HIEDC & IEDD Risk Management by Response Training in HMA

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the 'IMAS Training Specialists
Presentation Overview

Concept of This Presentation:

- Company background.
- HIEDC / IEDD Concept of Operations.
- Prevalence of IEDs / training issues.
- UNMAS / GICHD / IMAS industry standards for HIEDC and IEDD.
- Training requirements
- Finish with questions.
Company Overview & Training Services

Explosive Remnants Of War (ERW) & Explosive Ordnance Disposal (EOD) Training Establishment & Demining School (A Division of PCM)
Company Training & Services – Background and History

A premier provider of IMAS EOD levels 1 to 3+, ERW Risk Management, HIEDC & Search, MRE/CL, Mine Action, QMS Training Courses and National Capacity Building.

Clients include Governments, NGOs, Commercial Agencies, UN Agencies (UNMAS, UNOPS, UNDP), ICRC, NMAA’s and Individuals.

2017 - Training for over 160 individuals, Training Partner for Many Agencies, including commercials (Syria – mobile training teams).

2018 – Forecast is Training for over 300 individuals
HIEDC Video
Concept of Operations – Humanitarian IED Clearance

- HIEDC – Search and locate.

- Supporting IEDD teams to HIEDC.

- IEDD teams remote capability for disposal and reconnaissance.

- IMAS EOD level 1 to 3+ operators trained to equating levels as HIEDC and IEDD.
Concept of Operations

• Search procedures founded on IMAS processes through NTS to land release.

• HIEDC Team Leaders have the same levels of capability to deal with explosives threat as those of a TL deminer.

• Any explosive threat exceeding this - IEDD operator will step in.

• Mutually supporting operations.
In essence the only difference from HMA operations:

- Explosive threat within the CHA is different.
- Procedural change for search and clearance amended to meet explosive threat.
- HIEDC teams work in cadre with IEDD teams in permissive and non-permissive environment.
Concept of Operations

HIEDC systematic and thorough processes:

- Route Search procedures.
- Area Search (including rubble areas).
- Building Search (compounds / defensive positions).
- IED Mine belts.
- Incorporation of machines and EDD.
- Incorporation of weight droppers, ROV and UAS.
Concept of Operations - UAS

- Incorporation of UAS:
  - NTS and TS.
  - 3D mapping and modelling.
  - GPR.
  - Charge placement.
  - Investigate routes / VP / CW tracing.
  - Monitor HIEDC, IEDD operations.

Again GICHD are to take a lead on this under the IEDD umbrella and are calling on the HMA organisations for collaboration.
Incorporation of mechanical assets:

- Clearing routes.
- Rubble and vehicles within areas.
- Collapsed building clearance.
- Major risk reduction tool.
- UAS incorporated to monitor the mech assets and guide into suspect areas.
Incorporation of EDD assets:

- Not a clearance asset.
- Incorporated into Search as a QA asset.
Incorporation of ROV assets:

- Remote means for disruption, charge placement.
- Remote CW and target reconnaissance (UAS may assist with eyes in the sky).
- Mini ROV for building Search.
- Command wire tracing
Disposal capability for HIEDC:

- Blow in Place (BiP).
- Excavation and remote disruption (pulling).
- Thermite disposal.
- Tracing of trip wires and gagging.
- Improvised water bottle charges.
- Beyond this IEDD will step in.
UNMAS and GICHD

- GICHD to form a TE&P review committee to look at HIEDC and IEDD within IMAS.
- Rewrite of UNMAS Lexicon

IED Lexicon: CONSTRUCT

- IED Related Incidents
  - IED
  - Explosion
  - Find / Cache
  - Hexx
  - Fake
  - Turn-In

- Tactical Characterization
  - Trend and Pattern Analysis
  - Event signature development / Device profiling
  - Tactics, Techniques, and Procedures (TTP) development

- Technical Categorization
  - Components Common to Most Modern IEDs
    - Switch
    - Initiator
    - Main Charge
    - Power Source
    - Container
    - Enhancements (Components potentially associated with an IED)

- Tactical Design
  - Purpose of Device

- Motivation of Actor
  - Political
  - Criminal
  - Ideological

- Intent of Actor
  - Main
  - Kill
  - Destroy
  - Revenge
  - Rakes
  - Extort
  - Disrupt

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Test and Evaluation Protocol
09.30/01/2014
Version 1.0
30 October 2014

Explosive Ordnance Disposal (EOD) Competency Standards
UNMAS and GICHD

• UNMAS now ratified IEDD and SEARCH TOP.

• Rewrite of the IMAS Test and Evaluation Protocol, 09.30/01/2014 will include IED and SEARCH (separate)

Explosive Ordnance Disposal (EOD) Competency Standards:

• Concept for permissive and Non-permissive environments.

• Terminology may change!
**Hierarchy of documentation**

**NON-PERMISSIVE ENVIRONMENT (NPE)**

- UNMAS IEDD TOP SEARCH SOP
- NMAA IEDD & SEARCH SOP
- ORGANISATIONAL SOPs

**PERMISSIVE ENVIRONMENT (PE)**

- International Mine Action Standards (IMAS)
- NMAA SOPs
- ORGANISATIONAL SOPs

**MINIMUM TRAINING REQUIREMENT**

Agencies:
- Commercial – Ex military SEARCH and IEDD experienced personnel for conduct of
  - ROUTES
  - AREAS
  - BUILDINGS
  - STRIKE OPERATIONS

**COMBATENCIES**

- T E&P 09.30
- CMD / SEARCH / IEDD

**COURSES SYLLABUS**

(Training)
- HIEDC Level 1-2 (Team Member (TM))
- HIEDC level 3 (Team Leader (TL))
- IEDD No2 (Assistant)
- IEDD No1 (Operator)
IED Risk Management by Response Training in HMA

- Overview of the processes and ethos behind training management to mitigate risk. (TNA)
- Prevalence of IEDs / Training Issues. (theatre led)
- IMAS and Industry Standards and IMAS Risk Management.
- Syria – Example of ‘Actual Live’ Training to Manage the Risk.
• IEDs becoming increasingly prevalent.

