# ACE LIMITED GLOBAL LOSS TRIANGLES SUPPLEMENT - 2012



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This report is for informational purposes only. It should be read in conjunction with documents filed by ACE Limited with the Securities and Exchange Commission, including the most recent Annual Report on Form 10-K and Quarterly Reports on Form 10-Q.

### **Cautionary Statement Regarding Forward-Looking Statements:**

Any forward-looking statements made in this document reflect the Company's current views with respect to future events and financial performance and are made pursuant to the safe harbor provisions of the Private Securities Litigation Reform Act of 1995. Such statements involve risks and uncertainties, which may cause actual results to differ materially from those set forth in these statements.

For example, the Company's forward-looking statements related to potential changes in actuarial methods and reserves could be affected by the frequency of unpredictable catastrophic events, actual loss experience which differs from the Company's assumptions, uncertainties in the reserving or settlement process, new theories of liability, coverage issues, judicial, legislative, regulatory and other governmental developments, litigation tactics and developments, the amount and timing of reinsurance recoverable, credit developments among reinsurers, pricing and policy term trends and actual market conditions and developments, as well as management's response to these factors, and other factors identified in the Company's filings with the Securities and Exchange Commission, including the Company's Annual Report on Form 10-K for the year ended December 31, 2012, the Company's quarterly reports on Form 10-Q, and in the Company's earnings press releases, which are available on the Company's website.

Readers are cautioned not to place undue reliance on these forward-looking statements, which speak only as of the dates on which they are made. The Company undertakes no obligation to publicly update or revise any forward-looking statements, whether as a result of new information, future events or otherwise.

# ACE Limited 2012 Global Loss Triangles | Global Loss Triangles Supplement

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### **Executive Summary**

This document forms the supplement to ACE's release of its Global Loss Triangles (GLT) as of December 31, 2012. This year is our tenth GLT release with the purpose of providing the reader with the opportunity to use their own judgment with respect to the adequacy of certain areas of our Property & Casualty (P&C) reserves and also providing greater insight into ACE's overall reserve balance and business in general. As discussed later in this document, our reserving approach is a comprehensive ground-up process using data at a detailed level that reflects the specific type and coverage of the diverse products written by our various operations. The aggregated data presented in this release is therefore a consolidation of the numerous individual loss reserve triangles that are analyzed by our actuarial staff. It is therefore difficult to prepare an aggregate disclosure that captures all of these aspects.

We advise that the inappropriate use of the aggregated data presented in this release may produce misleading results. However, we believe that with the requisite care and attention to analysis, the disclosure can be used by the reader to provide insight about ACE's loss reserves.

To assist the reader with their analysis, we have provided guidance where possible in the document on key assumptions that should be considered when performing an analysis. Please see Pages 16, 17-18, 23-24, and 28.

In compiling this year's release we have followed essentially the same format as released last year but we have also made some modest changes to the data. These changes reflect actions from foreign exchange adjustments and continued enhancements to the compilation process.

The GLT supplement is comprised of the following information:

- For direct business accident year (AY) triangles of a) net paid loss plus paid allocated loss adjustment expenses (ALAE) and b) net reported loss plus paid ALAE (i.e., excluding Incurred But Not Reported reserves (IBNR)) for the ten calendar years ending December 31, 2012.
- For reinsurance business treaty year (TY) triangles of a) net paid loss plus paid ALAE and b) net reported loss plus paid ALAE (i.e., excluding IBNR) for the ten calendar years ending December 31, 2012.
- Net earned premium for each of the ten accident/treaty years ending December 31, 2012.

The triangle data are provided in line groupings under three of ACE's four SEC reporting segments. The remaining segment is Life business. Life business reserves are not typically subject to analysis using triangular actuarial methodologies. The data associated with Life business is therefore not considered within the scope of the GLT release. The SEC reporting segments included are as follows:

- Insurance North American Segment (excluding Financial Solutions business)
  - Workers' Compensation (WC)
  - General Liability (GL)
  - Other Casualty
  - Non-Casualty
- Insurance Overseas General Segment
  - Casualty
  - · Non-Casualty
  - Personal Accident
- · Global Reinsurance Segment
  - Property
  - Non-Property

# ACE Limited 2012 Global Loss Triangles | Overview

# **Executive Summary (cont.)**

Furthermore, the GLT supplement also contains the following:

- A reconciliation of the GLT reserve balances with ACE's published GAAP reserve balance ending December 31, 2012.
- A reconciliation of the current data to that contained in the previous release.
- A discussion of some factors to consider when analyzing loss reserve triangles.
- Commentary highlighting aspects of the GLT triangles and their interpretations.
- Relevant discussion from our 2012 10-K addressing ACE's reserving process.

## ACE Limited 2012 Global Loss Triangles | Overview

# Reconciliation of GLT with GAAP December 31, 2012 Reserve Balances

The net reserves (Case plus IBNR) associated with the GLT can be reconciled back to ACE Limited's December 31, 2012 closing GAAP P&C net reserve balance as follows:

	(US	\$ millions)
GAAP Net P&C Reserve Balance at December 31, 2012	\$	26,547
Less: Financial Solutions <sup>1</sup>		1,391
Unallocated Loss Adjustment Expense (ULAE)		770
Bad Debt		351
Other <sup>2</sup>		424
Plus: Recoveries from retroactive reinsurance contracts <sup>3</sup>		184
GLT Net Reserve Balance at December 31, 2012	\$	23,795

The GLT Net Reserve Balance can be split as follows:	Case	IBNR	Reserves	% of GAAP Reserves
Accident Years 2003 through 2012	\$ 6,053	\$ 14,441	\$ 20,494	77%
Accident Years 2002 and prior	1,716	1,585	3,301	12%
	\$ 7,769	\$ 16,026	\$ 23,795	90%

The triangles are constructed to exclude the effects of shifting exchange rates. Loss and ALAE data denominated in foreign currencies are converted to U.S. dollars at December 31, 2012 exchange rates.

As indicated above, certain blocks of loss and ALAE reserves were excluded for the following reasons, found in Footnotes 1-3 below:

<sup>1.</sup> With respect to the Financial Solutions business, traditional actuarial methods such as loss development triangles are inappropriate for evaluating reserves. The book is made up of a relatively small number of large heterogeneous accounts, each account having its own unique terms. As a result, each account is reviewed and reserved for individually.

<sup>2.</sup> Includes other reserves for which loss development methods are not appropriate, or other items such as settlements and commutations.

<sup>3.</sup> The Global Loss Triangles are presented gross of retroactive reinsurance, which is consistent with the U.S. Statutory Schedule P treatment. In general, these treaties tend to distort the net loss history and prevent a useful analysis. ACE does not utilize this type of reinsurance with third parties in the normal course of business. The retroactive treaties we have on our books relate to acquisitions made by ACE, and the majority of the expected recoveries relate to accident years 1996 and prior. \$18 million of the total retroactive recoveries relate to the NICO Brandywine cover, which was purchased at the time of ACE's acquisition of the CIGNA P&C business. \$166 million relates to the ACE Westchester acquisition.

# GLT Reserves as % of GAAP Reserves – Historical Perspective

In US\$ millions

The table below shows an historical perspective of the GLT reserves as a percent of the corresponding GAAP reserves for ACE's current and four prior GLT releases. The reserves on Lines 1 and 2a are taken from the "Reserve Reconciliation" sheets for each of the years. The percentages shown on Line 2b are the GLT reserve amounts divided by the GAAP reserve amounts.

The percentage of GLT reserves to GAAP reserves in 2012 is 90% for all years combined and 77% for the latest ten years. The latest ten years as shown in the 2012 GLT release are 2003-2012.

	Accident/Treaty	GLT Reserves as % of GAAP Reserves Data ending Dec. 31 of:									
Reserve Type (\$millions)	Years		2012		2011		2010		2009		2008
1) GAAP Reserves	Total	\$	26,547	\$	25,875	\$	25,242	\$	25,038	\$	24,241
2a) GLT Reserves	Latest 10 Yrs Prior Yrs	\$ \$	20,494 3,301	\$	20,083 3,385	\$	19,422 3,522	\$	18,936 3,673	\$	18,405 3,778
	All Yrs	\$	23,795	\$	23,468	\$	22,944	\$	22,609	\$	22,183
2b) As % of GAAP Reserves	Latest 10 Yrs Prior Yrs		77% 12%		78% 13%		77% 14%		76% 15%		76% 16%
	All Yrs		90%		91%		91%		90%		92%

### **Reconciliation to Previous Release**

On the following pages we summarize the historical data changes by segment and accident/treaty year (2003-2011) at December 31, 2011 for paid loss, reported loss, and earned premium. The changes in paid losses and reported losses are the differences between the next to the last diagonal in the triangles from this release and the last diagonal in the corresponding triangles from last year's release. The impact associated with currency fluctuation is separated from other "miscellaneous" enhancements. Please see discussion below for more details.

As with prior releases of the GLTs, we reviewed the compilation process in detail, and have continued to identify opportunities to improve the quality and scope of the GLT.

The most significant changes in the GLT data arise from Insurance North American and are noted below.

A number of other enhancements are also reflected in the 2012 GLTs. Although these enhancements are relatively minor in the context of the overall reserves, we believe their inclusion provides an improved data set for the reader.

A discussion of the changes by reporting segment is included below.

