may afford the clue to the cause of the accident. For this purpose, the procedure laid down in para (iii) below should be followed.
- (h) In all cases of derailments, the marks on the wheels of engine and/or vehicles and marks on the permanent way (rails, sleepers, fish plates etc.) in respect of the wheels mounting on and dropping from the rails, the wheels riding on the ballast, etc. shall be specially looked for and recorded. The position of rails, sleepers, fish plates, fish bolts, nuts, etc. which bear marks as a result of the accident, especially between the points of mount and drop shall be marked and numbered serially with chalk or paint and carefully preserved. Defects and damages to rolling stock shall be examined in details and recorded immediately after the accident as also the details of the loads i.e. weight, contents, evenly or unevenly loaded etc.
- (i) Any engine, vehicle or other material involved in an accident which is likely to be required for exhibition

before any higher official or enquiry committee must be set apart and must on no account be utilised for the purpose of working of the Railway, till it is examined by the said official. In case of train parting due to breakage of rolling stock draw gear, the broken material shall be kept under the custody of station master for joint inspection.

- (j) Speed recorded in the locomotive should be examined including its chart. The same may be seized with the signature of the Loco Pilot at the reverse side of the chart.
- (k) In case of serious fire accident in train, after the fire is put out, the affected coaches/wagons or the portion of the Railway property which caught fire should be preserved carefully for inspection by Forensic Scientist. The Railway Officials/Supervisors who may happen to be present at the time of accident or who arrive first at the site of accident shall see that the fire is completely put out and nothing which can lead to provide evidence for the cause of fire including affected coaches/ wagons is disturbed. However, the Coaches/ Wagons may be drawn out from the site cautiously, if position permits in order to clear the obstructed section and be kept on the siding nearest to the accident spot with the permission of competent authority.
- (l) One photographer with Camera and necessary equipments should form integral part of the group of staff who accompany the ARME and ART in case of an accident on short notice. All possible action should be taken for preservation of the clues in order to enable reconstructing of scene of accident with reliability.

ii) Examination of Permanent Way, Loco, Rolling Stock before restoration :

- (a) For the purpose of ascertaining the actual cause of the accident, it is necessary to examine and take readings of track and rolling stock. Measurement and reading chart is given at Appendix -2. The detail examination notes should be precisely worded specifying all the various features which come to notice. In addition to what have been indicated in Appendix-2, a special note should also be prepared on the following points :—
- (i) wheel marks on sleepers, rails and other fittings, distance between the corresponding marks :
 - (ii) damage to rails, sleepers and other fittings;
 - (iii) the place(s) where loose fitting or parts of damaged fittings were found;
 - (iv) whether coach screws or spikes were found missing, if so, from where and what was the condition of holes on the sleeper(s) from which these fittings are missing.
 - (v) condition of each sleeper involved in the accident;
 - (vi) whether the fish bolts of the displaced rail show any mark of violence ;
 - (vii) whether any fish plate has been found broken or bent;
 - (viii) the curvature of every rail involved, in serial order;

- (ix) whether the rail ends at the displaced joint(s) had any dent or bury and if so whether the bury is vertical or horizontal;
 - (x) the position of wheels of vehicles in relation to the displaced rail, indicating the original alignment of the displaced rail;
 - (xi) examination of track in rear of the site of accident for atleast 800 metres indicating the wheel marks, grazing marks on the side of the rail etc., and streaks on the rail table;
 - (xii) whether any kind of obstructions found placed on the track or/and adjacent to the track, if so, the kind of obstruction and its present position etc;
 - (xiii) condition of engine in details and an inventory of the contents of engine tool box;
- (b) (i) A detailed examination of the engine(s) and coach(es) or wagon(s) involved in accident must be done jointly on the spot or when they have been drawn to a suitable location by Sr. Sub-ordinates/ Officers. In case any defect noticed such engine(s) and coach(s) or wagon(s) should be carefully preserved for examination by enquiry committee/ CRS.
- (ii) The necessary vacuum or air brake test to ascertain the correctness of vacuum or air brake fittings should, however, be made just after the stock has been drawn to a suitable nearest station.

(c) While preparing the joint examination note, a particular comment should be made with regard to damages or/and deficiencies which are likely to cause of the accident as to whether such a damage or deficiency appeared to be fresh or old.

