

Queensland Mineral Mines and Quarries

Monthly summary report

Compilation of reports for February 2018

Gravity

Fall of ground (7)

- A section of a stockpile pad and bund wall slumped over a weekend of heavy rain.
- A pass was bombed due to a hung up. During the inspection of the pass, falling material came out past the barricaded area.
- A 15 t rockfall occurred along the crest of a bench post a production blast.
- During the collaring of the first longhole drill, an operator noticed an increase in water flow. After drilling commenced on the third hole, a 1 m radius section of shotcrete and rocks fell from around the drill rod.
- A loader operator discovered fall of ground of approximately 120 t at the end of a development heading.
- A drill rig was hit by a falling rock from a bench 30 m above where the rig was operating. The falling rocks breached the catch bund.

Fall of people (2)

- While erecting scaffolding, a worker walked out onto a cable tray without fall protection. The cable tray was installed 4.6 m from the ground.
- A worker slipped from the 3rd rung of a ladder, fell backwards, and caught his leg in the gap between the rungs. He sustained a broken leg.

Fall of a structure (1)

- A radial stacker conveyor was being lowered by a maintenance crew to its lower limit, when the frame dropped approximately 300 mm onto a cross member, causing it to bend. The cause has been attributed to brake failure of the winch.

Fall of equipment/material (2)

- During maintenance on a conveyor a worker climbed onto the conveyor to rig it up so that a crane could lift a disassembled section of the structure. While doing this a hanger bracket fell forward, trapping the worker's arm between the hanger bracket and the conveyor frame. The worker sustained a fractured arm and was transported to hospital for treatment.
- 500 kg of material fell from a process plant conveyor into an area where personnel could have been working.

Thermal

Fire (4)

- A fire occurred on the drive line of a 60 t Sandvik underground haul truck. The fire was reported by the driver of the following vehicle.
- During refuelling of a Cat 16G grader fuel pooled in the cover. When the quick fill was disconnected the fuel ran down to the exhaust outlet where it ignited. The fire was extinguished by manual activation of the on-board fire suppression system.
- A light vehicle was parked and switched off 20 m behind a jumbo. Workers noticed flames under the bonnet of the light vehicle and a hand held extinguisher was used to put out the fire.
- A slipping conveyor belt on a mobile stacker caught fire and the onsite ERT were called to extinguish the fire.

Explosion (1)

- While a fitter was using an oxy-acetylene torch, the acetylene hose on the hand mixer loosened and leaked, eventually igniting. The fitter kinked the hose and turned off the valves at both cylinders.

Vehicle

Rollover (1)

- The tub of a Cat 730 articulated dump truck rolled over while operating on rough ground.

Collision with a natural or built structure (2)

- While a 3.5 t excavator was back blading it backed into and buckled a corner post of a sand plant.
- A light vehicle travelling down a decline lost brakes. The driver steered the vehicle into the wall to stop the vehicle. A front wheel was damaged and the steering rod broke.

Collision with another vehicle (3)

- A loader working in a sales area reversed into the rear trailer of a truck that was passing. The truck was the second of two trucks that had called the loader operator to advise they were passing behind the loader. The loader did not hear the second truck call up.
- A Komatsu WA 480 loader reversed into a Mack tipper truck that was parked behind the loader. The loader operator knew the truck was parked nearby but did not look to see where it was parked before reversing.
- A Cat 785C rear dump truck tipper lost traction while travelling at approximately 32 kmph along a haul road due to a wet and slippery road. As the driver attempted to slow down, the rear end of the truck turned toward the road shoulder and the front of the truck turned toward the crown, crossing the centre line by 3 m.

Other (1)

- The trailer brakes of a road train would not release. When the driver was checking the trailer to diagnose the problem the road train commenced rolling away. The driver climbed into the cab and applied the maxi brake to stop the truck.

Explosives

Misfire (2)

- An excavator operator uncovered two ICI plugs and detonators while loading out material. The date of the shot is not known, but predates 1992, when branding changed from ICI to Orica.
- Explosives were placed and detonated in a draw point by workers after they had been instructed not to, as the placement method would put the workers at risk.

Electrical

Electric shock (1)

- A jumbo offsider received a 24V electric shock when he put his hand on the dash of the jumbo. The investigation identified that during maintenance a screw went through one of the wires of the rear light circuit on the dashboard.

