

Fatal and non-fatal accidents in petroleum/coal products in Japan in 1999-2022

petroleum/coal products industry Code No.010804

Type of accidents in petroleum/coal products in 1999-2022

Type of accidents	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
fall from height	12	10	25	9	7	8	13	4	13	13	10	14	17	12	14	16	5	10	16	6	15	10	13	9	281
falling to same level	7	12	12	7	8	11	13	3	11	9	4	11	4	9	15	9	7	7	6	7	10	8	12	7	209
crash	5	4	4	1	2	7	8	2	2	1	7	5	3	3	1	5	2	3	2	2	1	1	5	2	78
struck by flying or falling object	11	7	4	10	2	4	4	6	2	1	3	3	3	2	3	3	1	4	3	1	2	2	1	2	84
collapse		1	1	1	2	1		3	2		1				1		2			1		2		1	19
crashed by	1	3	5	5	3	1	1	2	1	1	1		5	3	2	3	2	2		2	1	5	2	2	53
caught in/between	25	20	23	21	14	30	12	25	15	14	13	17	16	7	10	19	16	7	13	14	9	11	13	9	373
cut	9	4	4	3	2	5	4	4	2	5	1	2	3	2	2				1			2	3	2	60
injury to the sole of the foot	1								2	1									1						5
drown		1											8							1					10
contact to high/low-	5	2	10	5	7	6	9	2	4	5	5	5	4	5	1	5	3	5	6	5	4	1	5	3	112

temperature																									
contact to harmful substance	2	4	2	2	1	2		1	1		1	3		6		9	1	1	1	2	1	1	1	2	44
electric shock														1											1
explosion	1			4	1						2		3		4						2				17
burst													1												1
fire			1				1	2			4	2	1				1		1						13
traffic accident (public road)	1				1			1	1		2	1						1		1		3	1	1	14
traffic accident (others)																						1			1
reaction to motion/improper motion	6	10	3	4	4	12	8	8	3	4	4	8	3	4	6	1	2	3	8	5	4	5	11	2	128
others		1					1								1	1					3	4			11
unclassifiable							1																		1
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515

Causal agents (large) of fatal and non-fatal accidents in petroleum/coal products in 1999-2022

Causal (L) agents	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
machine	26	15	22	15	10	20	9	14	9	8	9	11	12	4	8	13	10	4	5	5	5	6	14	5	259

crane, conveying machine	17	11	18	10	13	17	12	16	13	8	11	12	8	5	11	15	6	9	9	14	10	16	11	11	283
other equipment	12	12	22	18	7	14	16	9	11	15	10	15	18	18	11	11	8	14	10	7	13	10	16	10	307
temporary buildings, establishments	11	14	13	12	10	15	25	8	11	12	11	16	14	11	15	14	9	8	15	9	11	13	12	7	296
substance, material	9	15	8	7	6	9	4	7	7	2	12	10	5	8	5	13	3	4	6	4	6	3	5	5	163
load	9	7	5	9	3	8	5	7	1	3	3	3	3	3	6	2	3	1	6	2	2	3	2	1	97
environment	1	3	3		3		1	1	3	3	1		10	2	3	1	2	2	3	4	2		3	1	52
others	1	2	3	1	2	4	3	1	4	3	1	4	1	3	1	2	1	1	4	2	3	5	4	2	58
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515

Causal agents (middle) of fatal and non-fatal accidents in petroleum/coal products in 1999-2022

Causal (M) agents	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
engine																									
power transmission mechanism	2	2	2	1	2	2	1			1	1	3			1	2	4			1			1		26
woodworking machine	2	1						1		1			1		1								1		8

demolition machine								1															1
vehicle for high lift work																							
other construction machines													1										1
lathe		1																					1
drill press, milling machine																							
grinding machine, buffing machine															1								1
power press																1							1
forging pressure hammer																							
shearing machine																							
other metal manufacturing machines		1				1					1							1			1		5
centrifugal machine																							
mixer, grinder		3				3	2		1	1	1	4	1	1	2	1		1	1				22
roll machine (except printingroll machine)		1		1		1	1	1		1	2		1	1		1				1			13

pressure vessel																								
other pressure vessels																							1	1
chemical facilities			1				1		3		3	3	2		1	1	1		1	1		1		19
gas welding equipment																								
arc welding equipment																								
other welding equipment																								
kiln, caldron						1		1	1					1	1	1			1	1	1		1	10
industrial dryer												1			1									2
other kiln, caldron																								
transmission										1							1							2
electric power facilities												2					1							3
other electrical equipment																								
human power cranes							1						1											2
human power hauling equipment				1		4	2	3	1	1				2		1	1	2	1	2	1	1	1	24

