



## Fact Sheet - Safety

### Safety Trends

#### Accident Overview

	2009	2010	2011	2012	2013	2014	Trend	Average 2009-2013
Yearly Flights (Millions)*	33.2	34.0	35.0	35.6	36.2	38.0		34.8
Total Accidents	90	94	92	75	81	73		86
Fatal Accidents	18	23	22	15	16	12		19
Fatalities**	685	786	490	414	210	641		517

Note: the trend is designed to indicate the performance for each category, therefore the scale has been adjusted for each category and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the lowest during the period.

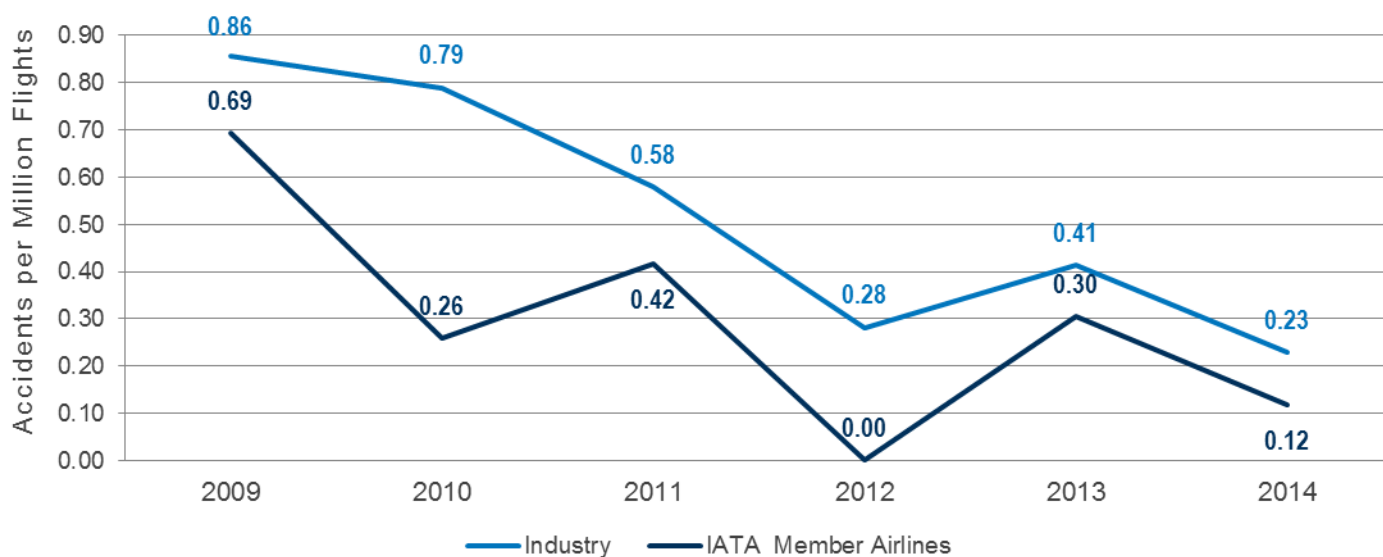
\*Flight information provided by Ascend FlightGlobal. Flight numbers are updated with the most accurate counts available at the time of production.

\*\*Fatality figures provided by Ascend FlightGlobal

#### Jet Hull Loss - Industry vs. IATA

	2009	2010	2011	2012	2013	2014	Trend	2009-2013
Industry	0.86	0.79	0.58	0.28	0.41	0.23		0.58
IATA Member Airlines	0.69	0.26	0.42	0.00	0.30	0.12		0.33

\*Note: the trend is designed to indicate the performance for each category, therefore the scale has been adjusted for each category and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the best performance during the period.



## Jet Hull Loss Rate – Regional

This rate includes accidents involving all jet aircraft where the accident resulted in a hull loss. The Jet Hull Loss rate is calculated as number of accidents per million sectors.