Arc flash/blast (1)

- A 132 KV transformer failed catastrophically, with shrapnel from the failure landing in locations up to 15 m away. A fire started underneath the transformer and set alight vegetation adjacent to the switchyard fence. The electrical protection operated, isolating the transformer.

Chemical

Acids (2)

- Concentrated sulphuric acid sprayed onto a technician when disconnecting a loading arm. The worker did not sustain any injuries as they were wearing an acid suit at the time.
- A valve handle came loose when an operator went to use it, causing phosphoric acid to be sprayed onto the workers upper body and face. The affected area was immediately washed and flushed.

Mechanical

Struck by projectile (2)

- A mobile crane was being used to extract a pump from the slurry in a pond. Two workers were positioned between the pump and crane. As the load was taken by the crane, the lifting slings failed, allowing the crane rope to fly around. The workers were not injured.
- While removing a tyre from an LV rim using a tyre lever, the lever was not inserted properly between tyre and rim. The tyre lever slipped out while pulling on the tyre lever, causing the worker to fall backwards onto hands awkwardly & partially dislocating his shoulder.

Entangled in rotating plant (1)

- An electrical apprentice using a 125 mm grinder with a cutting disc to cut steel, lost control of the grinder and cut his left forearm. He was transported to hospital for treatment.

Laceration with sharp object (1)

- While a Cat 2900 loader was mucking a development face, a drill steel in the muck pile deflected up through the window narrowly missing the operator.

Other (1)

- A Volvo L210 loader with a work platform attached was being serviced. The boom would not lower under power, so the emergency lowering mechanism was used. As this commenced the boom suddenly lowered under power causing the machine to drive up onto the stand tilting the stand and the machine. The machine fell back on all four wheels.

Pressure

Failure of pressure vessel (1)

- The fitter went to investigate a leaking high pressure expansion joint on a tails pump when it blew out covering the fitter in slurry.

