LOST TIME INJURIES BY MINERAL MINED DURING 2011-2012

Mineral mined	No. of employees	Million hours worked	No. of serious LTIs	No. of minor LTIs	Total LTIs	Days lost	Incidence rate	Frequency rate	Duration rate	Injury index	No. of fatalities
Iron ore	38,306	79.13	86	7	93	2,594	2.4	1.2	27.9	33	2
Gold	22,343	41.67	104	20	124	3,073	5.5	3.0	24.8	74	0
Bauxite and alumina	10,145	21.28	53	8	61	1,078	6.0	2.9	17.7	51	0
Nickel	8,705	17.63	37	4	41	968	4.7	2.3	23.6	55	0
Base metals	2,908	5.24	13	2	15	550	5.2	2.9	36.7	105	0
Mineral sands	2,194	3.76	6	3	9	238	4.1	2.4	26.4	63	0
Diamonds	2,248	4.73	21	6	27	458	12.0	5.7	17.0	97	0
Salt	1,097	1.73	1	0	1	5	0.9	0.6	5.0	3	0
Manganese ore	799	1.53	2	0	2	112	2.5	1.3	56.0	73	0
Construction materials	934	1.72	6	8	14	228	15.0	8.1	16.3	133	0
Tin, tantalum and lithium	650	1.61	3	1	4	85	6.2	2.5	21.3	53	0
Other	3,094	4.77	22	8	30	303	9.7	6.3	10.1	64	0
Surface metalliferous	**83,265**	**163.89**	**298**	**57**	**355**	**8,352**	**4.3**	**2.2**	**23.5**	**51**	**2**
Underground metalliferous	**10,158**	**20.91**	**56**	**10**	**66**	**1,340**	**6.5**	**3.2**	**20.3**	**64**	**0**
Total metalliferous	**93,423**	**184.80**	**354**	**67**	**421**	**9,692**	**4.5**	**2.3**	**23.0**	**52**	**2**
Coal	589	1.43	16	20	36	685	61.1	25.2	19.0	479	0
Total – all mining	**94,012**	**186.23**	**370**	**87**	**457**	**10,377**	**4.9**	**2.5**	**22.7**	**56**	**2**
Total – exploration	**3,651**	**7.91**	**28**	**15**	**43**	**694**	**11.8**	**5.4**	**16.1**	**88**	**0**
TOTAL	**97,663**	**194.14**	**398**	**102**	**500**	**11,071**	**5.1**	**2.6**	**22.1**	**57**	**2**

FATAL ACCIDENTS 2011-2012

There were two fatal accidents in the Western Australian mineral industry during 2011-12

- A fitter, working with others to change out the hydraulic bucket tilt cylinder on a front-end loader, received fatal head injuries when the cylinder, which was being supported by chains from an overhead gantry crane, dropped suddenly onto the loader boom as the fitter was working beneath it.
- A conveyor services contractor employee, standing on a belt winder platform, was fatally injured when a 40 tonne mobile crane, which was lowering a loaded belt reel onto the winder, toppled onto its side and crushed the worker between the crane boom and the belt winder platform.

DEFINITIONS

LOST TIME INJURY (LTI)
Work injury that results in an absence from work for at least one full day or shift any time after the day or shift on which the injury occurred

SERIOUS INJURY
Work injury that results in the injured person being disabled for a period of two weeks or more

MINOR INJURY
Work injury that results in the injured person being disabled for a period of less than two weeks

DISABLING INJURY (DI)
Work injury (not LTI) that results in injured person being unable to fully perform his or her ordinary occupation (regular job) any time after the day or shift on which the injury occurred, regardless of whether or not the person is rostered to work, and where alternative or light duties are performed or hours are restricted

INCIDENCE RATE
Number of lost time injuries per 1,000 employees for a 12 month period

FATAL INJURY INCIDENCE RATE
Number of fatal injuries per 1,000 employees for a 12 month period

FREQUENCY RATE (LTIFR)
Number of lost time injuries per million hours worked

DURATION RATE
Average number of workdays lost per injury

INJURY INDEX
Number of workdays lost per million hours worked

SERIOUS INJURY FREQUENCY RATE
The number of serious injuries per million hours worked

DISABLING INJURY FREQUENCY RATE (DIFR)
Number of disabling injuries per million hours worked

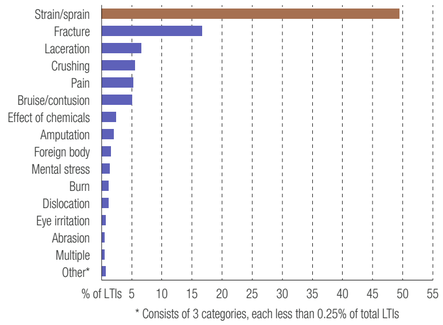
METALLIFEROUS MINES
All mines other than coal mines are classed as metalliferous mines

NOC
Not otherwise classified

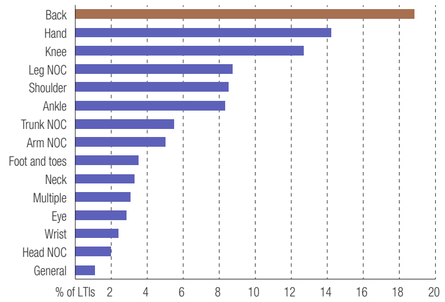
EXPLORATION
Exploration activities not under the control of a Registered Mine Manager, usually associated with exploration leases

FOR MORE DETAILED INFORMATION ON SAFETY PERFORMANCE, SEE THE ANNUAL COMPILATIONS AT WWW.DMP.WA.GOV.AU/RESOURCESSAFETY IN THE ACCIDENTS AND INCIDENTS SECTION.