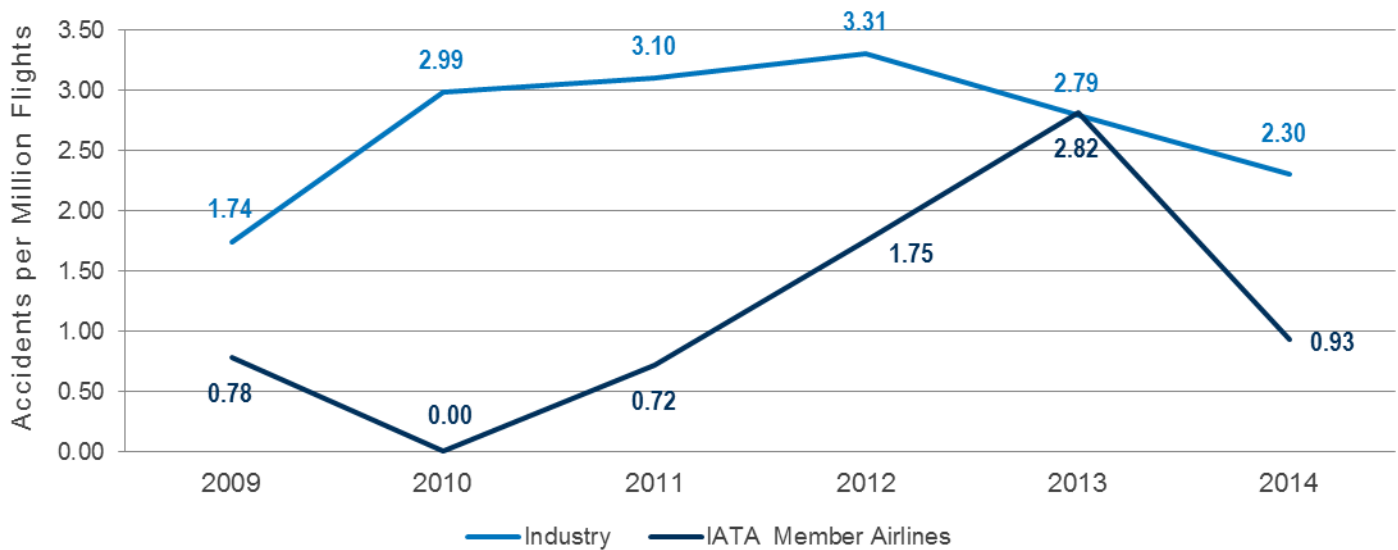
	2009	2010	2011	2012	2013	2014	Trend	2009-2013
Africa	14.38	9.14	4.36	4.63	2.22	0.00		6.83
Asia Pacific	0.89	0.84	0.26	0.49	0.71	0.44		0.63
Commonwealth of Independent States	0.00	3.50	6.34	1.91	1.79	0.83		2.74
Europe	0.46	0.47	0.00	0.15	0.15	0.15		0.24
Latin America and the Caribbean	0.00	1.99	1.44	0.45	0.45	0.41		0.87
Middle East and North Africa	5.29	1.58	2.31	0.00	0.66	0.63		1.82
North America	0.44	0.11	0.11	0.00	0.33	0.11		0.20
North Asia	0.00	0.36	0.00	0.00	0.00	0.00		0.06
Industry	0.86	0.79	0.58	0.28	0.41	0.23		0.58
IATA Member Airlines	0.69	0.26	0.42	0.00	0.30	0.12		0.33

\*Note: the trend is designed to indicate the performance for each region, therefore the scale has been adjusted for each region and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the best performance during the period.

## Turboprop Hull Loss - Industry vs. IATA

	2009	2010	2011	2012	2013	2014	Trend	2009-2013
Industry	1.74	2.99	3.10	3.31	2.79	2.30		2.78
IATA Member Airlines	0.78	0.00	0.72	1.75	2.82	0.93		1.14

\*Note: the trend is designed to indicate the performance for each category, therefore the scale has been adjusted for each category and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the best performance during the period.



## Turboprop Hull Loss Rate – Regional

This rate includes accidents involving all turboprop aircraft where the accident resulted in a hull loss. The Turboprop Hull Loss rate is calculated as number of accidents per million sectors.

	2009	2010	2011	2012	2013	2014	Trend	2009-2013
Africa	5.25	10.97	7.58	17.14	7.51	14.13		9.62
Asia Pacific	1.50	2.12	2.65	1.92	2.50	0.00		2.16
Commonwealth of Independent States	5.82	11.85	17.61	18.73	6.49	11.95		12.12
Europe	0.62	0.64	1.97	0.69	3.64	0.71		1.46
Latin America and the Caribbean	3.51	4.60	8.27	2.44	3.73	1.21		4.53
Middle East and North Africa	5.91	11.89	6.85	14.26	0.00	7.17		7.91
North America	0.75	1.57	0.38	1.20	1.21	1.19		1.02
North Asia	0.00	0.00	0.00	12.66	0.00	11.28		2.41
Industry	1.74	2.99	3.10	3.31	2.79	2.30		2.78
IATA Member Airlines	0.78	0.00	0.72	1.75	2.82	0.93		1.14