(d) Preparation of sketches -

Rough sketches should be drawn on the spot showing all the measurements, damages and deficiencies etc. The sketches should be signed jointly by the officials as mentioned in sub-para (b) above.

iii) Photography and Videography :

Video and Photography have an important role in finding the facts of the accident. On receipt of serious accident message, Sr.DSO will arrange for videography and photography of all essential features viz., position and condition of track, loco, rolling stock, etc., along with clues which in future helps in arriving decision to know the cause of accident. Video of essential features of relief and restoration should also be covered in order to produce the same before enquiry committee, if required. Still photography should also be undertaken extensively for its obvious advantages. The photographs should be taken from a vantage point and from as many angles as possible so as to give a bird's eye view.

In addition to this, same arrangement may also be made from Chief Safety Officer. While taking video and photography, it should be ensured that the date and time of the scenes must come on video/photos.

These should be secured as part of evidence and provided at any time before enquiry committee. Such photography and videography shall clearly indicate :

- a) Severity of the accident
- b) Illustrate the damage to P.Way, Rolling Stock, Signal, OHE and other structures and equipment.
- c) Victims, dead and unidentified bodies for identification.
- d) It should be ensured that video or photography of a serious accident are prepared not by taking clippings here and there but in a continuous manner by specifically showing the position of coaches, track and the clues. These should be produced before inquiry committee without editing.

6.15 Preparation of Joint Note by Sr.Subordinates :

- a) In all cases of accidents, "Joint Note" of Sr. Subordinates should be prepared at the site before restoration work is started.
- b) The only and first document which is prepared at the site of accident is "Joint Note" signed by concern department supervisors. Since it is prepared at the site itself with clues and sketches, it is more authentic and should be taken into consideration in further inquiries, if any.
- c) Generally concerned sectional Senior Subordinates of the Operating, Civil Engineering, Mechanical, Signal and Telecommunication and Electrical Departments, etc. as the case may be shall sign "joint note" with the relevant particulars. Statements of concerned staff should be taken on spot. Preparation of Joint Note should be co-ordinated by Sectional DTI and submit to Sr. DSO within 24 hours from the time of accident.

- d) On arrival at the site of accident, the Senior Subordinates after detailed examination of the site record and/or preserve the evidence which subsequently might not be available, shall mention in the "joint note" along with sketch and readings as soon as possible indicating the prima facie cause, so as to commence the restoration operation. If any of these officials do not agree to the cause of the accident, he may furnish his remarks thereof in the joint note. The Sr. DSO/officer incharge at the site should ensure preparation of Joint Note before starting restoration work.
- e) Officers should not interfere in preparation of joint note and sr. subordinates should not ask permission, take consent or consult their officers before signing the joint note. Actual facts should be mentioned in the note.
- f) It should be ensured that Sr. Subordinates deputed to prepare the joint note are specially nominated and sufficient time should be given for this purpose. They should not be disturbed or assigned any other duty till they complete this work.
- g) Sr. DSO/DSO should scrutinise the joint note and ensure that the joint note is complete in all respects. Concerned Sr. Subordinate shall not be relieved unless preparation of joint note is completed.

6.16. Police attendance —

- (a) When any accident of any description usually attended with loss of human life or with grievous hurt as defined in Indian Penal Code or accident to a passenger carrying train or sabotage or train wrecking or attempted train wrecking or cases of running over obstruction on line or passenger falling-out of train or fire in train or accident

- with serious damage to Railway property of the value exceeding Rs. 2 Crores or in the cases of landslides or of breaches by rain or flood, which cause the interruption of any important through line of communication for at least 24 hours, the District Superintendent of Police of the District in which the accident has occurred or such other Magistrate or police officer as may be appointed in this behalf by the State Government concerned. The Superintendent of Railway Police, the officer-in-charge of the police station within local limits, the officer-in-charge of the Government Railway Police and the Officer-in-charge or the Railway Protection Force must be intimated by telephone or through special messenger or such other quick means as may be available, with the details of the accident.
- (b) Attendance of police and/or civil officials at the scene of the accident must be made as soon as possible in the cases as mentioned in sub-para (a) above in order to observe the disturbance if any, there has been on the line, other evidence as to the cause of the accident and to keep guard over any loose materials which may be lying about as also to safeguard the passengers luggage and mails etc. if any.
- (c) In case of Railway accidents, permission of the State Government or clearance of the Police is not required for launching rescue operations for the purpose of saving human lives which inter alia may also involve handling/ shifting the rolling stock (locomotives, wagons and coaches) for extricating the trapped passengers. However, police clearance is required for restoration works at the site of accident, if sabotage is suspected.