### **Insurance North American**

A comparison of this year's GLT with the previous release shows paid losses increased by less than 1%, reported losses increased by less than 1%, and premiums increased by less than 1% across accident years 2003-2011 combined.

### Miscellaneous

Re-classification of net earned premium across all calendar years in one Insurance North American unit. Increased earned premium in Insurance North American Workers' Compensation by \$40 million and decreased earned premium for Insurance North American General Liability by \$40 million.

### Currency

Effect of restating historical values at December 31, 2012 exchange rates

### **Insurance Overseas General**

A comparison of this year's GLT with the previous release shows paid losses increased by 1%, reported losses increased by 1%, and premiums increased by 2% across accident years 2003-2011 combined.

### Miscellaneous

None

# Currency

Effect of restating historical values at December 31, 2012 exchange rates

### Global Re

A comparison of this year's GLT with the previous release shows paid losses increased by less than 1% and reported losses decreased by less than 1% over treaty years 2003-2011 combined. A comparison of the earned premium figures would show large increases as treaty years naturally advance towards being fully earned. Therefore we have not shown this comparison within the reconciliation schedules.

### Miscellaneous

None

### Currency

Effect of restating historical values at December 31, 2012 exchange rates

For future releases, we will continue to review the content and segmentation of the triangles to ensure that they remain a useful representation of our evolving business profile.

# Reconciliation to Previous Release – Insurance North American Workers' Compensation In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	162,461	0	346	162,807
2004	213,626	0	412	214,038
2005	330,847	0	436	331,283
2006	357,966	0	305	358,272
2007	288,028	0	344	288,372
2008	232,628	0	265	232,893
2009	166,595	0	122	166,717
2010	156,425	0	50	156,475
2011	45,664	0	4	45,669
Total	1,954,242	0	2,285	1,956,526

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	216,021	0	351	216,373
2004	287,567	0	417	287,983
2005	425,176	0	455	425,630
2006	462,511	0	369	462,880
2007	393,380	0	398	393,779
2008	361,245	0	476	361,721
2009	270,477	0	230	270,707
2010	258,680	0	217	258,896
2011	115,585	0	59	115,644
Total	2,790,641	0	2,972	2,793,613

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	620,461	778	761	622,000
2004	914,336	1,166	970	916,472
2005	1,269,405	1,984	1,030	1,272,419
2006	1,340,156	(15)	796	1,340,937
2007	1,267,117	2,468	804	1,270,390
2008	1,073,021	5,628	830	1,079,479
2009	967,902	3,582	434	971,917
2010	1,008,803	7,880	582	1,017,265
2011	864,664	14,216	277	879,157
Total	9,325,866	37,687	6,484	9,370,037

# Reconciliation to Previous Release - Insurance North American General Liability

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	612,441	15	1,820	614,275
2004	625,294	2	1,267	626,562
2005	888,470	30	1,315	889,816
2006	668,454	1	1,527	669,982
2007	849,210	185	1,374	850,769
2008	533,475	18	1,048	534,542
2009	292,303	110	582	292,995
2010	185,767	27	283	186,077
2011	59,756	49	98	59,903
Total	4,715,170	436	9,314	4,724,921

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	644,021	15	1,897	645,932
2004	678,142	2	1,329	679,473
2005	971,329	30	1,553	972,912
2006	770,348	1	1,828	772,177
2007	1,056,066	185	1,824	1,058,075
2008	708,947	18	2,209	711,174
2009	451,810	110	1,406	453,327
2010	298,374	27	540	298,942
2011	136,082	49	267	136,397
Total	5,715,120	436	12,853	5,728,409

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	1,292,151	(2,898)	4,926	1,294,179
2004	1,593,254	(3,130)	5,597	1,595,721
2005	2,058,758	(4,265)	6,527	2,061,020
2006	2,243,431	(1,296)	7,773	2,249,908
2007	2,224,142	(6,760)	7,947	2,225,329
2008	2,107,132	(6,142)	7,024	2,108,014
2009	2,074,273	(4,957)	6,433	2,075,749
2010	2,085,148	(9,005)	5,784	2,081,926
2011	1,924,660	(3,174)	6,440	1,927,926
Total	17,602,946	(41,626)	58,452	17,619,772

# Reconciliation to Previous Release – Insurance North American Other Casualty

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	362,193	0	1,247	363,439
2004	373,774	0	1,467	375,241
2005	444,000	0	1,059	445,058
2006	400,818	0	1,027	401,845
2007	398,156	0	1,348	399,504
2008	639,230	0	759	639,989
2009	343,785	0	1,005	344,790
2010	409,688	0	590	410,278
2011	286,197	0	280	286,477
Total	3,657,840	0	8,782	3,666,622

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	355,373	0	1,277	356,650
2004	380,258	0	1,538	381,797
2005	437,408	0	1,175	438,583
2006	415,102	0	1,121	416,223
2007	430,843	0	1,995	432,838
2008	688,353	0	1,247	689,600
2009	405,869	0	1,714	407,583
2010	494,306	0	978	495,283
2011	453,496	0	687	454,183
Total	4,061,008	0	11,732	4,072,740

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	697,189	(76)	1,808	698,922
2004	612,038	(65)	2,507	614,480
2005	774,461	(60)	2,376	776,778
2006	842,257	(54)	2,232	844,435
2007	933,716	(51)	2,409	936,074
2008	992,411	(45)	2,435	994,800
2009	859,355	(34)	2,214	861,535
2010	856,324	(11)	1,585	857,898
2011	910,356	4	1,626	911,986
Total	7,478,108	(392)	19,191	7,496,907

# Reconciliation to Previous Release – Insurance North American Non-Casualty

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	843,238	0	2,230	845,469
2004	880,938	0	1,386	882,323
2005	1,083,606	0	5,476	1,089,081
2006	814,629	0	4,000	818,628
2007	830,885	0	1,954	832,839
2008	1,876,294	15	2,147	1,878,456
2009	1,162,167	0	2,652	1,164,819
2010	1,170,443	1	3,769	1,174,212
2011	1,605,599	29	1,440	1,607,067
Total	10,267,798	45	25,054	10,292,896

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	842,579	0	2,226	844,805
2004	879,270	0	1,383	880,653
2005	1,084,711	0	5,479	1,090,190
2006	826,521	0	4,012	830,533
2007	832,289	0	1,962	834,251
2008	1,887,374	15	2,188	1,889,578
2009	1,178,694	0	2,902	1,181,596
2010	1,212,969	1	4,393	1,217,364
2011	2,067,741	29	2,831	2,070,601
Total	10,812,149	45	27,377	10,839,571

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	1,400,886	(84)	4,859	1,405,661
2004	1,944,251	(86)	4,710	1,948,875
2005	1,510,852	(89)	2,354	1,513,117
2006	1,523,811	(88)	6,965	1,530,688
2007	1,790,563	(92)	5,119	1,795,590
2008	2,359,187	(95)	5,614	2,364,706
2009	2,403,398	(80)	5,358	2,408,677
2010	2,261,205	(74)	3,121	2,264,252
2011	3,087,710	(69)	3,801	3,091,442
Total	18,281,863	(757)	41,902	18,323,008

# Reconciliation to Previous Release - Insurance Overseas General Casualty

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	705,596	0	590	706,187
2004	661,066	0	(1,460)	659,606
2005	767,740	0	(245)	767,495
2006	748,578	0	(1,112)	747,466
2007	854,589	0	(3,477)	851,112
2008	764,939	0	(3,687)	761,251
2009	654,554	0	(5,407)	649,147
2010	487,072	0	(10,234)	476,838
2011	197,952	0	(4,986)	192,966
Total	5,842,086	0	(30,018)	5,812,068

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	752,143	0	1,744	753,887
2004	682,334	0	(1,527)	680,807
2005	827,813	0	3,491	831,304
2006	830,810	0	2,151	832,961
2007	997,145	0	265	997,410
2008	979,887	0	(2,373)	977,514
2009	862,789	0	(3,199)	859,591
2010	713,117	0	(7,074)	706,042
2011	451,941	0	(6,616)	445,325
Total	7,097,978	0	(13,138)	7,084,840

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	1,731,578	0	15,553	1,747,130
2004	1,868,363	0	20,133	1,888,497
2005	1,956,697	0	18,083	1,974,780
2006	1,980,385	0	15,781	1,996,166
2007	1,855,217	0	12,071	1,867,288
2008	1,912,591	0	12,328	1,924,919
2009	1,865,606	0	8,926	1,874,532
2010	1,901,970	0	12,632	1,914,602
2011	1,829,485	0	26,729	1,856,214
Total	16,901,891	0	142,236	17,044,127

# Reconciliation to Previous Release – Insurance Overseas General Non-Casualty

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	520,208	0	8,075	528,284
2004	602,521	0	7,537	610,058
2005	717,080	0	9,678	726,758
2006	483,083	0	7,353	490,436
2007	569,591	0	9,915	579,505
2008	615,750	0	7,929	623,679
2009	495,102	0	7,807	502,909
2010	545,312	0	11,067	556,378
2011	397,238	0	4,610	401,848
Total	4,945,884	0	73,971	5,019,855

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	522,408	0	7,786	530,194
2004	607,768	0	6,456	614,224
2005	731,199	0	9,912	741,111
2006	497,518	0	6,479	503,997
2007	596,228	0	11,556	607,784
2008	670,694	0	8,783	679,477
2009	568,138	0	9,496	577,633
2010	754,239	0	13,826	768,066
2011	790,658	0	13,103	803,761
Total	5,738,850	0	87,397	5,826,247