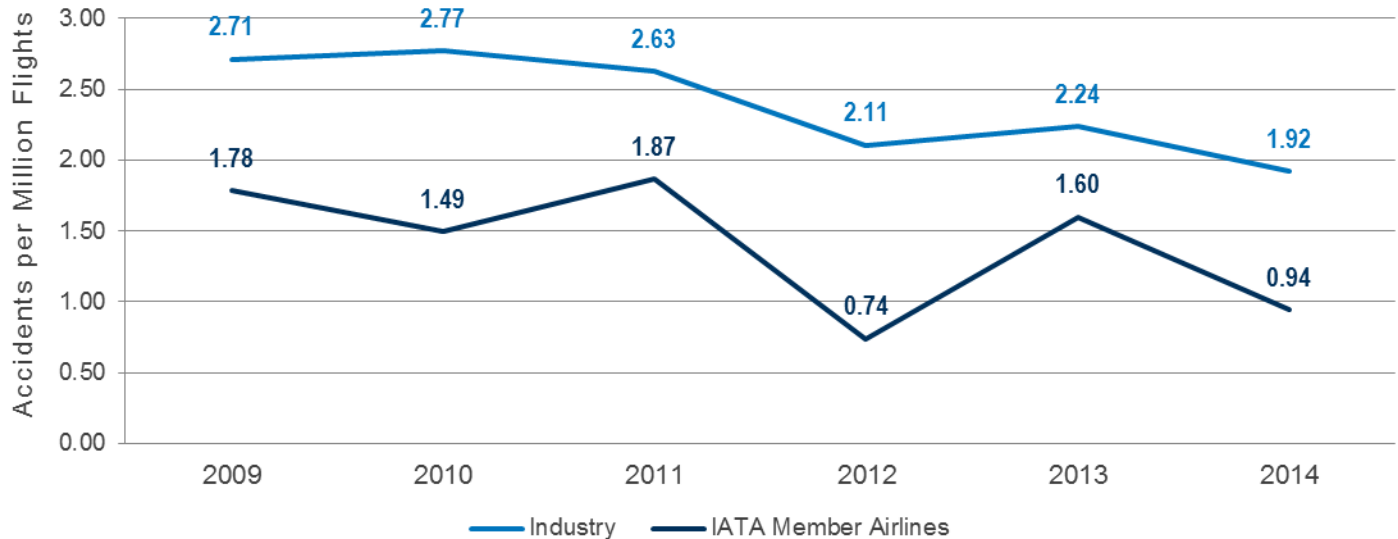
\*Note: the trend is designed to indicate the performance for each region, therefore the scale has been adjusted for each region and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the best performance during the period.

## All Accident Rate - Industry vs. IATA

This rate includes accidents for all aircraft: it includes Substantial Damage and Hull Loss accidents for jets and turboprops. The All Accident rate is calculated as the number of accidents per million sectors. This is the most comprehensive of the accident rates calculated by IATA.

	2009	2010	2011	2012	2013	2014	Trend	2009-2013
Industry	2.71	2.77	2.63	2.11	2.24	1.92		2.48
IATA Member Airlines	1.78	1.49	1.87	0.74	1.60	0.94		1.49

\*Note: the trend is designed to indicate the performance for each category, therefore the scale has been adjusted for each category and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the best performance during the period.