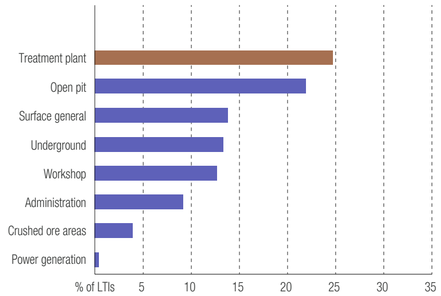
NATURE OF INJURY



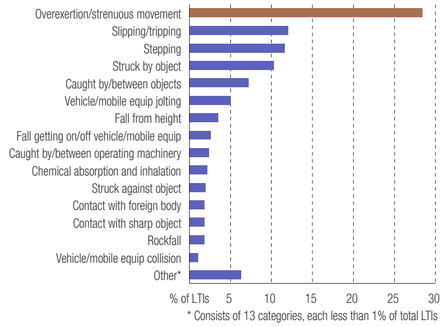
PART OF BODY



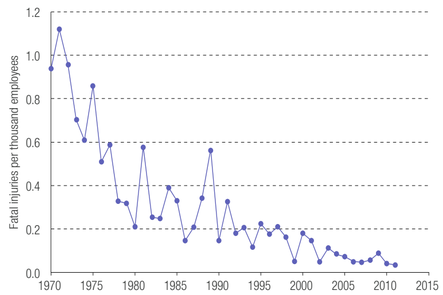
LOCATION OF ACCIDENT



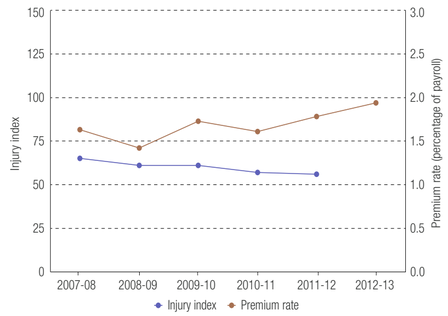
TYPE OF ACCIDENT



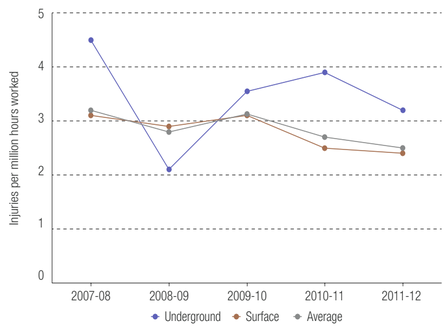
MINING FATAL INJURY INCIDENCE RATE



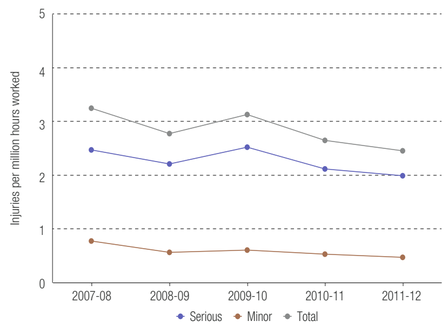
COMPARISON OF INJURY INDEX AND COMPENSATION PREMIUM RATE



MINING LOST TIME INJURY FREQUENCY RATE BY LOCATION



MINING LOST TIME INJURY FREQUENCY RATE BY SEVERITY



STATISTICAL SUMMARY

MINING

- There were two fatal accidents during 2011-12 — one on the surface at an iron ore mine and one at the port facilities of an iron ore operation.
- There were 457 LTIs during 2011-12, 40 more than the previous year (417 injuries in 2010-11).
- There was an average workforce of 94,012 employees in 2011-12, an increase of approximately 15% over the previous year's average of 81,953.
- The overall LTI duration rate deteriorated by 5% during 2011-12, rising from 21.6 to 22.7.
- The overall LTI frequency rate improved by 7% during 2011-12, falling from 2.7 to 2.5.
- The overall injury index improved slightly, by less than 2%, falling from 57 to 56.
- Serious LTIs in the mining industry during 2011-12 totalled 370, 37 more than for 2010-11.
- The overall serious LTIFR improved by 5% during 2011-12, falling from 2.1 to 2.0.
- The iron ore sector LTIFR improved by 8% during 2011-12, falling from 1.3 to 1.2.
- The bauxite and alumina sector LTIFR deteriorated by 4% during 2011-12, rising from 2.8 to 2.9.
- The gold sector LTIFR improved by 17% during 2011-12, falling from 3.6 to 3.0.
- The nickel sector LTIFR improved by 28% during 2011-12, falling from 3.2 to 2.3.
- There were 857 disabling injuries (DI) during 2011-12, 39 more than the previous year (818 disabling injuries reported in 2010-11).
- The overall DI frequency rate improved by 12%, falling from 5.2 to 4.6.

EXPLORATION

- There were no exploration fatalities in 2011-12.
- There were 43 LTIs during 2011-12, three less than the previous year.
- There was an average workforce of 3,651 employees, an increase of 9% over the previous year's average.
- The overall LTIFR improved by 19% during 2011-12, falling from 6.7 to 5.4.
- There were 53 exploration disabling injuries reported during 2011-12, resulting in a DI frequency rate of 6.7, an increase of 24%.

SAFETY PERFORMANCE IN THE WESTERN AUSTRALIAN MINERAL INDUSTRY 2011-12

Government of Western Australia
Department of Mines and Petroleum
Resources Safety

www.dmp.wa.gov.au/ResourcesSafety

RSDOct13_856