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	1,241,746	0	16,416	1,258,162
2004	1,340,098	0	18,296	1,358,394
2005	1,262,141	0	17,047	1,279,187
2006	1,209,708	0	14,287	1,223,994
2007	1,200,512	0	11,159	1,211,671
2008	1,212,230	0	9,368	1,221,598
2009	1,202,524	0	12,148	1,214,672
2010	1,289,091	0	14,334	1,303,425
2011	1,386,028	0	30,271	1,416,299
Total	11,344,076	0	143,326	11,487,402

# Reconciliation to Previous Release – Insurance Overseas General Personal Accident In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	479,751	1	11,698	491,449
2004	460,715	0	10,431	471,146
2005	488,849	0	11,516	500,365
2006	544,924	0	13,669	558,593
2007	604,307	0	14,979	619,286
2008	665,147	0	18,745	683,892
2009	702,133	0	20,655	722,788
2010	665,387	(1)	20,031	685,418
2011	392,234	0	15,469	407,704
Total	5,003,449	0	137,193	5,140,642

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	483,209	1	12,063	495,273
2004	466,963	0	10,530	477,492
2005	490,432	0	11,586	502,018
2006	550,511	0	13,772	564,283
2007	612,679	0	15,189	627,867
2008	678,440	0	18,908	697,348
2009	727,989	0	21,056	749,044
2010	732,661	(1)	20,682	753,343
2011	535,510	0	16,164	551,673
Total	5,278,393	0	139,949	5,418,341

Accident Year	Previous Release	Miscellaneous	Currency	Current Release
2003	1,268,871	0	28,163	1,297,034
2004	1,401,319	0	31,116	1,432,435
2005	1,535,651	0	33,511	1,569,162
2006	1,733,680	0	41,023	1,774,703
2007	1,882,243	0	41,548	1,923,791
2008	1,960,080	0	49,035	2,009,115
2009	1,961,639	1	62,387	2,024,026
2010	2,021,001	0	39,747	2,060,748
2011	2,140,289	(1)	66,161	2,206,449
Total	15,904,772	0	392,691	16,297,463

# Reconciliation to Previous Release - Global Re Property

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Treaty Year	Previous Release	Miscellaneous	Currency	Current Release
2003	120,407	0	67	120,474
2004	434,497	0	(3,086)	431,411
2005	584,892	0	281	585,174
2006	100,157	0	(160)	99,997
2007	105,725	0	1,220	106,944
2008	204,777	0	4	204,782
2009	95,077	0	438	95,515
2010	191,788	0	7,048	198,836
2011	6,292	0	890	7,182
Total	1,843,614	0	6,701	1,850,315

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Treaty Year	Previous Release	Miscellaneous	Currency	Current Release
2003	121,330	0	55	121,386
2004	437,466	0	(3,141)	434,326
2005	591,837	0	242	592,079
2006	102,348	0	(192)	102,156
2007	112,114	0	1,261	113,375
2008	215,436	0	(8)	215,428
2009	107,242	0	582	107,825
2010	259,721	0	8,608	268,330
2011	62,316	0	4,124	66,440
Total	2,009,812	0	11,532	2,021,344

# Reconciliation to Previous Release - Global Re Non-Property

In US\$ thousands

# Cumulative Paid Loss + Paid ALAE at December 31, 2011

Treaty Year	Previous Release	Miscellaneous	Currency	Current Release
2003	312,346	0	(986)	311,361
2004	348,864	0	381	349,245
2005	386,726	0	502	387,228
2006	307,466	0	(2,261)	305,206
2007	210,884	0	(1,511)	209,373
2008	165,917	0	78	165,995
2009	116,524	0	(94)	116,430
2010	98,674	0	(62)	98,612
2011	12,488	0	140	12,628
Total	1,959,890	0	(3,812)	1,956,077

# Cumulative Reported Loss + Paid ALAE at December 31, 2011

Treaty Year	Previous Release	Miscellaneous	Currency	Current Release
2003	355,170	0	(479)	354,691
2004	403,871	0	1,095	404,966
2005	454,864	0	1,106	455,971
2006	396,705	0	(1,285)	395,420
2007	309,058	0	(615)	308,442
2008	264,835	0	1,266	266,101
2009	203,476	0	1,029	204,505
2010	196,281	0	805	197,087
2011	50,203	0	664	50,867
Total	2,634,463	0	3,586	2,638,050

### **Reserve Evaluation Considerations**

We have actuarial staff in each of our operating segments who track insurance reserves and regularly evaluate the levels of loss reserves, taking into consideration factors that may impact the ultimate loss reserves. This is accomplished not only by employing a variety of actuarial methods, but also by applying judgment to help quantify the impact of these variables.

Considerable caution should be used when attempting to analyze reserve adequacy based on aggregated triangles. It is rare that the data is so consistent, homogeneous, and static that a valid analysis is possible without exercising substantial judgment. Results can be distorted by both industry-wide and company-specific factors. Below is a non-exhaustive list of possible pitfalls:

- Paid and reported chain ladder loss development methods can be particularly volatile at early evaluation points
  for more recent accident years, especially for longer-tailed lines. In those situations, the expected percentage of
  paid (reported) claims is low, and so small differences between actual and expected claims can produce large
  differences in projected ultimate losses. In such cases, we would recommend relying on an expected loss technique. One expected loss technique not addressed in Sholom Feldblum's paper (see below) is the BornhuetterFerguson method <sup>(1)</sup>, which can be modified to incorporate information on changing premium rates in an
  analysis of reserve adequacy.
- Certain methods for judging reserve adequacy assume that expected loss ratios (ELRs) do not change over time. In fact, ELRs can change substantially from year to year due to many reasons (e.g., change in rates, change in mix of business, etc.). In recent years, a soft market has produced lower rates and some loosening of terms and conditions for some lines, which should result in higher ELRs. If these rate changes are not taken into consideration, indicated reserves will most likely be understated, or explained another way, any resulting indicated reserve redundancies/deficiencies may be misleading. While we consider ACE's actual rate change information to be proprietary, there are a number of public sources that can be used as a proxy to adjust loss ratios to a more appropriate level. These sources include, but are not limited to, the Council of Insurance Agents & Brokers (CIAB) Commercial P&C Market Survey, Lloyd's of London Premium Rating Index, and Towers Watson Directors & Officers Liability Survey.
- Changes in inflation rates distort any reserve analysis based on loss triangles. If expected future inflation is lower (higher) than historical inflation rates, needed reserves may be overstated (understated) as a result, and appropriate adjustments should be made. If inflation rates are stable over time, no adjustment may be required.
- Many other changes and distortions (e.g., change in reinsurance structure, large losses, change in settlement
  rates, change in mix of business (e.g., primary vs excess; or by state/country), change in volume, etc.) can
  skew the results of a reserve analysis based on aggregated triangles. These distortions are not always easily
  corrected for and the reasonableness of the final projection should consider the possible influence of these factors.
- Contained in the triangles there may be instances of modest negative case reserves (calculated by taking the difference between the reported and paid at a given development age for a particular accident year). This is typically due to timing differences associated primarily with ceded reinsurance. In our view, these negative case reserves will not significantly distort an analysis nor detract from the usefulness of the information provided.

There are a number of valid prospective tests of reserve adequacy that can be performed based on consolidated triangles. One excellent source of information on the various methods is Completing and Using Schedule P by Sholom Feldblum <sup>(2)</sup>. It is strongly recommended that anyone attempting to analyze reserves presented in loss triangles be familiar with the methods detailed in the section entitled "Loss Reserve Adequacy Testing – Prospective Valuation."

- (1) Publicly available on the Casualty Actuarial Society's web site at the following address http://www.casact.org/pubs/proceed/proceed72/72181.pdf
- (2) Publicly available on the Casualty Actuarial Society's web site at the following address http://www.casact.org/pubs/forum/02fforum/02ff353.pdf

### **Highlights**

### Insurance North American Segment

The Insurance North American segment is comprised of business written by ACE USA, ACE Westchester, ACE Bermuda, ACE Commercial Risk Services, ACE Agriculture and ACE Private Risk Services. ACE USA is our U.S.-based retail operation writing primarily specialty commercial lines through national and regional brokers. Included in this unit are ACE Canada – a writer of commercial lines and accident & health (A&H) business throughout Canada, and ACE Financial Solutions (AFS) – a writer of large risk management transactions including loss portfolio transfers (LPTs). ACE Westchester is our U.S.-based wholesale operation writing specialty commercial lines produced by wholesale and excess & surplus (E&S) distribution channels. ACE Bermuda writes high excess property and liability coverage including products liability and directors and officers (D&O), principally with Side A/CODA coverage for U.S. exposures, and political risk. Included in this unit is ACE Financial Solutions International (FSI) – now in runoff, which was a writer of large structured transactions including LPTs.

ACE Commercial Risk Services is our U.S.-based operation targeting primarily small to middle market commercial lines risks through a variety of distribution channels including programs. ACE Agriculture is our U.S.-based farm, crop and commercial agriculture insurance operation which includes the Rain and Hail business and the Penn Millers business which, although acquired on November 30, 2011, includes the historical data for all accident years in the 2012 GLTs. ACE Private Risk Services is a writer of personal lines coverages with a target market of affluent and high net worth insureds. All of the Insurance North American operations have been included in the loss triangles with the exception of AFS and FSI, where we have excluded these businesses since the accounting treatment of LPTs would distort the paid and incurred loss development patterns.