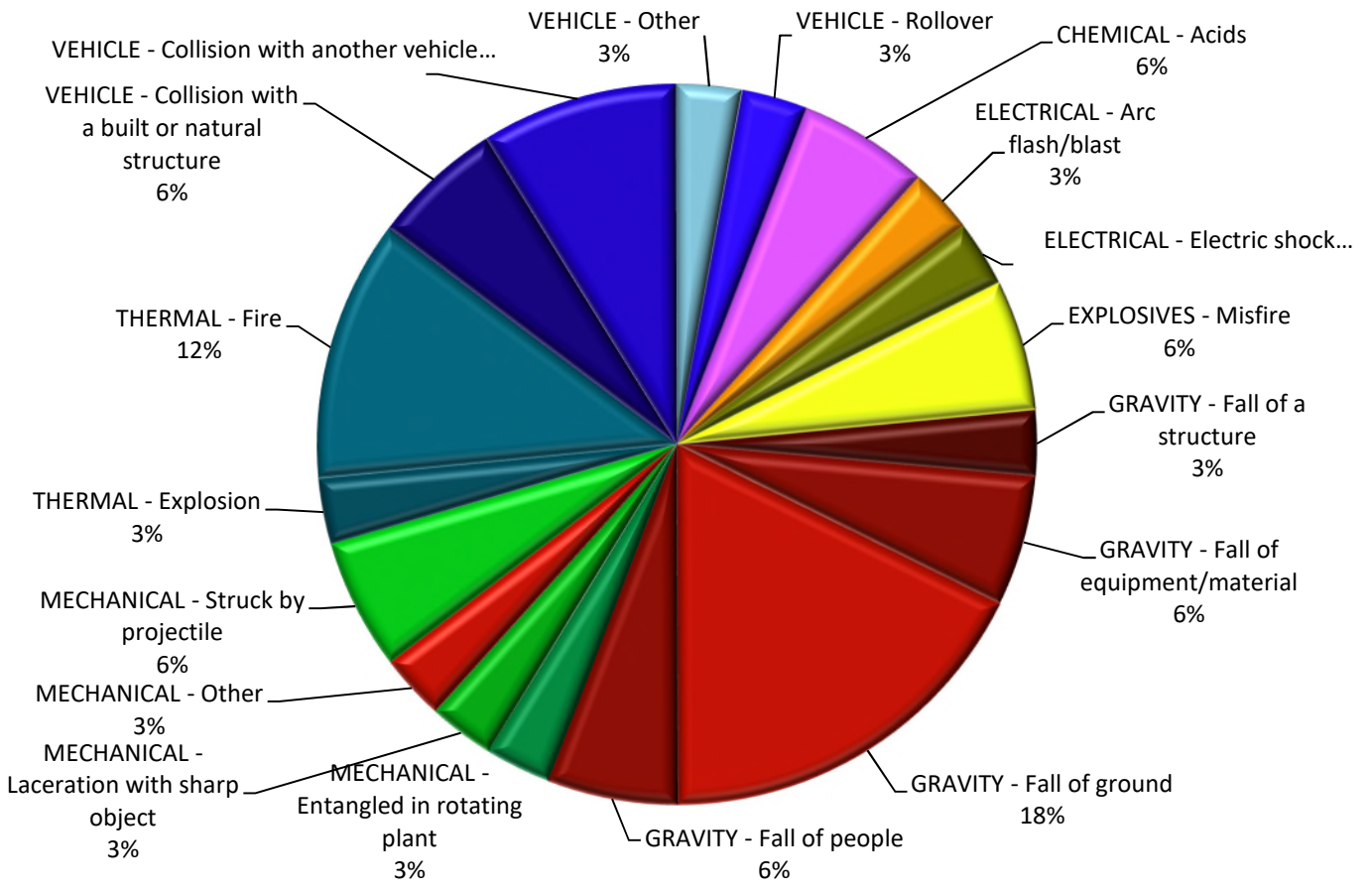


Chart 1 - February 2018 (34 incidents)

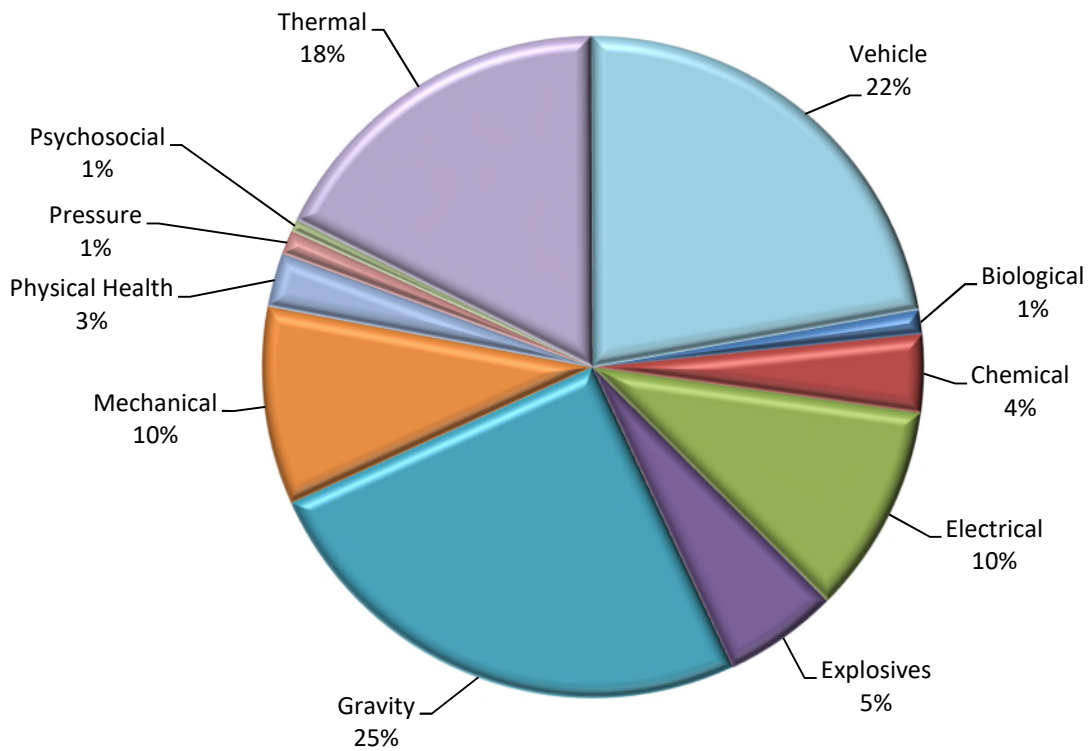


Chart 2 - 12 Month rolling average to end February 2018 by Hazard category (341 events)