6.17 Restoration :**a) Assistance from adjoining Divisions/Railways :**

DRM or Officials of Mechanical and Engineering Department should make an immediate assessment of requirement of men and material for restoration. Accordingly, make arrangements to move their own resources and inform to Divisional Emergency Cell regarding additional assistance if any, from adjoining railways.

- i) Requirement should be given to Central Emergency Cell at Zonal HQ.
- ii) For this purpose, the Deputy Chief Controller on duty in the Divisional Control Office of the Division on which the accident has occurred will issue an immediate control message to the adjoining Division(s) concerned. The Divisional Officers concerned of both the Divisions shall ensure that all necessary actions are taken in arrangement of assistance.
- iii) In case of an accident occurs on a Railway and at a place nearer to a junction point of other Railway, the nearest Railway should invariably despatch its own Relief Train, Medical Relief Van, etc. to the site of accident. Similar assistance should also be arranged from other division/railway whenever additional assistance is required considering the seriousness and location of the accident.

b) Movement of Tower Wagon :

If the Tower wagon or wiring train or traction motor trolley is required to be sent to the site of accident, the Section

Controller, on request from Traction Power Controller or SSE/ SE(OHE) shall arrange for quick passage of the same. This will have preference like a Relief Train. Similar preference should also be given for the material train in an emergent requirement of labour and / or material at the site of accident.

c) Handling wrecks involving wagons/oil tanks, etc. :

- (i) Action in any particular case will depend upon the existing conditions and good judgement will be necessary to avoid disastrous fires on one hand and useless sacrifice of valuable property on other.
- (ii) When any oil Tank(s) /wagon(s) etc. are found leaking, all lamps or fires near them that can possibly be dispensed with should be extinguished or removed. Incandescent electric lights or portable electric flash lights should be used. Lamps necessarily used for signalling purpose should be kept faraway of such tanks/ wagons. Such tanks/ wagons should not be approached with any kind of fire including pipes or cigarettes, etc., nor any fire be ignited nearby. Blowing of wind towards the ash-pan and firebox of a locomotive is also a source of danger. Whenever practicable, the work of handling of wrecked oil tank/wagon etc. should be done during day light.
- (iii) During relief operation to prevent explosion of loaded tank wagons, the manholes should be opened, where safety valves are not provided.
- (iv) Effort should be made to prevent the spread of oil over a large surface by collecting it in vessels or

draining it into a hole or depression at a safe distance from the track, when necessary trenches should be dug for this purpose.

It is not safe to drain inflammable oil in large quantity into a sewer since vapours may thus be carried to distant points and there ignited. Care should be exercised not to permit of oil to drain into streams of water which may be used by irrigation plants or for watering stock. Dry earth spread over spilled oil will decrease the rate of evaporation and the danger. A stream of oil on the ground should be covered with dry earth thrown on the liquid as it collects.

- (v) Sudden jerks that might produce sparks or friction should be avoided. When possible the wrecked oil tanks/wagons should be carefully jacked into position, after removing other vehicles and goods or parcels that might be damaged by fire. Only as a last resort to meet an emergency should wrecked oil tank/wagon etc. be moved by dragging, and when this is done, all persons should be kept at a safe distance.
- (vi) No unnecessary attempt should be made to transport a damaged oil Tank/Wagon from which inflammable liquid is leaking. If wrecked or derailed and not in a position to obstruct or endanger traffic, its leak should be stopped as far as possible and be left under guard until arrangement is made for the transfer of the liquid where practicable into another tank or vessels of sufficient capacity.

- (vii) Even a tank that is not leaking is also liable to be captured by use of slings and the slipping of chain slings may produce sparks. Saving of the contents of the tank is not as important as the prevention of fire. So a good judgement will be necessary to avoid disastrous fires.
- (viii) An empty or partially empty tank is liable to contain explosive gases, and any kind of fire must not be brought near it.

d) Clearing of line at the site of accident :

- (i) The responsibility for operation of reraiment and clearing the line of wreckage lies primarily with and the same will be conducted by the Mechanical Department, and all other departments will do their utmost to assist. In absence of a responsible Officer/Senior Subordinate of that department in an unavoidable circumstance, the operation should be conducted by the Officer / Senior Subordinate present of the Civil Engineering Deptt. or the Operating Department.
- (ii) The blocking of a railway line, even for a short period causes inconvenience to the public and / or loss to the railway. It must, therefore, be clearly understood that the resources of all departments concerned, both in men and materials, are to be made available promptly at the site of accident and utilised properly for clearing the line and restoration of normal working.