human power machine												1			1									2	
hand tool			2			2		1	1	1	1	1	2	1			3	1			1	2		19	
ladder			10		2		3	1	2	4	2	5	2	5	1	2		3	4		3	1	4	5	59
slinging tool												1				1		1						3	
other tools			4				1	3	1	2	1	1	2	3	2		1	2	1	2	1	1	5	33	
other equipment, facilities			5		3		4	1	3	3	4	4	7	4	4	4	4	1	2	2	5	5	3	2	70
scaffolding					1				1						2	2				1				7	
timbering																									
stairs, landing stage			1		3		6	1	4	4	2	2	3	2	2	2	3	3	2	3	1	4	4	52	
opening								1		1		1	1	2	1			1	1			1		10	
roof, beam, haze, crossbeam, principal rafter								1		1			1											4	
working platform, boot board			1				3	1	1		1	2		2	1	2	1		4		1	1	4	1	26
passage			5		3		7	1	4	1	4	7	2	2	4	3	2	3	5	4	7	4	3	5	76
building, establishment			5		2		6	2	1	3	4	4	6	3	3	1	2	1	2		1			46	
other temporary buildings,			1		1		3	1		2			1		2	3	1		1	1	1	3	1	1	23

environment																											
high/cold temperature environment			1		1			1		3			2				2		2	2			2				16
other environments			2		2		1						2	1	3	1		2	1		1			1		17	
other causal agent			1		1				4	2				1			1		1		1	4		1		17	
no causal agent			1		1		3	1		1	1	4	1	2	1	2		1	3	2	2	1	4	1		32	
unclassifiable			1																							1	
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515		

Workers age of fatal and non-fatal accidents in petroleum/coal products in 1999-2022

Age	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
19 years old or less	2		2	3		1			1	1				4	1	1	2	2	2	1	1	3	1		28
20-29	11	14	20	17	4	11	10	12	4	4	10	12	8	5	8	14	4	5	5	4	5	7	11	6	211
30-39	16	14	15	14	11	15	17	17	13	5	10	20	20	11	10	12	8	8	6	5	8	8	15	7	285
40-49	19	27	25	11	19	24	14	18	14	15	14	12	13	8	16	15	11	11	20	15	13	19	10	10	373
50-59	26	21	23	20	14	27	24	13	18	19	17	20	19	15	15	19	11	10	14	13	13	11	16	12	410
60 years old or more	12	3	9	7	6	9	10	3	9	10	7	7	11	11	10	10	6	7	11	9	12	8	14	7	208
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515

Workers' number of workplace of fatal and non-fatal accidents in petroleum/coal products in 1999-2022

Workers scale	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
9 workers or less	27	21	26	17	15	23	14	13	13	21	15	11	13	6	14	20	13	12	9	9	9	8	11	4	344
10-29	24	22	18	19	18	19	15	13	16	8	10	17	15	15	12	9	11	8	12	11	14	11	20	10	347
30-49	11	11	17	5	5	13	10	7	9	10	10	5	8	2	7	4	4	4	10	3	11	8	13	11	198
50-99	11	13	13	14	6	18	14	11	9	2	11	10	17	11	8	16	5	5	6	8	7	11	7	7	240
100-299	7	7	10	9	6	10	13	14	4	7	6	14	7	6	15	7	2	10	11	7	7	5	4	5	193
300 workers or more	6	5	10	8	4	4	9	5	8	6	6	14	11	14	4	15	7	4	10	9	4	13	12	5	193
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515

Month of fatal and non-fatal accidents in petroleum/coal products in 1999-2022

Month	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
January	4	9	7	3	7	8	4	8	3	2	3	4		6	4	6	1	6	1	2	5	7	7	5	112
February	7	2	8	4	3	2	4	5	3	2	11	7	11	4	6	6	4	4	10	4	9	6	10	5	137
March	8	7	10	4	1	9	5	8	7	3	7	7	14	6	4	4	5	3	3	4	3	4	3	3	132
April	3	8	8	5	6	6	3	9	4	3	5	6	4	4	6	3	6	1	3	2	3	1	3	4	106
May	5	4	7	8	5	4	8	2	5	6	6	1	5	6	2	2	1	3	6	4	2	2	3	6	103
June	6	16	6	6	2	17	10	7	3	4	1	9	5	3	4	4		2	1	2	4	4	6	3	125

July	10	6	10	12	7	11	11	6	1	8	8	3	3	7	9	11	4	5	6	3	4	7	4	2	158
August	10	5	13	5	2	3	8		4	3	5	4	8	2	3	7	3	5	6	9	6	5	5	1	122
September	14	4	7	7	7	10	5	4	1	7	3	10	1	4	7	5	2	5	4	5	5	9	9	2	137
October	7	9	6	4	5	5	7	2	9	7	2	7	12	5	2	8	6		6	6	2	9	7	4	137
November	8	3	6	4	3	3	7	8	16	6	3	8	7	3	12	11	5	6	6	3	3	1	2	4	138
December	4	6	6	10	6	9	3	4	3	3	4	5	1	4	1	4	5	3	6	3	6	1	8	3	108
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515

Prefecture of fatal and non-fatal accidents in petroleum/coal products in 1999-2022

