Hospital Waste Management and Handling at SCB Medical College & Hospital Cuttack  AT A GLANCE
SCB MCH Cuttack, is the largest Tertiary Care Hospital in Eastern Odisha with Capacity of 2132 bed strength.

Bed occupancy is 100% and DAILY AVERAGE of patient attendance in OPD is approx 7000-8000 per day.

Casualty attendance is around 300 to 400 patients per day.

166 functional ICU beds.

With high patient load the Hospital Generates enormous Hospital Waste and effective handling waste is a major challenge for the Hospital Administration of the Institute.
SCB Medical College generates three categories of waste

- Municipal Solid Waste
- Bio-Medical Waste
- Construction & Demolition waste
Municipal Solid Waste | Bio-Medical Waste | Construction & Demolition
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Municipal Solid Wastes (Management & Handling) Rules, 2000 are applicable to every MUNICIPAL AUTHORITY
- Segregation
- Storage
- Transportation
- Processing
- Disposal of municipal solid waste.
The Bio-Medical Waste Management (Amendment) Rules, 2018 Responsible HOSPITAL AUTHORITY (Occupier)
- Segregation
- Collection
- Storage
- Transportation
- Disposal
Construction and Demolition Waste Management Rules 2016 Responsibility of Waste Generator (R & B, PHD & GED)
Who undertakes construction demolition of any civil construction.
The non infectious General Waste, (kitchen waste, paper) is collected and disposed by Cuttack Municipality. The outsourcing agency M/s Paritosh who is entrusted to manage General Waste is accountable to collect, lift and transport the general waste to the CMC, CTC Waste Bins positioned in front of departments of SCB MCH, Cuttack.

Total General Waste Generated = 10 tons per day
Waste is segregated at the site of generation by the persons (nursing staff, attendants, technicians, doctors etc.) as per the biomedical waste management rules, 2018 in classified color coded bags.

The collection, transportation and disposal of BMW is outsourced by MEDIAID Marketing Services Pvt.

The agency is lifting waste from 151 Generation Points.

Posters regarding segregation item wise are displayed in each area of the hospital.
Categories of Bio-Medical Waste

**YELLOW CATEGORY**
- Human Anatomical Waste
- Blood Bags
- Solid Waste
- Microbiology, Clinical & Laboratory Waste
- Solid Linen & Beddings
- Animal Anatomical Waste

**RED CATEGORY**
- Tubing
- Urine bags
- Bottles
- Syringes
- Gloves and soiled
- Vacutainers

**WHITE CATEGORY**
- Needles
- Blades
- Scalpels
- Burnt Needles
- Syringes with fixed needles

**BLUE CATEGORY**
- Broken Glass
- Contaminated Glass
- Medicine Vials
- Ampoules
- Metallic body Implants
Yellow Waste

Red Waste

Blue Waste

Colour coded bins

Cutting Needle tip

Destroying syringe nozzle
Collection of segregated waste

- Emergency OT, Labour Room - 3 times per day.
- OPDs and Laboratories - 2 times per day.
- Wards - Once or twice per day depending on waste generated.
Transportation of collected waste

- Waste collected from all over the hospital is transported to collection site in color coded waste trolleys.
- The workers transporting the waste use PPEs like boots, gloves, masks and aprons.
- The collected waste is not stored for more than 48hrs. at collection site.
Storage
At the collection/storage site, bags are weighed before transportation for final disposal. Waste collected per day from all over the hospital is approximately:

- Yellow waste: 370 kg (per day)
- Red waste: 50 kg (per day)
- Blue waste: 150 kg (per day)
- PPC: 70 kg (per day)
- An average of 19,500 kg of bio medical waste per month approximately at SCB MCH Cuttack.
Yellow waste: Yellow waste is transported to BMW Plant managed by Mediaid Marketing service for incineration. Record of the same is being maintained on daily basis.

Incinerator capacity-100kg per hour
Primary chamber-840° temp
Secondary Chamber-1050° temp
Red waste is first microwaved (3 nos) then shredded in the plant.

SCB MCH has (1 no) of shredder, with capacity of 100kg one hour and 3 nos of microwave having 100kg per hour.

The shredded waste is then transported to **Victo Plast Agency** which is authorized by SPCB.

Record of weight of plastics, sharps, gloves and glasses sent for disposal is maintained.
The Medistar 160 microwave is supplied by United Nations Industrial Development Organization (UNIDO) through SPCB is used for disinfection of Plastic infectious Waste.
**Sharp Waste**: Blue waste is first treated with sodium hypochlorite at the site of generation and then transported to BMW Plant to be disposed in the sharp pit.
WASTE MANAGEMENT COMMITTEE
AT SCB MCH CUTTACK

Medical Superintendent

Nodal officer BMW

Sanitary supervisor

Store In charge/ Matron

Professor and HOD Micro biology/ Pathology

Administrative officer/Accounts Officer/Store Medical Officer/ Hospital Manager

Nodal officer BMW of all Concerned Departments
Responsibility of the BMW Committee is to ensure the Bio-Medical Waste Management of SCB Medical College, Cuttack is handled in accordance to bio-Medical Waste Management Rule 2018.

To provide occupational safety to all healthcare worker involved in handling of Bio- Medical Waste.
SCB Medical College and Hospital, Cuttack is **Authorized** by state pollution control board vide letter no 5240 which is valid upto 31/03/2021 and also received **Operate to Consent** vide Letter no 5772 valid up to 31/03/2020.
Training programme and awareness programmes regarding Bio-Medical Waste Management is organized under the active Leadership of nodal officer BMW Assoc. Prof. Dr. Sikata Nanda (Community Medicine) for doctors, paramedical staffs, staff nurses and class IV.

Total no of staffs trained 1397 (2018-19)
200 KLD ETP constructed by PHD Department for LIQUID WASTE MANAGEMENT at SCB MCH Cuttack.
Let's the waste of the “SICK” not contaminate the lives of the healthy.