DISASTER MANAGEMENT INSTITUTE

BHOPAL

Synopsis on Field Visit of

Shree CERAMICS,

CASE CONSTRUCTION,

NHDC,

DEWAS TEKRI,

NCDC

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Field visit:- Shree Ceramics Pvt. ltd

417,prem trade centre maharani road indore

H.R. Raghuwanshi

SRM shree ceramics

Date:- 11/05/2018

Guide:- George V. Joseph

K.K. Pandey, Abhijeet shrivastav

What I learnt :

The first thing we were offered was masks. Since this was a plant for ceramic fibers long exposure to this environment could affect lungs. Eventually we got to see the furnance and the ceramic fibre blankets that were being made. We were exposed to the entire operation from material being bought in (There were some hazardous chemicals being bought which required special care in transportation.) to the finished goods and it being packed ready for delivery.

Their hospitality was very endearing which made us feel a family culture in the factory.

This company established in 2011 in 50000 sq feet area for the processing and manufacturing of heat insulators. engaged in manufacturing and supplying a broad array of Ceramic Fiber Products.

Types of products

- ceramic fibers bulk
- ceramic fibers wool
- ceramic fiber module
- ceramic fiber board
- ceramic fiber paper

- ceramic fiber square
- braided ropes of ceramic
- ceramic fiber blanket

Types of material, raw materials used for production

- silicon , zirconium
- asbestos (very few quantity) due to harmful for environment
- Al, Cu etc. metals at less percents or according to product required

Nature of products

- heat resisted or fire proof (used to make fire proof cloths, jackets, aprons, gloves etc) ,heat insulator
- cold insulators (bricks ,sheets, squares, etc)

Field visit:- Case Construction

157,sector-c industrial area phase -3 pithampura dist. Dhar M.P.

What I learnt :

I felt the company to be extremely process driven. They had excellent ways to ensure compliance and capture inefficiencies

For eg: They had a daily.weekly,monthly chart to track any accident/non compliance which was very well maintained. The same data was visible in many formats (Location wise how many incidents have happened versus Time wise how many incidents happened versus department wise numbers). It definately made it obvious to find the best way to address incompetence.

Special gear was required for entering the industry floor. The families of the workers were also kept involved in safety measures by various social activities like drawing competitions etc.

Overall it was an perfectly running ecosystem inside a chaotic India.

Products:-

- Backhoe loader
- compactor
- crawler dozers
- Graders
- Skid steer loaders

This company established in 1852 in USA for manufacturing and processing of machines and tools

Field visit:- NHDC -narmada hydro-power development corporation

Est. in 29-06-2009 with NHPC & state govt

K.M.Singh (CMO NHDC Omkareshwar dist. khandwa M.P.)

density of dam:-0.987 km3 and 196.6m depth of dam

two canals started from this dam for irrigation

no of turbine :- 8 (8*65mw)power generation or according to demand of upstream

one power line reserved for indian railways to Burhanpur -itarsi section (wcr)

one mobile control unit

types of turbine:- franshish turbine

Generator:- semi umbrella AC power generator (65 MW)

software:- SCADA central system

down stream :-connected to Narmada and Kaveri river

What I learnt :

The entire scale of operations was a massive feat of engineering. The most stricking memory of the event was the multi level construction for the dam. With water seeping down some of the cracks It was a scary visit.

The second memory is that of the original course of the river which was now dry and the entire population from that area was now gone. The construction of dams of this scale have a massive impact on the brinks of the rivers.

Field visit:- Dewash tekri:-

Devi temple in dewas M.P. situated at the hilly region of satpura vindhyachal range of m.p. There were many disaster prone things:- it is prone to land slide , rock slide due to its fossils rocks and sand, soil mixture and rainfall

stampeding may in festival session due to its narrow ways or single ways

massive fire its prone for massive fire due to its garbage and surrounding plantation

Ways of approach

Rope way ,road , stairs and other foot ways

Summary of field visit/ training program :-civil defence orientation program

Day -1 at NCDC Nagpur

After we settled down there was a brief lecture about NCDC. It also cleared a notion of not seeking a full time employment with this field.