Prefecture	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
Hokkaido	3	5	8		4		2	5		3	9	6	3	7	6	1		4	3	4	1		3	3	80
Aomori	3	1										1							1	1					7
Iwate	1		1												1	2	1	1				1			8
Miyagi	1	1	1		2		1		1	1			6		1	1	2	1		1	1	1			22
Akita									2	1		1	2		1										7
Yamagata										1						1							1		3
Fukushima	1		2		2			1				2							2						10
Ibaraki	5	4	3		1			4	1	1		2	1			2	1	2	2	1	2		3	1	36
Tochigi	1						2	4				1	1	2		1	2			1	1	3	3		22
Gunma	1	2					2	1	2	1		1	1				2		3				1		17

Shimane															1		1			1					3
Okayama	1	1	2		4		3	1	2	6	2		4	2	1		1	2	3	3	1	2	7	2	50
Hiroshima	2	3	2		2		1	1					2		1	8	4		1			5	3	1	36
Yamaguchi	4	4	6		1		1	2	3	4	3	3	1	6	6	2	1	1	3	3	2	5	3	1	65
Tokushima	1							1																	2
Kagawa			1				2	1				1	1			2	1	1	2			2			14
Ehime		1	1						1	1	1		1	1	1	2		2			1	1	1		15
Kochi							1																		1
Fukuoka	7	6	10		5		2	1	6	1	10	2	5	5	3	4	7	5	3	5	3	2	3	5	100
Saga		1			1						1						1					1		1	6
Nagasaki			2						1	1	1							1					1		7
Kumamoto		1			1			2						1			2				2	1	1	2	13
Oita		1							1				1			3		2			1	2	1	1	13
Miyazaki									1		1					1			2						5
Kagoshima	1	1	2				1	1							1		1	1			1		2		12
Okinawa	1	2	1				1	1	1												1				8
total	86	79	94	72	54	87	75	63	59	54	58	71	71	54	60	71	42	43	58	47	52	56	67	42	1,515

Fatal and non-fatal accidents mean fatal and non-fatal injuries and occupational diseases with work absence of 4 days and more.

Data of 2022 year do not include Covid-19 cases. Data of 2020 & 2021 year include Covid-19 cases. Fatal and non-fatal data are same situation.

Data of 2011 year include fatal and non-fatal accidents caused by Great East Japan Earthquake in 2011.

drown		1											8						1						10
contact to high/low-temperature																			1						1
contact to harmful substance														1											1
electric shock																									
explosion															2						1				3
burst																									
fire																			1						1
traffic accident (public road)																									
traffic accident (others)																									
reaction to motion/improper motion																									
others																									
unclassifiable																									
total	3	3	3	2	3	1	2	2	3	3	1	3	8	1	3		1		3	1	1		1	1	49

Causal agents (large) of fatal accidents in petroleum/coal products in 1999-2022

environment																									
high/cold temperature environment																			1						1
other environments													2												2
other causal agent																									
no causal agent																									
unclassifiable																									
total	3	3	3	2	3	1	2	2	3	3	1	3	8	1	3		1		3	1	1		1	1	49

Workers age of fatal accidents in petroleum/coal products in 1999-2022

Age	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
19 years old or less				1																					1
20-29		1															1								2
30-39			1		1	1	1	1	1				3											1	10
40-49	1	1	1	1	1		1		2		1	1	2		1				1						14
50-59	1	1	1					1		3		1	2	1	2				2		1				16
60 years old or more	1				1							1	1							1			1		6
total	3	3	3	2	3	1	2	2	3	3	1	3	8	1	3		1		3	1	1		1	1	49

July				1																				1	
August			1				1												1	1				4	
September			1							1								1				1		4	
October									1															1	
November			1						1						2									4	
December	1				1				1															3	
total	3	3	3	2	3	1	2	2	3	3	1	3	8	1	3		1		3	1	1		1	1	49

Prefecture of fatal accidents in petroleum/coal products in 1999-2022

Prefecture	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	total
Hokkaido																									
Aomori																									
Iwate																									
Miyagi	1		1	1									6												9
Akita									1				2												3
Yamagata																									
Fukushima																									
Ibaraki	1		1																						2
Tochigi																									
Gunma																			1						1

Shimane																									
Okayama																									
Hiroshima																					1		1		
Yamaguchi																									
Tokushima																									
Kagawa																									
Ehime	1																							1	
Kochi																									
Fukuoka							1	1	1									1						4	
Saga																									
Nagasaki																									
Kumamoto																									
Oita																									
Miyazaki																									
Kagoshima																									
Okinawa																									
total	3	3	3	2	3	1	2	2	3	3	1	3	8	1	3		1		3	1	1		1	1	49

Data sources: <https://anzeninfo.mhlw.go.jp/user/anzen/tok/anst00.html> (MHLW, Japan)

Return to https://www.jisha.or.jp/english/statistics/2022e_industry.html