OK TEDI MINING

Mineral Resources Authority

National Apex Mining Safety Council

NATIONAL MINES SAFETY WEEK 2024

VEHICLE INTERACTION

Vehicles of all shapes and sizes are a necessity in the mining industry.

Vehicle interactions (with other mobile equipment, light vehicles, pedestrians, signs and structures) are one of the most commonly reported incidents on site.

Two of the common contributing factors are:

- Fatigue Micro Sleep
- Poor vehicle inspections and maintenance.

HAZARDS

The hazards associated with operating vehicles vary depending on the size and type of the vehicle, the conditions, location and operator behaviour.

Some hazards caused by the environment may be out of the operator's control, for example slippery road conditions or bad weather.

Other hazards relate directly to the operator's actions, for example ignoring traffic signs or driving too fast for rainy conditions and having insufficient quality sleep.

Driving hazards can be categorised into 4 areas:

- Environment - Vehicle to environment
- Vehicle - Vehicle to vehicle
- People - Vehicle to Pedestrians
- Loss of control of vehicle

RISKS

The most serious risk of vehicle interaction is death. Other risks include:

- Injury to driver, passengers and/or pedestrians
- Equipment and/or load damage which can lead to failed or out of service equipment and result in increased business costs
- Production loss that can lead to financial loss.

CONTROLS

Critical controls for minimising the risks associated with vehicle interaction are shown in the Vehicle Interaction Video on the OTML Team Site Portal.

Critical controls include:

- Alert, trained and authorised drivers
- Drive to weather and road conditions
- Vehicle/Pedestrian separation
- Dedicated and clearly marked pedestrian crossings
- Speed bumps
- Speed limits and road rules
- Windrows
- Visibility flag for operational areas
- Safety systems, e.g. seatbelt, air bags, proximity alert, horn, flashing lights, reversing alarm/beeper
- Radio communication / Pos comms
- Secure loads
- Using 4WD when off-road
- Pre-start checks
- Regular maintenance of equipment and controls
- Emergency response preparedness.

Be the CONTROL not the HAZARD

1. Drive to conditions.
2. Use safety systems, such as seatbelt, mirrors, collision avoidance.
3. Follow road rules and procedures.
4. Inspect your vehicle before and after use.
5. Report all faults and damage.
6. Refer to the **Key Control Checklist (See over)** to make sure all key controls are in place BEFORE operating a vehicle.