- iii) In addition to taking of all necessary precautions during the clearing operation to avoid any disaster, when re-railing any vehicle on a falling gradient, the wheels of the vehicle must be lashed and other action taken so as to prevent the vehicle from rolling down the gradient after it has been re-railed. The vehicle should remain so lashed until it is certain that the movement of the vehicle on the track can be controlled.
 - iv) When removing the damaged wagon from the track, they should be so placed taking into consideration the location as to prevent being blown over. This can be ensured by placing the wagon flat or upside down instead of on its side.
 - v) Since a large number of workmen are utilised to handle heavy machinery, etc., in connection with the rerailment and clearance of wreckage at the site of accident, the person-in-charge of the restoration operation must ensure that medical assistance with first aid and other necessary equipment are available at the site.
- e) Movement of damaged stock from site of accident :**
- (i) When it becomes necessary after an accident or due to any cause, to move damaged vehicle(s) or engine(s) which require to be specially marshalled and/ or with restricted speed, instructions in writing defining clearly the destination of the damaged stock with such special marshalling and/or

restrictions, will be issued and signed by the competent persons of the Mechanical/Electrical, Civil Engineering or other departments responsible for such movement and handover to the representative of the Traffic Department in charge of work at the site. The Mechanical/ Electrical representative as the case may be will certify the fitness of the damaged stock to run in the proposed marshalling and/or restriction. Similarly, the representative of the Civil Engineering Department will certify the fitness of the track involved if any for such movement.

- (ii) While clearing the dead engine, the marshalling instruction and other precautions should be observed.

f) Fitness Certificate for restoration of traffic :

Before restoration of traffic, Officer/Senior Subordinate concerned of the Civil Engineering, traction, Signalling Department as the case may be, give in writing that everything is clear and fit to re-open the communication to a responsible official of the Traffic Department.

g) Consideration of time of restoration :

Time of restoration or duration of interruption is defined as duration from the time of accident till starting of the first commercial train (Goods or Passenger) on line clear from adjacent station for movement over the affected line in that section.

A time frame of 30 minutes has been laid down within which the first commercial train should start on line clear from

adjacent station for movement over the affected line. Cases of movement of commercial train after 30 minutes of fitness of track/OHE shall be categorised as delay in restoration of traffic. In case, there is no commercial train available to be run on that section after track fit/OHE fit, an exception may be made at the level of COM, who shall certify that there was no commercial train to pass over the affected section within 30minutes of track fit/OHE fit.

6.18 Fitness of rolling stock before use :

All the rolling stock that have been derailed or damaged in accident must be examined thoroughly and gauged by the competent person(s) before being allowed to run again and proper certificate be issued to that effect, to the traffic official concerned. Similar action should be taken in case of any such locomotive(s).

6.19 Diversion, Short termination and cancellation of trains :

- (a) On recommendation of division, CPTM at Zonal Emergency Cell with the consultation of COM and Board, will give instructions to Divisional Emergency Cell for diversion and cancellation of passenger carrying train(s). Trains should be regulated preferably at stations where refreshment facilities and road transportation facilities are available. Advance planning should be made efficiently keeping in view of duration of restoration and availability of coaching rakes, locos and crew.
- (b) Goods traffic may be held up or diverted or cancelled at the discretion of the Senior Divisional Operations Manager

and/or Chief Freight Traffic Manager as the case may be, and traffic offering depending on the situation.

- (c) Parcel traffic may either be detained or diverted at the discretion of the Senior Divisional Operations Manager and Senior Divisional Commercial Manager taking into consideration of the situation and traffic in question and as per the directives.

6.20 Media Management :

Main object of the media management is to post the public with factual information pertaining to the accident, to convey certain information which is of use to passengers, relatives of dead and injured passengers, details of hospital where injured/dead are shifted, interruption of train services, expected time of restoration, etc. GM, DRM, CPRO and Chief Emergency Officer at Zone and Divisional Emergency Officer at Division are competent to interact or with media regarding accident. Inflated or exaggerated version of any fact, unconfirmed news having no authentic source shall not be relayed to the media. Railwaymen shall not express or voice any criticism, or express his personal opinion or views about the accident at any point of time.

Generally CPRO shall release first information of accident to the media preferably within 60 minutes of accident. This release should contain telephone numbers of helping booths opened in this railway. There should be fixed time press briefings to all channels at same time so that same version is given to all concerned. Simultaneous press briefings may be held at accident site/Zonal Emergency Cell/ Divisional Emergency Cell.