NCDC established in 1965 after indo-china war with 56 organizations for training, quick mobilization and responds at the time of emergency . There are 4 regional headquarters

1. Delhi
2. Mumbai
3. Kolkata
4. Chennai
   established after 1968 defence act passed by Govt of india

at the concept of INDIAN CIVIL DEFENCE ACADEMY for build resilience

Need of NCDC

- Defence potential
- industrial disaster, Natural disaster
- Moral of the nation
- economic

war potential of a nation is the outmost importance

Civil Defence measures:-

- support emergency services
- law enforcement
- medical care
- public work relief
- assisting of recovery operation

Concept of Civil Defence:-

- Saving life programs

- minimizing losses
- maintaining continuity production
- Raising public morale

Changing concept of threats

CBRN (chemical, Biological, Radiological, Nuclear)

12 types of services by the NCDC in a particular disaster

Govt+ NGO's = goal achieved by civil defence

headquarter :-collector ate office of district

controller:- district collector

Formula:-

- Planning
- control
- co-ordination

Civil defence fire fighting service:-

Warden service (volunteer based) trained person

- house fire party
- Auxiliary fire service (major service)
- to extinguish small fire
- act as fire watcher during air raid
- Advice and training to community

Casualty service:-

- First aid on spot or nearest hospital
- transportation of casualties
- better medical treatment under possible guidance
- priority to life saving support

Warden service:-

to prepare resilience structure of community

Training service:-

at different levels

- National level
- state level
- District level
- community level (individual, team, combined)

Civil defence volunteer training:-

- Basic training
- full first aid
- section training

Communication services:-

- PNTS public network telephonic service
- ham amateur radio

Welfare service:-

- shelter, food, cloth, water etc.
- awareness programms
- help in evacuation , gives information etc.

Supply service:-

- to maintain supply chain at the time of disaster

Depot and transport service :-

- to maintain record of resources

Salvage service:-

- custody of salvage material (making of panchnamas with police officers)
- place guarding of damaged property
- maintenance of proper accounts
- protection against weather conditions

Corps disposal service:-

- Mars cremation
- emplace incineration

Day -2 at NCDC Nagpur
Basic life support
By:-Dr. V.P. Bedekar

Different types of lift technique for casualties

1. Former lift :-one person lifting by one
2. one man (Hummer crunch):-
3. climb back:-pick a back/lift from back when injury at back side
4. Pick a back reverse:- when injury at front side
5. Cuddle :- to lift one person by two persons two hand
6. Toe drag:- toe by rope or cloth and dreg
7. Fireman droll :-
8. Bow lice/lace :-
9. Two leg lift:-
10. Two hand seat:-
11. Three hand seat:-
12. Four hand seat :-

CPR :- cardio pulmonary resuscitation
AED:- automatic electric de-fabric
MER:- medical emergency service
LLF:- look listen feel

- *check response*
- *shout for help*
- *Tilt forehead ,chin lift open airway*
- *30 chest compression*
- *2 rescué breath*
- *rate of compression 100/min*
- *depth 4-5 cm*

Check response then repeat change CPR operator in every two minute

Different types of knots:-

- thumb knot (simple knot or basic knot)
- reef knot
- figure of eight knot
- timber hitch,(half hitch)
- clove hitch, two hand hitch
- sheet bend
- slip knot
- over hand knot

Different types of fire and extinguisher (equipments):-

Fire:- it is an chemical reaction in presence of oxygen& fuels that generate heat and waves

Triangle of fire:-

1 oxygen

2 fuel

3 heat

fire continues by the chain reaction of tetra hydrant of fuel and oxygen

Types of fire:-

there are 4 types of fire class A , B , C , D

Class A:- organics, grass , cloths, etc

Extinguisher:-

9 ltr. water , Co2 in a cattle with puncture pin ,1.47inches safety hole

with stored pressure 200 bar used duration 90 sec

Class B:- carosine , petrol, diesel,etc

Extinguisher:-

9 ltr. water , 45 ml chemical (foam generator) ,cartridge stored ,duration 2 minute

indicated by yellow line

Class C :- Gases

Extinguisher:-

CO_2 +powder

it can used at B+C fire

size:- 2 kg to 10 Kg and other heavy for trolly

indicated by :- blue line

Class D:- metallic fire like as Mg , Na etc

Extinguisher:-

10 ltr water+ 700ml chemical at 200 bar pressure with TEC (turnery ejected chloride)

Electric fire:-

Extinguisher:-

KXX extinguisher ,TEC +700 ml chemical at 200 bar pressure with shot gun types nozzle has a max height range 36 feet. It can used on live electricity for an intermittent duration of 23 second of continuous spray

Final Word

It is a shame that despite multiple warnings from Nature humans choose to ignore the sign of impending Disaster. The only species of life that can built tools for surviving a disaster is choosing to act in defiance of common sense.

I wish more people had the chance to learn and save themselves and those around them by visiting DMI and NCDC in case they find them in difficult situations.