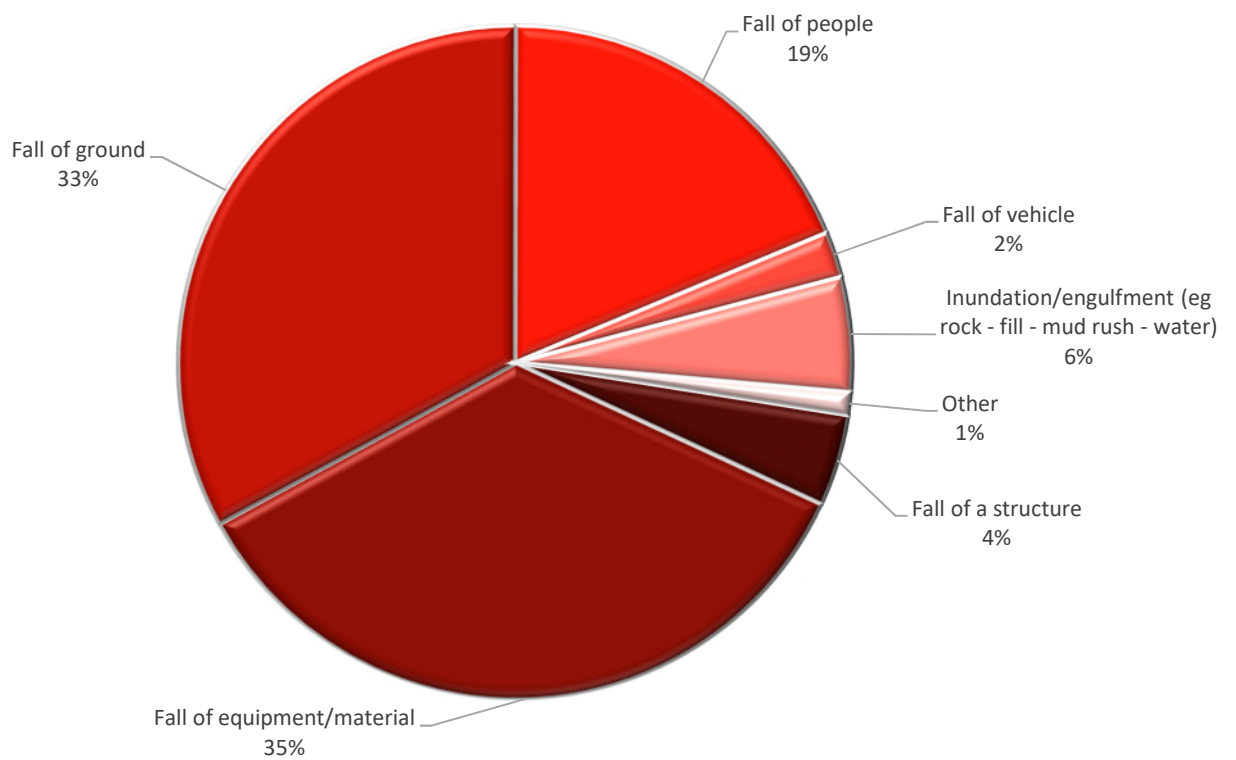


Chart 3 - April to February 2018 breakdown of Gravity hazard category (91 events)

