# Occupational Health & Safety Assessment: Small Factories in Dhaka, Bangladesh

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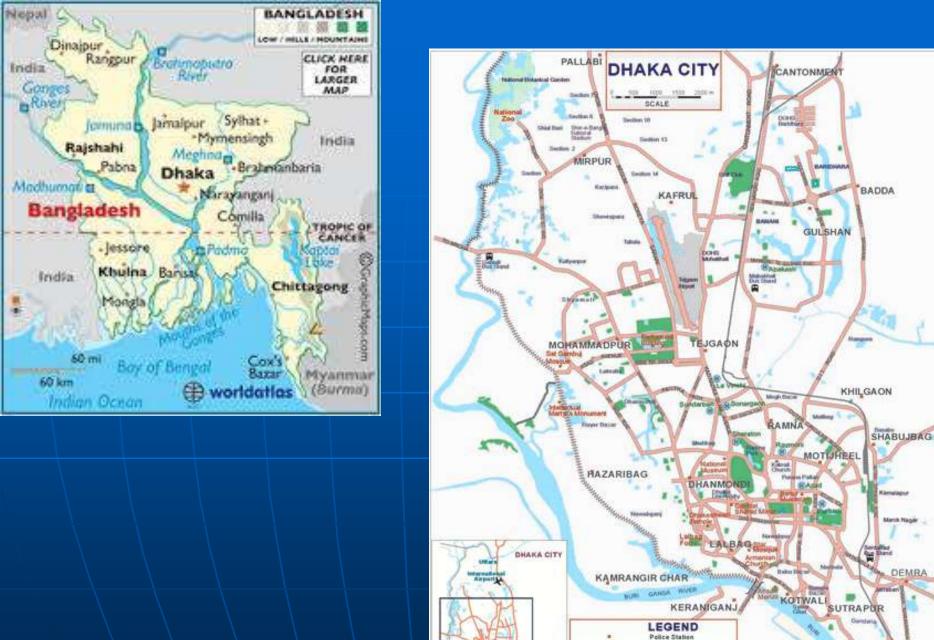
#### Overview

- Background:
  - Kamrangirchar & Hazaribad districts
  - Environmental & occupational data
- MSF mission overview
- Factory observations
- Building OH&S capacity

### Kamrangirchar Environment







DEMRA

SHYAMPUR

Important Tourist Spot Important Hotel

Embanhment

River / Lake

Metalled Road with Bridge

Winglishy by The Union Chi Second Transplan

**81172380** 

#### Hazaribad Environment





#### Dhaka "Slum" Factories



















#### OH&S Challenges

- OH&S risks not widely recognized
  - Historical public health risks
  - Growth & investment vs health risks
  - Clean water, air, food higher priority
- Kam & Haz districts "off the map"
- Lack of...
  - Infrastructure
  - Safety organizations (emerging)
  - Training, awareness
  - Available PPE

#### Building OH&S

- Government/industry/academic/NGO cooperative efforts (garments)
- Train-the-trainer OH&S efforts
- Awareness/outreach effort
  - Pictorial messages
    - Basic hygiene
    - Avoiding take-home exposures
    - First aid
  - Outreach/education of factory owners