There are three important points with regards to the "Prior" line. First, the "Prior" line shown here is gross of retroactive reinsurance (NICO treaties). Second, it would be incorrect to apply a single loss development factor to the "Prior" line, as it does not represent a single accident year but the total activity in accident years 2002 and prior. Third, all of ACE's Asbestos and Environmental exposure is contained in the "Prior" line of the General Liability and Other Casualty triangles. Development factors derived from loss triangles are inappropriate for analysis of this exposure.

### Insurance North American - Workers' Compensation

The U.S. Statutory Schedule P filings for workers' compensation are net of two separate internal reinsurance transactions between the ACE American Pool and other ACE entities which distort the loss development shown in Schedule P. These transactions have been unwound in the loss triangles included in this supplement in order to provide a more complete representation of the U.S.-based WC business.

The WC line has experienced shifts in mix by business type during the ten year experience period included in the loss triangles. In the earliest year, 2003, the market was hardening and our national account business's premium volume was growing significantly. Approximately 65% of total net earned premium (NEP) was from high deductible business. In 2004, we launched a small workers' compensation initiative, offering only first dollar cost coverage in select states including California. As a result, the percentage of first dollar exposure business grew rapidly from 2004 to 2006, but then decreased in volume from 2007 onwards. The mix of premium with first dollar exposure, guaranteed cost and loss sensitive, is about 30% of the NEP in 2012.

Throughout the experience period shown in the loss triangles, our WC exposure has been heavily concentrated in risk management business which includes high deductible policies, loss sensitive business (i.e. retro policies) and business fronted for captives. NEP for these risk management accounts have significant administrative expenses and unallocated loss expenses components. As a result, the loss and ALAE component of the NEP is much lower than primary or guaranteed cost policies making loss projection methods that rely on expected loss ratios based on industry experience (or prior year loss ratios) inappropriate.

### Highlights (cont.)

### Insurance North American – General Liability

The triangles consist of primary general liability, excess liability, D&O, and professional liability exposures. The primary general liability and excess liability exposures represent the largest part of the exposures and are typically written in the U.S. on an occurrence form, while the D&O and professional liability exposures are written on a claims made form. ACE Bermuda writes excess liability on a "claims first reported" form, which means that coverage is triggered when news of a potential claim is received, potentially well in advance of a claim being filed. Bermuda typically writes at high attachment points, particularly on its excess liability book. The nature of ACE Bermuda excess liability claims, low frequency due to high attachments with large policy limits, creates a volatile reporting pattern. When claim activity does occur, it produces abnormal volatility in the loss triangles at later ages within an accident year due to the complex nature of the underlying claim. (An example of such activity occurred during the 2010 calendar year where development on the Bermuda portfolio contributed to the high case incurred activity in the 2005 and 2007 accident years).

Finally, in ACE's U.S. Statutory Schedule P, warranty business appears in Other Liability – Occurrence. The characteristics of warranty contracts are different from standard general liability exposures (i.e. claims are settled quickly, case reserves are generally not established, and premium earnings are deferred over the life of the contract rather than earning premium and recording IBNR reserves for future claims, which is consistent with industry practices). Therefore, we have removed data associated with warranty business from the triangles.

### Insurance North American – Other Casualty

The triangles consist of the non-WC and non-GL casualty lines of business such as automobile liability, commercial multi-peril (CMP; includes both property and liability), homeowners, political risk, marine, and aviation. The paid and reported data are impacted by some catastrophe loss activity primarily on CMP exposures, homeowners exposures and to a lesser extent, marine exposures. The ultimate loss ratios for the 2004, 2005, 2008, 2011, and 2012 years will be impacted by natural catastrophes. This product line includes the majority of the business written by our Private Risk Services operation.

### Insurance North American – Non-Casualty

This business represents first party product lines which are short-tailed in nature. The early years are predominantly lines such as property, inland marine, fidelity and surety. During this ten year period, our accident & health business grew substantially. In addition with the acquisition of the Rain & Hail business, the historical loss development experience of this business has been added to our triangles. This has dramatically increased the mixture of crop hail business within this triangle. By 2012, our crop hail business and our accident and health business made up 65% of NEP, up from 48% in 2003. This segment is also impacted by natural catastrophes in the same years as outlined above in Other Casualty.

# Workers' Compensation

As of 12/31/12 In US\$ thousands

# Paid Loss + Paid ALAE Triangle

		Age in months										
Accident Year	t 12	24	36	48	60	72	84	96	108	120		
Prior	0	169,504	317,762	439,060	573,241	723,040	828,374	909,329	1,030,604	1,144,603		
2003	40,319	61,350	83,846	101,014	121,139	134,616	144,005	158,409	162,807	169,877		
2004	71,180	100,172	131,694	161,961	177,025	193,734	206,146	214,038	225,834			
2005	61,219	151,361	216,052	253,664	291,744	312,077	331,283	352,381				
2006	74,157	171,154	232,638	286,635	330,547	358,272	381,703					
2007	67,619	147,363	213,339	252,734	288,372	326,330						
2008	65,097	140,593	190,377	232,893	278,182							
2009	49,926	121,937	166,717	202,218								
2010	63,316	156,475	221,068									
2011	45,669	114,854										
2012	32,941											

# Reported Loss + Paid ALAE Triangle

	Age in months										
Accider Year	nt 12	24	36	48	60	72	84	96	108	120	
Prior	1,267,773	1,426,261	1,534,313	1,540,272	1,654,241	1,778,765	1,869,772	1,908,262	1,994,301	2,043,682	
2003	102,626	119,168	126,952	150,529	176,813	185,240	199,605	210,477	216,373	223,567	
2004	162,111	175,670	202,206	228,950	241,377	266,994	276,440	287,983	295,686		
2005	139,499	263,808	320,670	363,465	396,895	408,389	425,630	451,261			
2006	172,315	302,181	362,483	415,311	440,684	462,880	489,896				
2007	159,293	272,019	337,079	364,651	393,779	422,755					
2008	155,283	262,539	315,379	361,721	394,750						
2009	135,695	228,586	270,707	306,077							
2010	154,878	258,896	330,932								
2011	115,644	207,110									
2012	80,147										

Accident Year	NEP
2003	622,000
2004	916,472
2005	1,272,419
2006	1,340,937
2007	1,270,390
2008	1,079,479
2009	971,917
2010	1,017,265
2011	879,157
2012	795,229

# **General Liability**

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

		Age in months										
Accident Year	t 12	24	36	48	60	72	84	96	108	120		
Prior	0	388,926	1,146,826	1,509,422	1,832,241	2,052,156	2,428,070	2,651,607	2,928,404	3,226,638		
2003	42,421	206,659	296,101	327,329	373,738	477,011	512,662	620,790	614,275	622,431		
2004	67,593	176,516	274,852	371,225	440,276	517,877	582,675	626,562	649,408			
2005	62,516	201,405	330,279	492,272	596,506	834,454	889,816	942,118				
2006	45,953	151,515	292,084	430,165	560,123	669,982	732,920					
2007	46,584	165,346	322,267	591,677	850,769	1,000,082						
2008	42,338	160,666	348,682	534,542	680,462							
2009	33,027	149,316	292,995	464,314								
2010	47,403	186,077	332,016									
2011	59,903	216,214										
2012	42,624											

# Reported Loss + Paid ALAE Triangle

		Age in months										
Accident Year	12	24	36	48	60	72	84	96	108	120		
Prior	751,299	1,351,368	1,950,714	2,159,985	2,377,722	2,438,930	2,806,480	3,000,031	3,261,616	3,517,963		
2003	78,454	297,882	471,582	486,895	511,934	570,285	593,688	685,961	645,932	654,481		
2004	175,980	234,050	326,734	450,641	533,342	619,055	662,124	679,473	696,378			
2005	144,188	343,704	449,062	600,720	788,291	914,693	972,912	1,013,749				
2006	140,735	284,914	425,880	600,806	682,121	772,177	820,138					
2007	137,977	324,990	537,009	826,296	1,058,075	1,118,516						
2008	144,116	352,126	560,417	711,174	825,059							
2009	142,738	318,210	453,327	604,155								
2010	129,100	298,942	518,788									
2011	136,397	339,516										
2012	107,678											

Accident Year	NEP
2003	1,294,179
2004	1,595,721
2005	2,061,020
2006	2,249,908
2007	2,225,329
2008	2,108,014
2009	2,075,749
2010	2,081,926
2011	1,927,926
2012	2,001,254

# Other Casualty

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

		Age in months										
Acciden Year	t 12	24	36	48	60	72	84	96	108	120		
Prior	0	157,142	343,330	585,542	713,456	814,559	900,275	1,007,047	1,118,857	1,234,397		
2003	128,687	193,363	233,526	275,888	341,756	352,102	358,710	362,099	363,439	363,721		
2004	142,833	236,665	281,911	319,721	345,730	359,829	367,321	375,241	379,231			
2005	142,241	249,722	315,444	371,413	412,643	441,386	445,058	449,929				
2006	118,186	239,328	305,498	356,491	388,015	401,845	408,628					
2007	114,668	244,763	325,453	374,462	399,504	433,042						
2008	225,714	471,555	571,052	639,989	677,497							
2009	122,506	281,696	344,790	374,414								
2010	222,243	410,278	487,994									
2011	286,477	510,277										
2012	230,386											