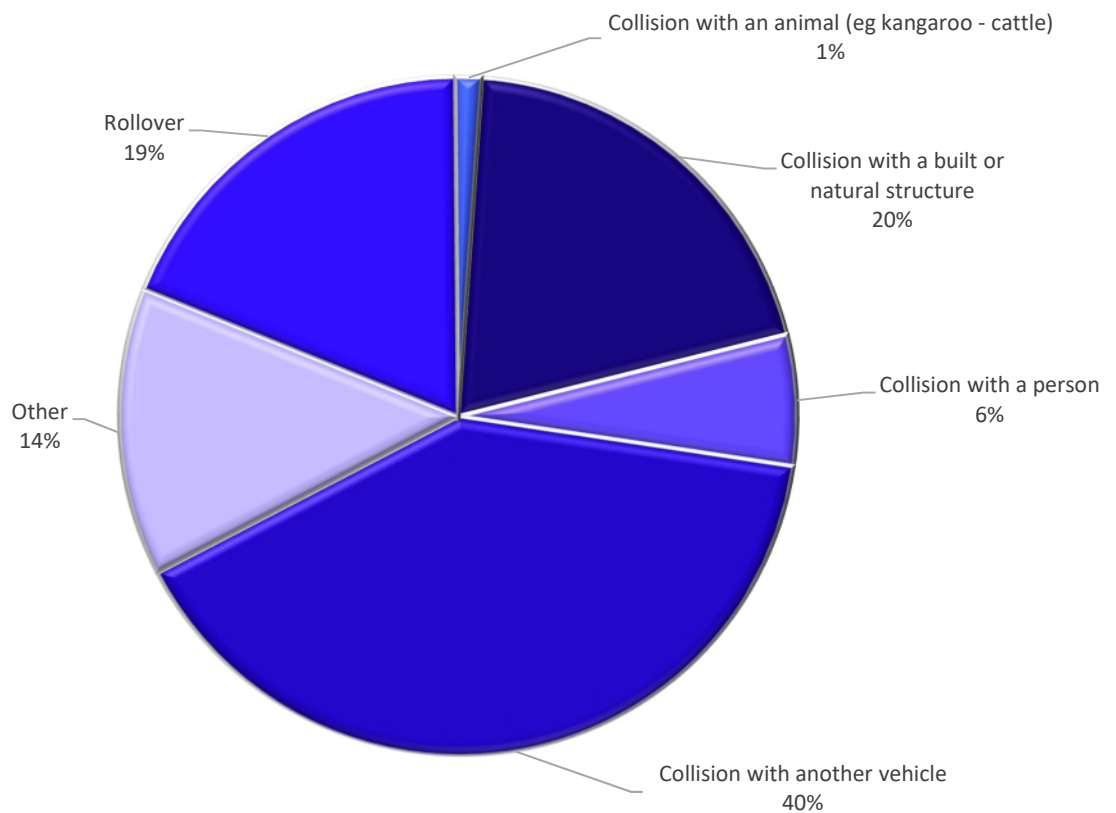


Chart 4 - April 2017 to February 2018 breakdown of Vehicle hazard category (80 events)