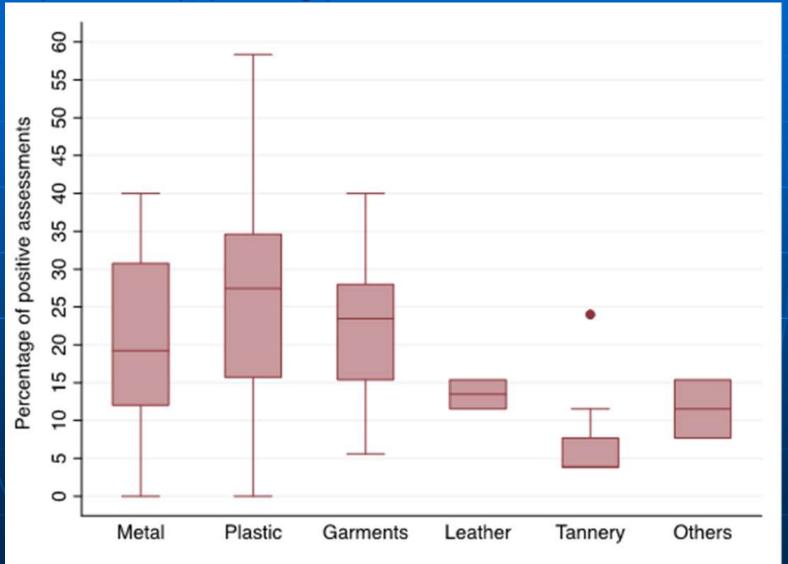
#### Next Steps

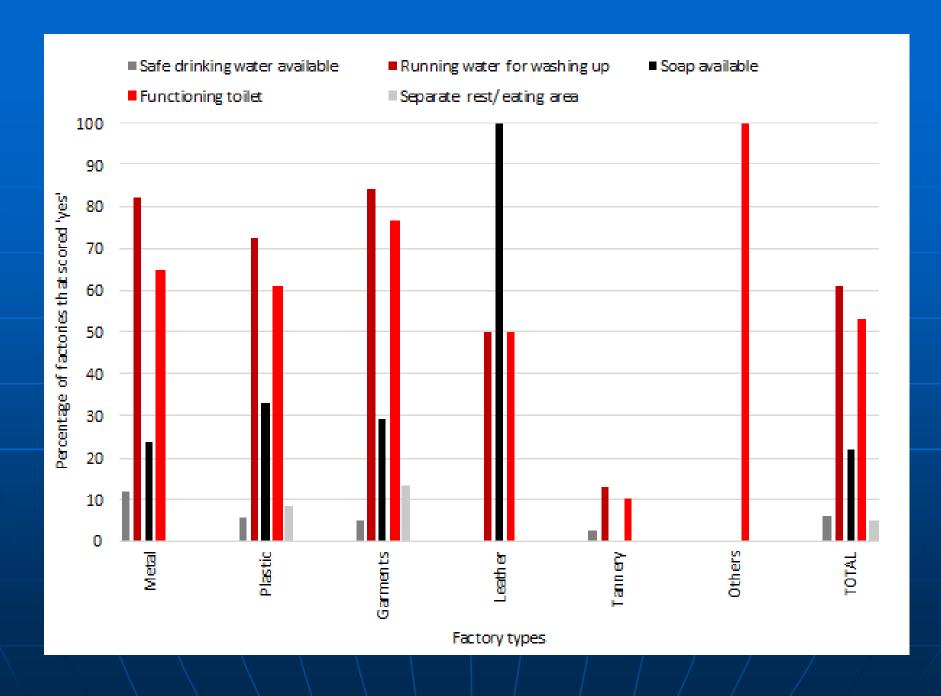
- Factory Hazard Assessments\*
  - Outreach team uses checklist
  - EHO oversight, QC, assure consistency
  - Integrate without impacting other outreach duties
- "Top 5" hazards identified
  - Significant hazard / easy remedy
  - Provide recommendations to factories
- Checklist Data Entry and Analysis\*
- Factory re-survey with same checklist

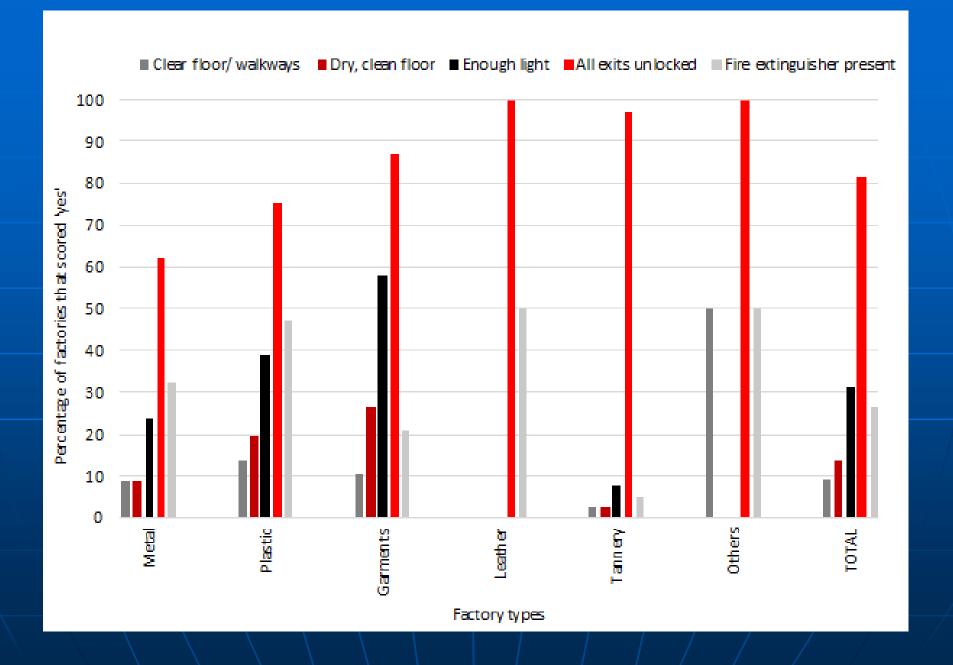
<sup>\*</sup>completed spring/summer 2017