• Not a new phenomenon, however the skills required to clear these devices are unique and complex and differ from conventional clearance methods.

• Huge numbers of abandoned / Active devices.

• Risks involved in clearing contaminated areas are extreme.

• Counter clearance traps incorporated to target IED / SEARCH assets.

• Need for exacting training to counter this!
Training Founded on IMAS

- IMAS, T&E protocols, IATGs, NTSGs, TNMAs, CEN Workshop Agreement for EOD - levels 1 to 3+, and a raft of publications and technical notes.
- Well proven and tested over time through QA/QC by UNMAS and the Commercial & HMA industry.
- Courses structured to follow the competency standards at their respective levels. (REWRITE by GICHD in process)
Training Founded on IMAS

- IED and HIEDC / Search procedures taken from UNMAS TOP founded on STANAG 2293 – SEARCH and adapted to meet the requirements of the HMA industry.

- Concept of Ops for HMA to search and render safe as apposed to a military ethos of locate and avoid.
Training Needs Analysis (TNA)

• A full and detailed TNA conducted in response to the client’s requirements.

• Identifying the in-country threats and risks posed by ERW and IEDs/booby traps.

• In country SOPs, EOD equipment, current operational tasking, training locations, resources, staffing and numbers to be trained was reviewed.

• Identification of those to be trained, their roles and future employment role, background and any EOD experience they may have.

• This identified all risks to be mitigated through the production and delivery of training
Course Development

- All courses are fully compliant with IMAS, in country SOPs and developed to incorporate the current equipment and resource capability of those to be trained. (train them to use what they have).

- Additional time added to course length to allow for translation time during each lesson.

- Course training material translated prior to deployment. Structured balance of theory verses practical training.
Progressive and Structured Training

• All trainees are first introduced to the fundamentals of HMA through attendance on IMAS EOD Level 1 ‘UXO Searcher’ Training/ HIEDC Awareness.

• Those showing aptitude are selected to return for further training at IMAS EOD Level 2 having gained experience on deployed operations.

• Trainees who graduate out of the IMAS EOD Level 2 training go onto attend HIEDC (team member) training.
Progressive and Structured Training

- Through OTJ and mentoring those demonstrating strong management and EOD skills are selected to attend IMAS EOD Level 3 and then HIEDC as a Team Leader.

- Stepped and tiered approach ensures all trained personnel can absorb the nuances of HMA at each IMAS Level and can gain valuable experience before attending the next level of training.

- Process also allows for periods of OJT and mentoring where staff can identify those stronger individuals for advancement.
EOD TEAM MEMBER
IMAS LEVEL 1-2 QUALIFIED

Complete a 3 week Humanitarian Improvise Explosive Disposal Clearance (HIEDC) SEARCH Team Member (STM) Training Course

SEARCH TEAM MEMBER (STM)

Minimum 6 months operational experience as a STM and completed an IMAS EOD level 3 course

Minimum 6 months operational experience as a STM

EXPERIENCED SEARCH TEAM MEMBER (STM)

Complete a 2 week Humanitarian Improvise Explosive Device Disposal (HIEDD) No2 (assistant) Training Course

*IEDD N02 (ASSISTANT) IMAS LEVEL 2

Minimum 1 years operational experience as a IEDD No2 assistant and completed IMASEOD level 3 course

PREVIOUS MILITARY TRAINING AS IEDD OPERATOR or IEDD No 2 WITH PROVEN OPERATIONAL EXPERIENCE WITHIN LAST 3 YEARS.

EXPERIENCED SEARCH TEAM LEADER (STL)

Complete a 3 week Humanitarian Improvise Explosive Clearance Disposal (HIEDC) SEARCH Team leader (STL) Training Course

Complete a 4 week Humanitarian Improvise Explosive Device Disposal (HIEDD) Operator Training Course

*IEDD OPERATOR IMAS LEVEL 3+

Note: In the 1st year of operational conduct the STL will not have had any STM training or experience due to the expediency of current operations however, this practice should cease once time allows for the process of training to be followed.
Continuous Review of in Theatre Threats

- Instructors are in date with the latest threats and the emergence of any new IED threat or changes to SOPs.
- Reviewed and changes to TTP and training incorporated for future courses.
Trainee Selection for Advancement & Course Duration

• Only those personnel who demonstrate the aptitude and performance on operations will be selected for further training.

• Courses are minimum of 3 weeks in duration. (4 weeks with translation)

• Allow for the course content to be delivered through interpreter at a pace suitable to the trainees.
Summary

- Progress needed on HIEDC / IEDD TOPs, SOPs, TTPs and IMAS standards.

- IEDD are difficult to locate and clear, through a structured system of progressive training, gaining experience and OJT / mentoring the trainee can develop their personal skills and understanding at each IMAS level as they progress through the tiers of management and responsibility, thus mitigating risk through training.

- Controlled management of training design and delivery. MAT Mondial are confident that SEARCH personnel will be successful in the mitigation and management of IED SEARCH and clearance operations.
Thank You

QUESTIONS?