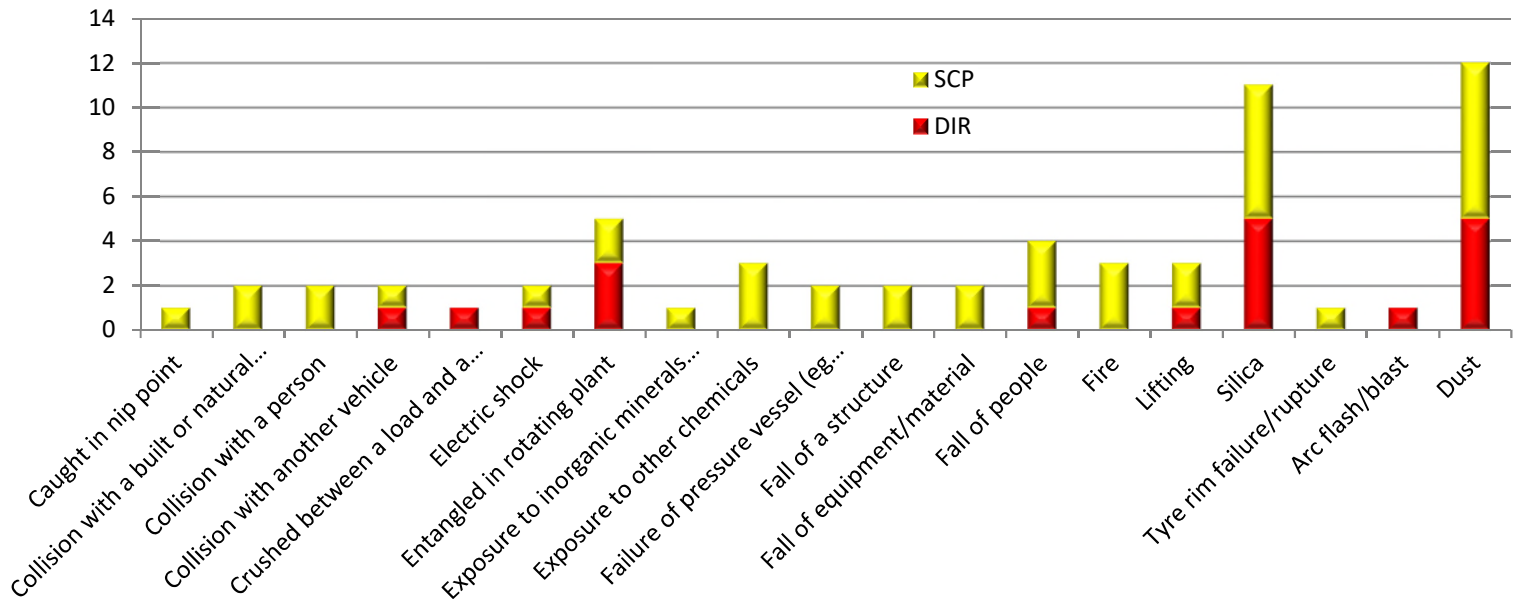


Chart 5 - February 2018 Compliance matters issued by Hazard Category (60 issued)

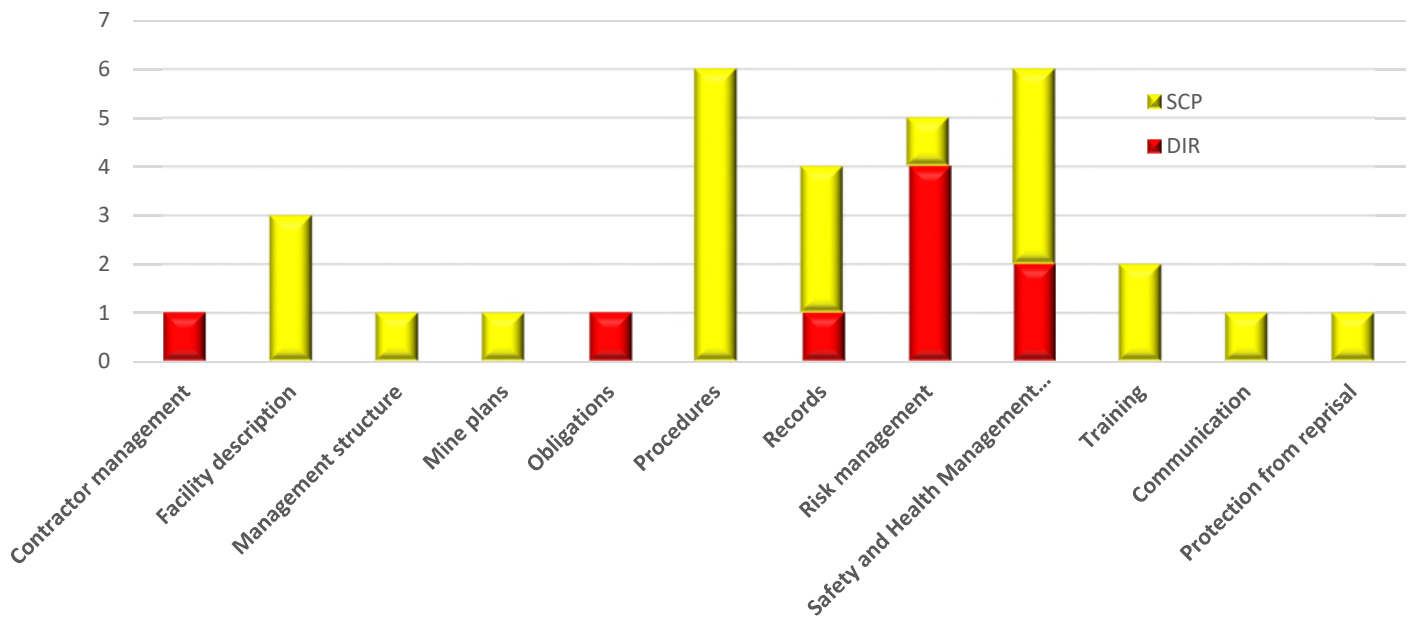


Chart 6 - February 2018 Compliance matters issued by Non-Hazard Category (32 issued)

Past Mineral Mines and Quarry summary reports can be sourced at
<https://www.business.qld.gov.au/industry/mining/safety-health/mining-safety-health/accidents-incidents/serious-and-high-potential>