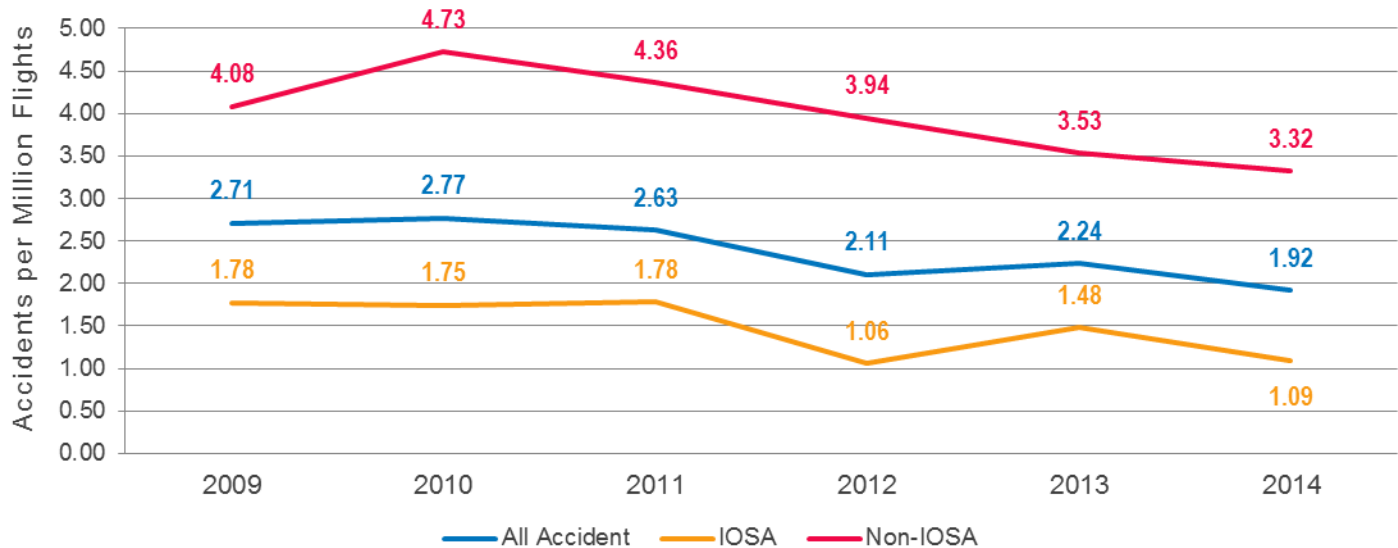


## IOSA Registered Carriers vs. non-IOSA

The positive results of IOSA are demonstrated when the All Accident rate is broken-down to show the rate for IOSA registered airlines compared to the rate for operators not on the IOSA registry. The accident rate for IOSA-registered airlines is almost 3 times lower than that for non-IOSA-registered airlines for the period between 2010 and 2014.

Category	2009	2010	2011	2012	2013	2014	Trend	2009-2013
All Accident	2.71	2.77	2.63	2.11	2.24	1.92		2.48
IOSA	1.78	1.75	1.78	1.06	1.48	1.09		1.57
Non-IOSA	4.08	4.73	4.36	3.94	3.53	3.32		4.11

\*Note: the trend is designed to indicate the performance for each category, therefore the scale has been adjusted for each category and cannot be compared with the other trend lines. The red dot(s) correspond to the highest point(s) and the blue dot(s) to the best performance during the period.



## IATA Operational Safety Audit (IOSA)

- First global industry standard for airline operational safety auditing. Assesses airline operational management and control systems
- Improves safety and reduces the number of redundant audits performed
- Audit standards developed in cooperation with regulatory bodies including US Federal Aviation Administration (FAA), Australia's Civil Aviation Safety Authority, Transport Canada, European Joint Aviation Authority
- IATA oversees the accreditation of audit and training organizations, continually develops standards and recommended practices and manages central databases
- IATA promotes the use of IOSA in national safety oversight programs: Bahrain, Brazil, Chile, Costa Rica, Egypt, Lebanon, Madagascar, Mexico, Panama, Syria, and Turkey have embedded the use of the IOSA Audit in their legislations
- As of 30 March 2009, IOSA is a condition of IATA membership
- As of 28 Feb 2015, 396 airlines are on the IOSA Registry including 251 IATA members and 145 non-members
- Industry savings of \$242 million in redundant audits (4400 audits avoided)
- IOSA has been ISO 9001:2008 registered

## Enhanced IOSA

Enhanced IOSA (E-IOSA) is the project under which IOSA-registered Operators will demonstrate improved internal assurance programs and under which the audit procedures are further improved. In Sep 2015, the E-IOSA provisions will become mandatory for all renewal audits and the pre-fix “Enhanced” will disappear.

The changes under E-IOSA are based on the following four pillars:

- Continuity: Airlines will have the responsibility for conducting on-going audits as an integral part of their internal quality assurance program
- Implementation: Internal audits conducted by airlines as well as the 24-month on-site renewal audit conducted by audit organizations will focus on ensuring the IOSA standards are implemented
- Reliability: Airlines will demonstrate the reliability and integrity of their internal quality systems, including trained and qualified auditors, by conducting on-going internal audits and producing a detailed conformance report
- Standardization: Audit methodologies and auditor qualification programs will result in a standardization of IOSA auditors and audit process

## Notes

1. All data in this report is extracted from the IATA Global Aviation Data Management platform.
2. IATA defines an accident as an event where ALL of the following criteria are satisfied:
  - Person(s) have boarded the aircraft with the intention of flight (either flight crew or passengers).
  - The intention of the flight is limited to normal commercial aviation activities, specifically scheduled/charter passenger or cargo service. Executive jet operations, training, maintenance/test flights are all excluded.
  - The aircraft is turbine powered and has a certificated Maximum Take-Off Weight (MTOW) of at least 5,700KG (12,540 lbs.).
  - The aircraft has sustained major structural damage exceeding \$ 1 million or 10% of the aircraft's hull reserve value, whichever is lower, or has been declared a hull loss.
3. A hull loss is an accident in which the aircraft is destroyed or substantially damaged and is not subsequently repaired for whatever reason including a financial decision of the owner.
4. The rates in this Safety Fact Sheet are based on the most accurate flight counts available to IATA at the time of production and historical rates may have changed slightly as actual sector counts replace the estimates.