# Reported Loss + Paid ALAE Triangle

					Age in	months				
Acciden Year	t 12	24	36	48	60	72	84	96	108	120
Prior	483,684	403,714	524,442	855,929	951,066	1,034,368	1,118,883	1,332,461	1,404,318	1,452,115
2003	202,941	240,995	266,936	303,370	348,767	365,267	360,193	358,413	356,650	357,075
2004	244,066	290,806	344,674	361,990	373,969	374,857	379,395	381,797	384,913	
2005	339,342	360,559	392,856	412,780	431,606	443,859	438,583	438,507		
2006	253,645	337,511	373,380	394,156	409,132	416,223	421,743			
2007	247,815	348,949	393,411	427,645	432,838	455,037				
2008	411,899	613,037	653,070	689,600	711,802					
2009	255,296	370,045	407,583	417,660						
2010	373,605	495,283	550,082							
2011	454,183	618,879								
2012	392,175									

Accident Year	NEP
2003	698,922
2004	614,480
2005	776,778
2006	844,435
2007	936,074
2008	994,800
2009	861,535
2010	857,898
2011	911,986
2012	987,492

# Non-Casualty

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

		Age in months											
Accider Year	nt 12	24	36	48	60	72	84	96	108	120			
Prior	0	101,801	85,489	109,148	152,605	204,919	209,329	212,505	249,956	421,878			
2003	595,911	763,318	855,845	866,287	824,805	835,504	837,035	842,928	845,469	841,544			
2004	618,238	858,572	875,221	873,496	879,389	882,934	882,262	882,323	881,439				
2005	613,906	873,451	1,008,184	1,049,416	1,072,386	1,081,121	1,089,081	1,110,721					
2006	546,206	768,773	813,981	824,944	832,054	818,628	818,672						
2007	617,062	787,687	815,320	826,382	832,839	834,820							
2008	925,905	1,806,963	1,847,422	1,878,456	1,882,572								
2009	775,650	1,118,435	1,164,819	1,182,473									
2010	874,260	1,174,212	1,218,771										
2011	1,607,067	2,105,354											
2012	1,933,320												

# Reported Loss + Paid ALAE Triangle

		Age in months											
Acciden Year	t 12	24	36	48	60	72	84	96	108	120			
Prior	95,869	188,907	146,431	197,010	264,689	239,450	239,287	223,266	243,383	436,247			
2003	724,486	848,618	885,171	879,081	831,142	841,850	839,954	843,206	844,805	841,217			
2004	851,799	901,574	884,371	878,858	883,346	881,842	882,038	880,653	877,786				
2005	891,632	1,003,610	1,049,176	1,070,752	1,080,124	1,082,832	1,090,190	1,113,821					
2006	754,530	805,570	834,641	832,290	834,851	830,533	830,377						
2007	844,507	827,137	829,193	831,134	834,251	835,884							
2008	1,608,974	1,878,344	1,878,258	1,889,578	1,895,018								
2009	1,168,670	1,186,442	1,181,596	1,186,344									
2010	1,090,997	1,217,364	1,234,565										
2011	2,070,601	2,205,751											
2012	2,249,024												

Accident Year	NEP
2003	1,405,661
2004	1,948,875
2005	1,513,117
2006	1,530,688
2007	1,795,590
2008	2,364,706
2009	2,408,677
2010	2,264,252
2011	3,091,442
2012	3,091,274

### **Highlights**

### Insurance Overseas General Segment

The Insurance Overseas General segment is comprised of business written by ACE International, ACE Global Markets (AGM), and Combined Insurance. The historical data for Overseas General includes the international Personal Accident business of Combined Insurance, which was acquired on April 1, 2008. Combined Insurance data is included for all accident years.

ACE International operates in over 50 countries across Europe, Asia, Latin America, Africa, and the Middle East. Roughly 40% of ACE International's net earned premium (excluding Combined Insurance) is generated by European accounts. AGM operates within the London market and writes both U.S. and internationally exposed business, predominately short-tailed. In accordance with standard Lloyd's market practice, ACE analyzes its AGM business on a year-of-account basis rather than on an accident year basis. In order to provide data on an accident year basis, it was necessary to make a number of assumptions, which have remained the same this year.

Overseas General premiums are split approximately 65% non-casualty/personal accident and 35% casualty.

We have compiled the triangles in original currency and then converted to US\$ at December 31, 2012 exchange rates for all historical data. This approach removes the impact of currency fluctuations from historical development trends.

### Insurance Overseas General - Casualty

The Casualty Class is comprised of non-U.S. general liability, employers liability, and professional liability exposures as well as shorter-tailed casualty exposures such as automobile liability, marine, aviation, surety, and political risk. Exposures are located around the world, including Europe, Latin America, and Asia. There is some U.S. exposure in the Casualty Class from multinational accounts. Approximately 30% of the casualty premiums are general liability exposures (split 75% primary and 25% excess). 10% of the casualty premium is for D&O, while 20% is for other professional liability exposures. Most of this business is primary and tends to be quicker developing than comparable exposures in the U.S.

Rates for general liability and professional liability were particularly strong through 2004 followed by a gradual weakening between 2005 and 2007 and leveling off toward the end of 2008. Overall, casualty rates remained largely flat from 2009 to 2012.

Approximately 40% of the casualty premium is shorter-tailed automobile, marine, aviation, and political risk exposures. Marine is mostly short-tailed cargo (both inland and ocean) and hull risks with some exposure to marine liability business. The aviation line includes a broad range of aviation risks from longer-tailed aviation products and airline/airport liability to shorter-tailed airline hull. Automobile liability included in this category is substantially personal lines business, with a large concentration in Japan and Southeast Asia, as well as smaller portions in Latin America. With the exception of aviation, these lines tend to have had less volatile rate changes and are shorter-tailed than general and professional liability lines.

### Insurance Overseas General - Non-Casualty

The Non-Casualty Class is comprised of fire, construction, and energy exposures, as well as a growing personal lines book, which includes specialty exposures such as cell phones, laptops, and Japanese renter's insurance. Generally, rates for these classes have declined from 2003 through 2008 with the exception of North American exposures for AGM. Rates on these lines have remained largely flat from 2009 to 2012, again with the exception of some lines within AGM where rates increased in 2009, leveled off in 2010, and increased again in 2011 and 2012. Approximately 45% of the ACE International non-casualty book originates from Europe. In general, the property lines have relatively stable paid and reporting patterns although losses from Hurricanes Katrina, Rita, and Wilma in 2005 on the AGM portfolio of U.S. exposures will have some impact on the ultimate loss ratio. The

# ACE Limited 2012 Global Loss Triangles | Insurance Overseas General Segment

# Highlights (cont.)

same is true for the 2008 year where losses will be impacted by catastrophes, primarily Hurricane Ike, and the 2010 and 2011 years where losses will be impacted by major worldwide catastrophes, such as the Chilean earthquake, floods in Australia, earthquakes in New Zealand, and the Japanese earthquake.

### Insurance Overseas General – Personal Accident

The Personal Accident Class is comprised of low limit travel, credit, disability and accident accounts sold through various marketing channels. The Class has experienced significant growth since 2003 through increased solicitation and additional marketing efforts. As noted above, the Overseas General Personal Accident line includes the Combined Insurance Personal Accident data. Average rate levels for this business have been relatively stable since 2004 and should have little impact on expected loss ratios.

# ACE Limited 2012 Global Loss Triangles | Insurance Overseas General

# Casualty

As of 12/31/12 in US\$ thousands

Paid Loss + Paid ALAE Triangle

		Age in months											
Acciden Year	t 12	24	36	48	60	72	84	96	108	120			
Prior	0	364,466	640,528	882,073	1,141,269	1,249,821	1,342,539	1,426,392	1,507,049	1,557,665			
2003	187,895	342,773	424,759	497,209	570,620	623,726	662,236	698,611	706,187	721,873			
2004	173,549	370,572	462,152	531,678	577,156	618,252	640,544	659,606	667,477				
2005	193,817	371,824	490,455	585,649	649,400	730,221	767,495	789,556					
2006	225,979	428,296	564,907	646,242	718,862	747,466	774,644						
2007	235,252	481,540	638,689	764,417	851,112	900,864							
2008	245,881	499,559	623,673	761,251	873,639								
2009	256,288	511,068	649,147	724,962									
2010	260,113	476,838	617,912										
2011	192,966	419,191											
2012	214,616												

# Reported Loss + Paid ALAE Triangle

	Age in months											
Accider Year	nt 12	24	36	48	60	72	84	96	108	120		
Prior	1,025,682	1,361,649	1,507,291	1,598,515	1,636,361	1,686,543	1,678,262	1,696,222	1,718,521	1,752,420		
2003	371,353	520,762	603,733	657,731	720,797	734,736	752,431	755,904	753,887	764,717		
2004	367,706	581,166	637,379	658,248	676,314	679,214	678,835	680,807	680,851			
2005	405,008	592,698	712,028	761,744	792,681	822,244	831,304	831,302				
2006	448,090	638,930	755,151	803,402	818,272	832,961	835,743					
2007	512,846	769,822	873,557	917,032	997,410	1,012,107						
2008	526,016	763,869	883,230	977,514	1,056,534							
2009	515,507	776,852	859,591	936,358								
2010	554,386	706,042	798,121									
2011	445,325	636,873										
2012	474,863											