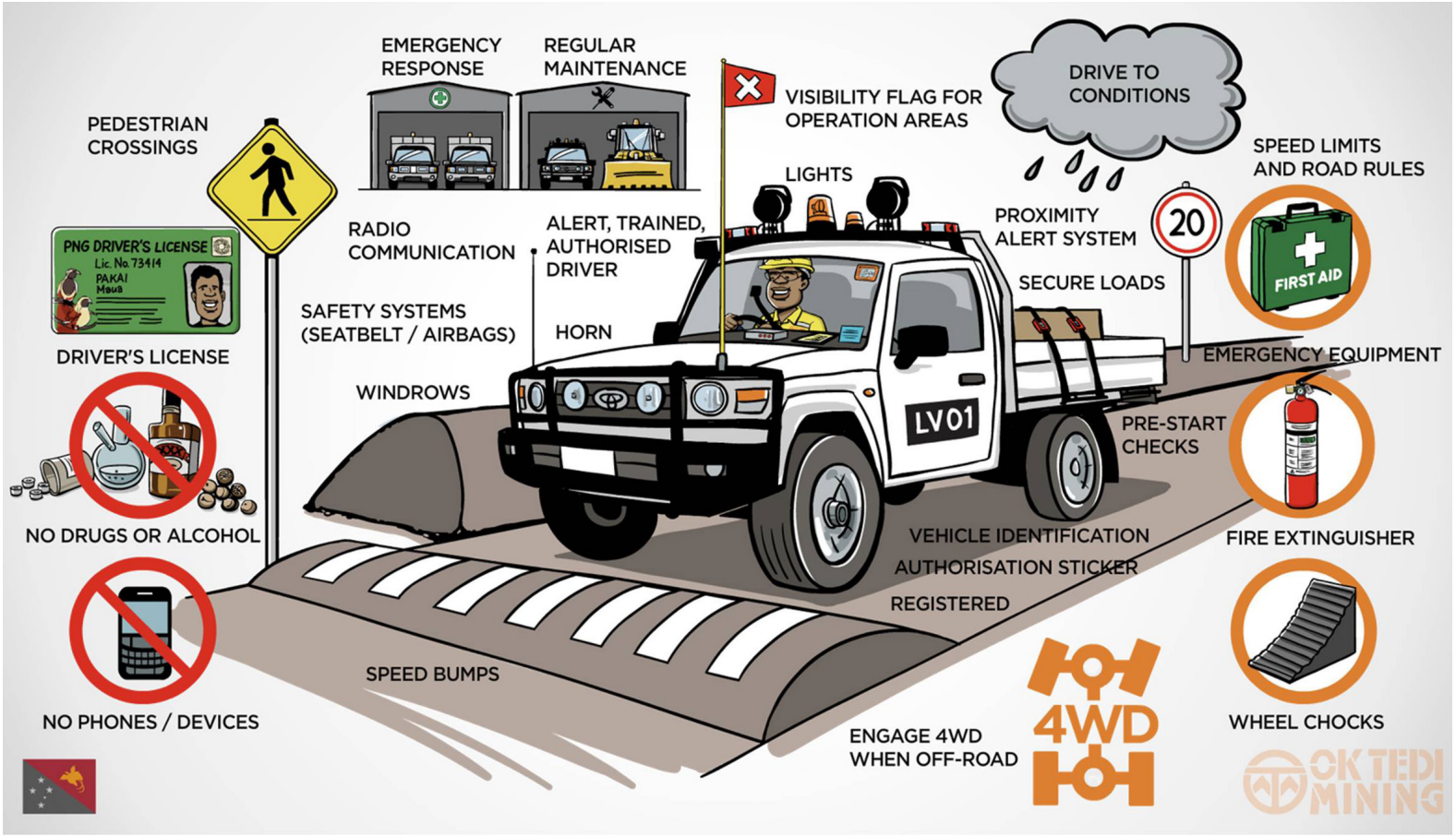
OK TEDI MINING

Mineral Resources Authority

National Apex Mining Safety Council

NATIONAL MINES SAFETY WEEK 2024

Be the CONTROL not the HAZARD!



RISKS

- Interaction with pedestrian/s
- Vehicle roll over
- Vehicle fire
- Single vehicle accident
- Multiple vehicle accident
- Unintended movement
- Risks may result in injury or fatality

KEY CONTROL CHECKLIST

- ☐ Am I fit, competent and authorised to operate the type of vehicle or mobile equipment?
- ☐ Do I have my current permit with me?
- ☐ Have I performed a pre-operational inspection (pre-start check)?
- ☐ Am I aware I cannot use a mobile phone when operating a vehicle or mobile equipment?
- ☐ Am I aware that all personnel must wear seat belt when in a moving vehicle or mobile equipment?
- ☐ Am I aware that I must use signals (e.g. sound horn) when driving in areas of restricted vision (e.g blind spots, building entries with mixed occupation etc.) or where required by site rules?
- ☐ Am I aware of the site road rules (e.g. right of way, communication protocols, speed limits and overtaking)?

OPERATOR
VEHICLE INTERACTION CONTROL CHECKLIST

OPERATOR

- ☐ Am I fit, competent and authorised to operate the type of vehicle or mobile equipment?
- ☐ Do I have my current permit with me?
- ☐ Have I performed a pre-operational inspection (pre-start check)?
- ☐ Am I aware I cannot use a mobile phone when operating a vehicle or mobile equipment?
- ☐ Am I aware that all personnel must wear seat belt when in a moving vehicle or mobile equipment?
- ☐ Am I aware that I must use signals (e.g. sound horn) when driving in areas of restricted vision (e.g blind spots, building entries with mixed occupation etc.) or where required by site rules?
- ☐ Am I aware of the site road rules (e.g. right of way, communication protocols, speed limits and overtaking)?

SUPERVISORS / SUPERINTENDENT

- ☐ Are all persons fit, competent and authorised to operate vehicle or mobile equipment?
- ☐ Have items of the vehicle or mobile equipment undergone inspection and approval prior to site use?
- ☐ Have resources been made available and work activities scheduled to manage driver fatigue?
- ☐ Are vehicles and mobile equipment fitted with the required safety devices and features?
- ☐ Have pre-operational inspections been performed on vehicle and mobile equipment?
- ☐ Have procedures been provided for high risk driving activities and are drivers/operators aware of the requirements?
- ☐ Are spotters being used to assist operators in workshops or other areas of restricted vision?
- ☐ Are exclusion zones for vehicles, mobile equipment and pedestrians defined, clearly marked and enforced?
- ☐ Are roads being regularly inspected and maintained in compliance with site requirements?
- ☐ Are windrows and berms constructed and maintained to provide protective barriers and to separate light and heavy vehicle operations?
- ☐ Is all road signage legible and installed to provide adequate operator response time prior to hazards?

MANAGERS

- ☐ Are training systems in place to ensure competencies are achieved and maintained?
- ☐ Are drivers of vehicles and mobile equipment trained and permitted in accordance with local regulations, for vehicle being driven?
- ☐ Is high risk mobile plant and equipment correctly licensed for use?
- ☐ Are vehicle driving activities resourced and scheduled to manage driver fatigue (e.g. working shift duration, job rotation etc.)?
- ☐ Are procedures in place and followed for specific high risk activities?
- ☐ Does vehicle and mobile plant and equipment undergo regular maintenance according to required schedule?
- ☐ Has a site road design and maintenance program been developed?
- ☐ Are roads being regularly inspected to maintain agreed design?
- ☐ Do road speed limits comply with the design of roads?
- ☐ Are site road rules established (e.g. right of way, communication protocols, speed limits and overtaking)?

VEHICLE INTERACTION CONTROL CHECKLIST