#### Hazard Assessment Analysis\*

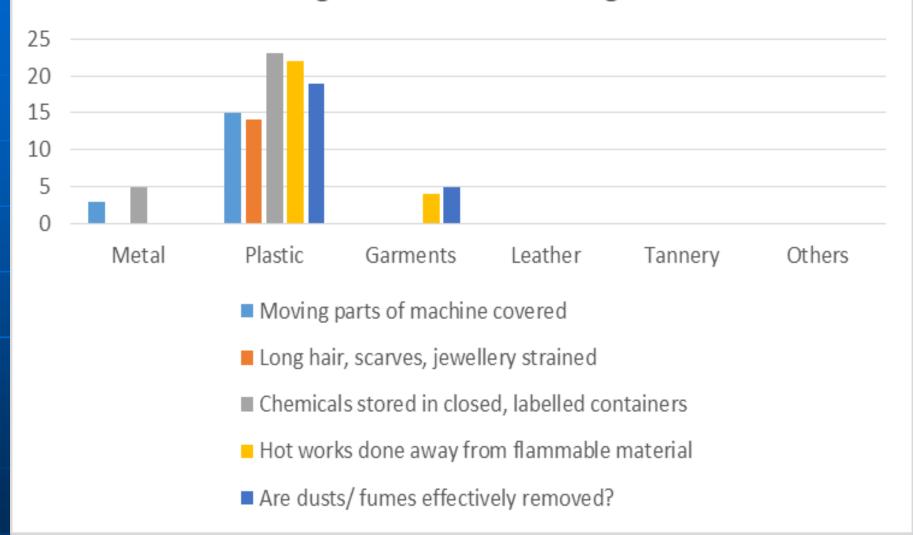
\*preliminary, pending peer review







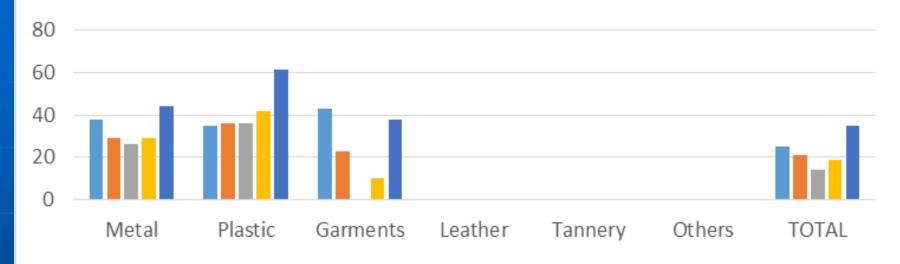
#### Percentage Factories Meeting Criteria



#### Factories Providing PPE

- No factories surveyed provided eye, hearing, or respiratory protection
- Maximum 9% provided hand (gloves), foot (boot), or body (apron) protection
- Locally available PPE limited:
  - Reusable fabric face mask
  - Cheap sun glasses

#### Ergonomic Factors in Factories



- Most tasks are performed below shoulder level
- Work does NOT require an awkward posture
- Work does NOT require holding same position for prolonged time
- NO repetitive tasks are performed
- Machinery is positioned comfortably to perform task

#### Potential Next Steps

- Pre- / Post-Intervention Pilot
  - Small number of metal / plastic fabrication factories
  - Low / no-cost interventions
    - Soap & water, toilet, eating area
    - Lighting
    - Ventilation: fans, exhaust
    - Work area: walkways, inventory, storage, organization
    - Machine positioning / safe guards
    - Administrative controls
    - PPE

#### Potential Next Steps

- Occupational exposure monitoring: sampling protocol
- Possible utility:
  - Document impact of pre-/postintervention
  - Document occupational exposures:
    - Publication
    - Advocacy
    - Partnership with government, NGOs, etc.

## Dhaka, BD

















## Bangladesh OHS Links – Selected Media Articles & Reports

- International Labor Organization; Occupational safety and health country profile –
   Bangladesh:
  - http://www.ilo.org/safework/countries/asia/bangladesh/lang--en/index.htm
- International Labor Organization webpage: "Toward a safer garment industry in Bangladesh," updated frequently:
  - http://www.ilo.org/global/about-the-ilo/activities/all/safer-garment-industry-inbangladesh/lang--en/index.htm
- ILO-IFC Better Work; SME Occupational Safety and Health Toolkit Bangladesh:
  - http://bangladesh.smetoolkit.org/south-asia/en/content/en/53241/Occupational-Healthand-Safety
- EU-OSHA, "Promoting occupational safety and health through the supply chain; Literature review (2012):
  - https://osha.europa.eu/en/publications/literature\_reviews/promoting-occupational-safetyand-health-through-the-supply-chain/view
- Business & Human Rights Resource Centre Bangladesh
  - http://business-humanrights.org/bangladesh-0
- Weekly newsletter with key articles from the Bangladesh media published by WRAP – Worldwide Responsible Accredited Production
  - http://www.wrapcompliance.org/en/home
- Maclean's magazine (2013) "What does that \$14 shirt really cost?"
  - <a href="http://www.macleans.ca/economy/business/what-does-that-14-shirt-really-cost/">http://www.macleans.ca/economy/business/what-does-that-14-shirt-really-cost/</a>
- Source: http://mhssn.igc.org/