Accident Year	NEP
2003	1,747,130
2004	1,888,497
2005	1,974,780
2006	1,996,166
2007	1,867,288
2008	1,924,919
2009	1,874,532
2010	1,914,602
2011	1,856,214
2012	1,873,329

# ACE Limited 2012 Global Loss Triangles | Insurance Overseas General

# Non-Casualty

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

		Age in months											
Acciden Year	t 12	24	36	48	60	72	84	96	108	120			
Prior	0	121,747	161,864	225,633	246,591	266,721	271,179	274,721	277,613	284,969			
2003	152,224	380,840	467,204	498,387	515,749	518,143	526,168	527,663	528,284	525,488			
2004	203,194	461,409	542,968	572,930	589,677	597,201	603,905	610,058	611,093				
2005	204,088	498,748	633,038	696,214	720,788	725,657	726,758	731,293					
2006	164,358	368,664	446,042	470,641	481,987	490,436	489,199						
2007	195,460	436,334	535,454	567,299	579,505	587,790							
2008	219,060	487,062	570,861	623,679	642,774								
2009	193,062	426,739	502,909	553,216									
2010	258,560	556,378	690,172										
2011	401,848	807,516											
2012	279,246												

# Reported Loss + Paid ALAE Triangle

					Age in r	months				
Acciden Year	t 12	24	36	48	60	72	84	96	108	120
Prior	330,691	332,178	315,110	332,272	319,960	326,466	321,740	318,646	320,033	318,870
2003	415,115	513,067	535,572	538,044	532,996	530,975	532,148	531,409	530,194	523,543
2004	502,315	601,845	611,556	609,478	614,139	613,843	611,737	614,224	614,405	
2005	580,414	733,706	739,771	746,094	748,896	746,053	741,111	744,214		
2006	395,970	500,214	513,379	509,386	505,083	503,997	499,295			
2007	490,418	618,449	615,328	612,098	607,784	605,129				
2008	572,750	677,601	678,104	679,477	677,210					
2009	487,101	594,770	577,633	580,212						
2010	581,553	768,066	793,779							
2011	803,761	1,048,397								
2012	576,644									

Accident Year	NEP
2003	1,258,162
2004	1,358,394
2005	1,279,187
2006	1,223,994
2007	1,211,671
2008	1,221,598
2009	1,214,672
2010	1,303,425
2011	1,416,299
2012	1,512,410

# ACE Limited 2012 Global Loss Triangles | Insurance Overseas General

# **Personal Accident**

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

					Age in r	months				
Accident Year	t 12	24	36	48	60	72	84	96	108	120
Prior	0	104,842	174,548	216,451	245,432	273,957	285,403	295,428	303,519	307,731
2003	216,474	392,203	443,110	463,544	476,682	482,588	487,039	489,397	491,449	492,852
2004	226,210	395,147	431,362	452,128	461,431	465,771	469,404	471,146	474,657	
2005	245,291	428,014	470,974	485,774	492,601	497,407	500,365	501,871		
2006	290,932	485,462	530,950	549,582	554,845	558,593	560,985			
2007	321,720	547,661	593,398	612,609	619,286	622,396				
2008	358,375	611,947	670,025	683,892	691,460					
2009	394,107	664,936	722,788	741,237						
2010	404,747	685,418	740,892							
2011	407,704	686,179								
2012	401,258									

# Reported Loss + Paid ALAE Triangle

		Age in months								
Acciden Year	t 12	24	36	48	60	72	84	96	108	120
Prior	185,451	243,606	282,862	306,227	316,302	320,014	322,999	325,635	328,753	330,283
2003	309,682	455,998	484,677	491,328	495,979	495,576	496,966	495,821	495,273	496,124
2004	305,075	445,504	459,713	469,251	472,974	475,994	476,865	477,492	477,497	
2005	328,620	476,996	494,838	496,434	499,420	500,401	502,018	502,337		
2006	376,703	539,116	553,320	560,261	563,727	564,283	565,314			
2007	416,154	607,649	620,177	626,571	627,867	628,650				
2008	467,218	672,136	693,813	697,348	702,180					
2009	516,334	729,013	749,044	755,679						
2010	533,171	753,343	771,611							
2011	551,673	764,045								
2012	539,673									

Accident Year	NEP
2003	1,297,034
2004	1,432,435
2005	1,569,162
2006	1,774,703
2007	1,923,791
2008	2,009,115
2009	2,024,026
2010	2,060,748
2011	2,206,449
2012	2,258,042

### **Highlights**

### Global Re Segment

The Global Re segment contains the business written by Tempest USA, Tempest Bermuda, Tempest International, and Tempest Canada, all of which is sourced through reinsurance brokers. Tempest USA writes a US treaty reinsurance book covering nearly all lines. Tempest Bermuda was founded in 1993 and writes catastrophe reinsurance, primarily property coverages. Tempest International writes a worldwide portfolio of marine, aviation, international property and casualty business. Tempest Canada was formed in 2007 and writes predominately Canadian property and casualty business.

Unlike the rest of the triangles, the data for Global Re is presented on a treaty year basis, rather than on an accident year basis like the rest of the ACE Group. A feature of treaty year data is that individual treaties can incept at any time during a given treaty year. Therefore a full treaty year can typically take up to 36 months to fully earn, and possibly longer if the year contains multi-year contracts. Since reserves should only be established for the earned portion of each treaty year, care should be taken not to fully develop the more recent treaty years without excluding the unearned portion of that treaty year.

For the Global Re Property segment, we generally expect the earned premium at the end of the first development year to represent approximately 70-75% of the ultimate premium for the treaty year, and anticipate minimal development in earned premium after the second development year. For the Global Re Non-Property segment, we generally expect the earned premium at the end of the first and second development years to respectively represent 40-50% and 85-95% of ultimate premium. By the end of the third development year, ultimate premiums should be fully earned although the actual premium figures may move slightly after this point due to updated reporting from the cedants.

### Global Re Property

Prior to treaty year 2000, all of the loss experience relates to Tempest Bermuda and is therefore all property catastrophe related. In the treaty years subsequent to 2000, the property proportional and property per risk books have grown substantially. Although the mixture of business varies by year, Tempest Bermuda property catastrophe represents approximately 70% of earned premium in the more recent years. U.S. exposure risks represent approximately 70% of the total Property premium. Of the non-catastrophe premium, approximately 50% of the premium is on proportional treaties increasing to close to 70% over the last four years.

### Global Re Non-Property

This portfolio consists of a wide range of business which more recently includes general casualty (20%), automobile (30%), professional liability (20%), medical malpractice (10%), workers' compensation, marine and aviation. The mix of business has changed over time as the rate of growth and reduction varied by market conditions and line of business. For example, from 2002 to 2005, general casualty business comprised approximately 40% of the portfolio but in more recent years this line of business has reduced to less than 20% of the portfolio. Approximately 75% of the Non-Property business is written on U.S. exposed risks. This ratio has historically varied between 60% and 80%. Approximately 60% of the premium volume is on non-proportional business and a small portion of the premium is coming from Facultative treaties (less than 5%).

Given the long-tail nature of the Global Re Non-Property lines of business, care must be taken when trying to produce meaningful analysis from limited historical information. Compounding this limitation is the fact that this portfolio grew rapidly in its first few years and has been shrinking in the more recent years due to the softening market. As a result, loss development experience emerging from earlier treaty years may not be an unbiased predictor of loss development in later years.

# ACE Limited 2012 Global Loss Triangles | Global Re

# Property

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

	Age in months									
Treaty Year	12	24	36	48	60	72	84	96	108	120
Prior	0	36,568	49,939	54,072	57,581	57,978	62,294	64,093	62,493	60,938
2003	31,206	68,162	102,916	112,927	116,488	118,756	119,404	120,057	120,474	120,503
2004	169,684	323,760	385,362	410,023	420,719	426,045	429,108	431,411	431,926	
2005	89,553	405,267	516,675	555,665	568,339	575,704	585,174	588,026		
2006	12,931	57,703	86,604	95,753	99,374	99,997	100,371			
2007	12,841	63,159	93,551	102,657	106,944	109,984				
2008	53,322	139,438	176,874	204,782	215,149					
2009	29,093	75,230	95,515	103,811						
2010	34,489	198,836	255,482							
2011	7,182	78,850								
2012	21,651									

# Reported Loss + Paid ALAE Triangle

	Age in months									
Treaty Year	12	24	36	48	60	72	84	96	108	120
Prior	59,952	65,270	66,297	69,845	68,788	68,427	68,632	69,387	67,022	72,345
2003	58,341	102,369	123,430	121,932	123,459	123,077	123,059	122,417	121,386	121,560
2004	251,516	391,043	427,737	432,175	433,630	435,085	435,156	434,326	434,904	
2005	394,613	543,072	569,470	584,384	581,022	584,295	592,079	593,989		
2006	33,619	86,893	100,815	102,603	102,500	102,156	102,010			
2007	36,342	99,704	114,184	112,548	113,375	114,613				
2008	155,353	180,081	206,381	215,428	217,880					
2009	58,234	98,739	107,825	110,010						
2010	119,637	268,330	288,586							
2011	66,440	138,661								
2012	39,874									

Treaty Year	NEP
2003	615,652
2004	501,918
2005	567,581
2006	563,745
2007	476,729
2008	432,537
2009	475,508
2010	455,371
2011	395,202
2012	360,268

# ACE Limited 2012 Global Loss Triangles | Global Re

# Non-Property

As of 12/31/12 In US\$ thousands

Paid Loss + Paid ALAE Triangle

		Age in months								
Treaty Year	12	24	36	48	60	72	84	96	108	120
Prior	0	38,625	90,237	140,649	180,317	212,709	229,673	245,025	250,741	255,036
2003	4,256	38,572	84,872	136,036	198,781	240,723	269,116	293,569	311,361	324,801
2004	10,232	56,596	104,003	167,208	238,287	292,029	329,176	349,245	364,952	
2005	13,902	93,127	174,646	244,161	305,754	348,695	387,228	407,627		
2006	10,577	66,815	141,117	207,666	262,027	305,206	341,516			
2007	8,495	52,906	113,694	164,826	209,373	257,951				
2008	12,579	58,011	121,303	165,995	203,276					
2009	10,927	62,004	116,430	163,413						
2010	14,634	98,612	183,059							
2011	12,628	95,857								
2012	20,313									

# Reported Loss + Paid ALAE Triangle

	Age in months									
Treaty Year	12	24	36	48	60	72	84	96	108	120
Prior	52,946	136,783	190,804	234,167	255,223	274,618	291,179	288,113	287,368	286,212
2003	21,315	110,098	196,019	264,383	305,411	322,643	341,397	352,754	354,691	358,631
2004	36,215	140,054	255,957	317,626	366,512	388,955	403,641	404,966	412,810	
2005	69,224	204,399	307,032	367,530	404,782	434,039	455,971	461,818		
2006	40,529	152,855	260,956	331,105	371,227	395,420	420,860			
2007	29,133	140,090	213,889	263,975	308,442	334,936				
2008	40,995	141,378	222,850	266,101	296,227					
2009	28,623	118,076	204,505	265,714						
2010	49,869	197,087	289,795							
2011	50,867	193,213								
2012	82,434									

Treaty Year	NEP
2003	760,076
2004	909,765
2005	888,054
2006	821,243
2007	634,868
2008	506,423
2009	612,848
2010	593,271
2011	492,398
2012	201,477

### Unpaid losses and loss expenses

As an insurance and reinsurance company, we are required by applicable laws and regulations and GAAP to establish loss and loss expense reserves for the estimated unpaid portion of the ultimate liability for losses and loss expenses under the terms of our policies and agreements with our insured and reinsured customers. The estimate of the liabilities includes provisions for claims that have been reported but are unpaid at the balance sheet date (case reserves) and for obligations on claims that have been incurred but not reported (IBNR) at the balance sheet date. IBNR may also include provisions to account for the possibility that reported claims may settle for amounts that differ from the established case reserves. Loss reserves also include an estimate of expenses associated with processing and settling unpaid claims (loss expenses).

At December 31, 2012, our gross unpaid loss and loss expense reserves were \$37.9 billion and our net unpaid loss and loss expense reserves were \$26.5 billion. With the exception of certain structured settlements, for which the timing and amount of future claim payments are reliably determinable, and certain reserves for unsettled claims that are discounted in statutory filings, our loss reserves are not discounted for the time value of money. In connection with such structured settlements and certain reserves for unsettled claims, we carried net discounted reserves of \$105 million at December 31, 2012 and \$94 million at December 31, 2011.

The process of establishing loss reserves for property and casualty claims can be complex and is subject to considerable uncertainty as it requires the use of informed estimates and judgments based on circumstances known at the date of accrual. The judgments used to estimate unpaid loss and loss expense reserves require different considerations depending upon the individual circumstances underlying the insured loss. For example, the reserves established for high excess casualty claims, A&E claims, claims from major catastrophic events, or the IBNR for our various product lines each require different assumptions and judgments to be made. Necessary judgments are based on numerous factors and may be revised as additional experience and other data become available and are reviewed, as new or improved methods are developed, or as laws change.

Hence, ultimate loss payments may differ from the estimate of the ultimate liabilities made at the balance sheet date. Changes to our previous estimates of prior period loss reserves impact the reported calendar year underwriting results, adversely if our estimates increase and favorably if our estimates decrease.

The potential for variation in loss reserves is impacted by numerous factors, which we discuss below.

We establish loss and loss expense reserves for our claims liabilities for all insurance and reinsurance business that we write. For those claims reported by insureds or ceding companies to us prior to the balance sheet date, and where we have sufficient information, our claims personnel establish case reserves as appropriate based on the circumstances of the claim(s), standard claim handling practices, and professional judgment. Furthermore, for our assumed reinsurance operation, Global Reinsurance, an additional case reserve may be established above the amount notified by the ceding company if the notified case reserve is judged to be insufficient by Global Reinsurance's claims department (refer to "Assumed reinsurance" below) [in Item 7 of the 2012 10-K]. In respect of those claims that have been incurred but not reported prior to the balance sheet date, there is, by definition, limited actual information to form the case reserve estimate and reliance is placed upon historical loss experience and actuarial methods to project the ultimate loss obligations and the corresponding amount of IBNR.

We have actuarial staff within each of our business units who analyze loss reserves and regularly project estimates of ultimate losses and the corresponding indications of the required IBNR reserve. Note that losses include loss expenses for the purposes of this discussion. IBNR reserve estimates are generally calculated by first projecting the ultimate amount of losses for a product line and subtracting paid losses and case reserves for reported claims. The judgments involved in projecting the ultimate losses may pertain to the use and interpretation of various standard actuarial reserving methods that place reliance on the extrapolation of actual historical data, loss development patterns, and industry data as appropriate.

The estimate of the required IBNR reserve also requires judgment by actuaries and management to reflect the impact of more contemporary and subjective factors, both qualitative and quantitative. Among some of these factors that might be considered are changes in business mix or volume, changes in ceded reinsurance structures, changes in claims handling practices, reported and projected loss trends, inflation, the legal environment, and the terms and conditions of the contracts sold to our insured parties.

Typically, for each product line, one or more standard actuarial reserving methods may be used to estimate ultimate losses and loss expenses, and from these estimates, a single actuarial central estimate is selected. Exceptions to the use of standard actuarial projection methods occur for individual claims of significance that require complex legal, claims, and actuarial analysis and judgment (for example, A&E account projections or high excess casualty/ professional lines accounts in litigation) or for product lines where the nature of the claims experience and/or availability of the data prevent application of such standard methods. In addition, claims arising from certain catastrophic events require evaluations that do not utilize standard actuarial loss projection methods but are based upon our exposure at the time of the event and the circumstances of the catastrophe and its post-event impact.

The standard actuarial reserving methods may include, but are not limited to, expected loss ratio, paid and reported loss development, and Bornhuetter-Ferguson methods. A general description of these methods is provided below. In the subsequent discussion on short- and long-tail business, reference is also made, where appropriate, to how consideration in method selection impacted 2012 results. In addition to these standard methods, we may use other recognized actuarial methods and approaches depending upon the product line characteristics and available data. To ensure that the projections of future loss emergence based on historical loss development patterns are representative of the underlying business, the historical loss and premium data is required to be of sufficient homogeneity and credibility. For example, to improve data homogeneity, we may subdivide product line data further by similar risk attribute (e.g., geography, coverage such as property versus liability exposure, or elements of program structure such as attachments or limits), project ultimate losses for these homogeneous groups and then combine the results to provide the overall product line estimate.

The premium and loss data are aggregated by origin year (e.g., the year in which the losses were incurred – "accident year" or "report year", for example) and annual or quarterly development periods. Implicit in the standard actuarial methods that we generally utilize is the need for two fundamental assumptions: first, the pattern by which losses are expected to emerge over time for each origin year and second, the expected loss ratio for each origin year.

The expected loss ratio for any particular origin year is selected after consideration of a number of factors, including historical loss ratios adjusted for intervening rate changes, premium and loss trends, industry benchmarks, the results of policy level loss modeling at the time of underwriting, and other more subjective considerations for the product line and external environment as noted above. The expected loss ratio for a given origin year is initially established at the start of the origin year as part of the planning process. This analysis is performed in conjunction with underwriters and management. The expected loss ratio method arrives at an ultimate loss estimate by multiplying the expected ultimate loss ratio by the corresponding premium base.

This method is most commonly used as the basis for the actuarial central estimate for immature origin periods on product lines where the actual paid or reported loss experience is not yet deemed sufficiently credible to serve as the principal basis for the selection of ultimate losses. The expected loss ratio for a given origin year may be modified over time if the underlying assumptions such as the assessment of prior year loss ratios, loss trend, or premium rate changes differ from the original assumptions.

Our selected paid and reported development patterns provide a benchmark against which the actual emerging loss experience can be monitored. Where possible, development patterns are selected based on historical loss emergence by origin year with appropriate allowance for changes in business mix, claims handling process, or ceded reinsurance that are likely to lead to a discernible difference between the rate of historical and future loss emergence. For product

lines where the historical data is viewed to have low statistical credibility, the selected development patterns also reflect relevant industry benchmarks and/or experience from similar product lines written elsewhere within ACE.

This most commonly occurs for relatively new product lines that have limited historical data or for high severity/low frequency portfolios where our historical experience exhibits considerable volatility and/or lacks credibility. The paid and reported loss development methods convert the selected loss emergence pattern to a set of multiplicative factors which are then applied to actual paid or reported losses to arrive at an estimate of ultimate losses for each period. Due to their multiplicative nature, the paid and reported loss development methods will leverage differences between actual and expected loss emergence. These methods tend to be utilized for more mature origin periods and for those portfolios where the loss emergence has been relatively consistent over time.

The Bornhuetter-Ferguson method is essentially a combination of the expected loss ratio method and the loss development method, where the loss development method is given more weight as the origin year matures. This approach allows a logical transition between the expected loss ratio method which is generally utilized at earlier maturities and the loss development methods which are typically utilized at later maturities. We usually apply this method using reported loss data although paid data may be used.

The applicability of actuarial methods will also be impacted by the attachment point of the policy or contract with the insured or ceding company. In the case of low attachment points typical of primary insurance or working layer reinsurance, the experience tends to be more frequency driven. For these product types, standard actuarial methods generally work well in determining loss reserve levels, as the loss experience is often credible, given a sufficient history and volume of claims experience. In the case of high attachment points typical of excess insurance or excess of loss reinsurance, the experience tends to be severity driven, as only a loss of significant size will enter the layer. For these product lines, it typically takes longer for loss experience to gain credibility, which adds uncertainty to the estimates derived from standard actuarial methods. For products such as our assumed reinsurance business, we typically supplement the standard actuarial methods with an analysis of each contract's terms, original pricing information, subsequent internal and external analyses of the ongoing contracts, market exposures and history, and qualitative input from claims managers. This approach is also used for structured or unique contracts.

Our recorded reserves represent management's best estimate of the provision for unpaid claims as of the balance sheet date. We perform an actuarial reserve review for each product line at least once a year. At the conclusion of each review, we establish an actuarial central estimate. The process to select the actuarial central estimate, when more than one estimate is available, may differ across product lines. For example, an actuary may base the central estimate on loss projections developed using an incurred loss development approach instead of a paid loss development approach when reported losses are viewed to be a more credible indication of the ultimate loss compared with paid losses. The availability of estimates for different projection techniques will depend upon the product line, the underwriting circumstances, and the maturity of the loss emergence.

For a well-established product line with sufficient volume and history, the actuarial central estimate may be drawn from a weighting of paid and reported loss development and/or Bornhuetter-Ferguson methods. However, for a new long-tail product line for which we have limited data and experience or a rapidly growing line, the emerging loss experience may not have sufficient credibility to allow selection of loss development or Bornhuetter-Ferguson methods and reliance may be placed upon the expected loss ratio method until the experience matures and becomes credible.

Management's best estimate is developed from the actuarial central estimate after collaboration with actuarial, underwriting, claims, legal, and finance departments and culminates with the input of reserve committees. Each business unit reserve committee includes the participation of the relevant parties from actuarial, finance, claims, and unit senior management and has the responsibility for finalizing and approving the estimate to be used as management's best estimate. Reserves are further reviewed by ACE's Chief Actuary and senior management. The objective of such a process is to determine a single estimate that we believe represents a better estimate than any other. Such an estimate is

viewed by management to be the best estimate of ultimate loss settlements and is determined based on consideration of a number of factors in addition to the actuarial central estimate, including but not limited to:

- segmentation of data to provide sufficient homogeneity and credibility for loss projection methods;
- extent of internal historical loss data, and industry information where required;
- historical variability of actual loss emergence compared with expected loss emergence;
- perceived credibility of emerged loss experience;
- · rate monitor information for new and renewal business;
- · impact of applicable reinsurance recoveries; and
- nature and extent of underlying assumptions.

Management does not build in any specific provision for uncertainty.

We do not calculate ranges of loss reserve estimates for our individual loss reserve studies. Such ranges are generally not a true reflection of the potential difference between loss reserves estimated at the balance sheet date and the ultimate settlement value of losses. This is due to the fact that an actuarial range is developed based on known events as of the valuation date whereas actual prior period development reported in subsequent consolidated financial statements relates in part to events and circumstances that were unknown as of the original valuation date. While we believe that our recorded reserves are reasonable and represent management's best estimate for each product line as of the current valuation date, future changes to our view of the ultimate liabilities are possible.

A five percent change in our net loss reserves equates to \$1.3 billion and represents five percent of shareholders' equity at December 31, 2012 . Historically, including A&E reserve charges, our reserves, at times, have developed in excess of 10 percent of recorded amounts. Refer to "Analysis of Losses and Loss Expenses Development", under Item 1 [of the 2012 10-K], for a summary of historical volatility between estimated loss reserves and ultimate loss settlements.

We perform internal loss reserve studies for all product lines at least once a year according to a schedule that is established at the start of the calendar year. In addition, each quarter for most product lines, we review the emergence of actual losses relative to expectations. If warranted from findings in loss emergence tests, we may alter the timing of our product line reserve studies. Finally, loss reserve studies are performed annually by external third-parties and the findings are used to test the reasonableness of our internal findings.

The time period between the date of loss occurrence and the final payment date of the ensuing claim(s) is referred to as the "claim-tail". The following is a discussion of specific reserving considerations for both short-tail and long-tail product lines.

### Short-tail business

Short-tail business generally describes product lines for which losses are typically known and paid shortly after the loss actually occurs. This would include, for example, most property, personal accident, aviation hull, and automobile physical damage policies that we write. There are some exceptions on certain product lines or events (e.g., major hurricanes or earthquakes) where the event has occurred, but the final settlement amount is highly uncertain and not known with certainty for a potentially lengthy period. Due to the short reporting and development pattern for these product lines, the uncertainty associated with our estimate of ultimate losses for any particular accident period diminishes relatively quickly as actual loss experience emerges. We typically assign credibility to methods that incorporate actual loss emergence, such as the paid and reported loss development and Bornhuetter-Ferguson methods, sooner than would be the case for long-tail lines at a similar stage of development for a given origin year.

The reserving process for short-tail losses arising from catastrophic events typically involves an assessment by the claims department, in conjunction with underwriters and actuaries, of our exposure and estimated losses immediately following an event and then subsequent revisions of the estimated losses as our insureds provide updated actual loss information.

### Long-tail business

Long-tail business describes lines of business for which specific losses may not be known/reported for some period and for which claims can take significant time to settle/close. This includes most casualty lines such as general liability, D&O, and workers' compensation. There are various factors contributing to the uncertainty and volatility of long-tail business. Among these are:

- Our historical loss data and experience is sometimes too immature and lacking in credibility to rely upon for reserving purposes. Where this is the case, in our reserve analysis we may utilize industry loss ratios or industry benchmark development patterns that we believe reflect the nature and coverage of the underwritten business and its future development, where available. For such product lines, actual loss experience may differ from industry loss statistics as well as loss experience for previous underwriting years;
- The inherent uncertainty around loss trends, claims inflation (e.g., medical and judicial) and underlying economic conditions;
- The inherent uncertainty of the estimated duration of the paid and reported loss development patterns beyond the historical record requires that professional judgment be used in the determination of the length of the patterns based on the historical data and other information;
- The inherent uncertainty of assuming that historical paid and reported loss development patterns for older origin years will be representative of subsequent loss emergence on recent origin years. For example, changes over time in the processes and procedures for establishing case reserves can distort reported loss development patterns or changes in ceded reinsurance structures by origin year can alter the development of paid and reported losses;
- Loss reserve analyses typically require loss or other data be grouped by common characteristics in some manner. If
  data from two combined lines of business exhibit different characteristics, such as loss payment patterns, the credibility of the reserve estimate could be affected. Additionally, since casualty lines of business can have significant
  intricacies in the terms and conditions afforded to the insured, there is an inherent risk as to the homogeneity of the
  underlying data used in performing reserve analyses; and
- The applicability of the price change data used to estimate ultimate loss ratios for most recent origin years.

The interested reader is referred to ACE's 2012 Form 10-K for additional information on the reserving process.

### Glossary

**Accident year (AY):** Relates to all losses occurring within a given twelve-month period, regardless of when the loss was reported or booked.

**Bornhuetter-Ferguson method:** Estimates unpaid (unreported) losses for a given accident/treaty year based on an expected ultimate and the percentage of losses currently unpaid (unreported).

**Chain Ladder method:** Estimates unpaid (unreported) losses for a given accident/treaty year by a) estimating ultimate losses derived by multiplying the paid (or reported) losses for the given year by the reciprocal of the percentage of losses currently paid (or reported) for that year and, in the case of treaty year data, also by the percentage of earned premium to ultimate premium, and then b) subtracting the paid (or reported) losses for the given year from the ultimate losses calculated in (a).

**Claims made basis:** An insurance form where the date the loss is reported to the insurer is deemed to be the date of the loss event, regardless of when the loss occurred.

**Expected Loss Ratio method:** Estimates unpaid (unreported) loss for a given accident/treaty year by a) estimating ultimate losses derived by multiplying the earned premiums by a selected loss ratio, and then b) subtracting the paid (or reported) losses for the given year from the ultimate losses calculated in (a). The selected loss ratio may be based on the ACE's own data and/or Industry data or a combination of both.

**Occurrence basis:** An insurance form where the date the loss occurred is deemed to be the date of the loss event, regardless of when the claim is reported to the insurer.

**Retroactive reinsurance:** An arrangement whereby a reinsurer assumes liability incurred as a result of past events (i.e., a loss portfolio transfer).

**Treaty year (TY):** Relates to all losses associated with policies that incepted within a given twelve-month period.

**Year-of-Account (YOA):** Terminology specific to Lloyd's business; the year to which an individual risk is allocated based on the calendar year in which it was first signed.