



Global Catastrophe Recap

October 2016

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Executive Summary

- Hurricane Matthew leaves extensive Caribbean and US damage; USD15+ billion economic cost
- Three powerful earthquakes struck central Italy in four days' time; several villages flattened
- Several tropical cyclones impacted portions of Asia leading to USD2.8 billion in economic damage

Hurricane Matthew brought considerable impacts to portions of the Southeast and Mid-Atlantic, including impacts resulting from riverine flooding in North Carolina that were felt for several weeks. The official death toll was 49, including 28 in North Carolina alone. Matthew caused major wind, storm surge, flash flood, and isolated tornado damage in several states including Florida, Georgia, South Carolina, North Carolina, and Virginia. The considerable damage occurred despite the storm only making its only US landfall as a minimum Category 1 storm in South Carolina. Total economic losses in the United States were anticipated to range up to a high of USD10 billion. Public and private insurance losses were considerably less, with preliminary estimates possibly as high as USD5.0 billion. A large portion of the inland flood loss in North Carolina went uninsured due to low NFIP take-up.

Matthew also brought devastating impacts to portions of the Caribbean and the Bahamas. The official death toll reached 552: 546 of who were in Haiti, though unofficial totals were as high as 1,600. Matthew caused economic damage of more than USD5.0 billion outside of the US: Cuba (USD2.6 billion), Haiti (USD1.9 billion), and the Bahamas (USD600 million).

Remnant moisture from Matthew would later bring flooding rain and high winds to parts of Atlantic Canada. Economic damages were expected to reach well in the 10s of millions (USD).

A series of strong earthquakes struck central Italy on October 26 (magnitude-5.5 and magnitude-6.1) and October 30 (magnitude-6.6) brought a fresh wave of damage and injuries to a region that was still in the midst of recovering from a major tremor in August. Just one fatality was reported, though dozens of people were injured. Catastrophic damage to several villages was reported as officials continued to take an official assessment to impacted areas, including several historical sites.

Super Typhoon Chaba caused widespread disruption and damage in South Korea claiming at least nine lives. Minor damage was also reported in Japan. The General Insurance Association of Korea announced that more than 33,100 claims were filed totaling KRW143 billion (USD126 million). Overall economic losses were much higher.

Tropical Storm Aere prompted widespread and significant flooding in central Vietnam. At least 31 people died and 122,000 homes were inundated. Significant damage to agricultural interests was reported.

Typhoon Sarika and Super Typhoon Haima both made landfalls in the Philippines and China within one week. At least 16 people were killed and almost 115,000 homes were damaged or destroyed. Aggregated economic losses exceeded USD1.8 billion much of which was attributed to agricultural damage.

Hurricane Nicole tracked within a few miles of Bermuda prompting damage to infrastructure, homes, and businesses.

Severe flooding in portions of Asia, Central America, and Egypt throughout October claimed at least 57 lives and damaged almost 210,000 homes while a powerful windstorm brought widespread damages to the Australian state of Victoria.

United States

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
10/07-10/09	HU Matthew	Southeast, Mid-Atlantic	49	500,000+	Up to 10 billion
10/12-10/16	Severe Weather	Pacific Northwest	0	Hundreds	10s of millions

Hurricane Matthew brought considerable impacts to portions of the Southeast and Mid-Atlantic from October 7-9, though impacts resulting from riverine flooding in North Carolina were felt for several weeks. The official death toll was 49, including 28 in North Carolina alone. Matthew caused major wind, storm surge, flash flood, and isolated tornado damage in several states including Florida, Georgia, South Carolina, North Carolina, and Virginia. The considerable damage occurred despite the storm only making its only US landfall as a minimum Category 1 storm in South Carolina. Total economic losses in the United States were anticipated to range up to a high of USD10 billion. Public and private insurance losses were considerably less, with preliminary estimates possibly as high as USD5.0 billion. A large portion of the inland flood loss in North Carolina went uninsured due to low NFIP take-up.

An active weather pattern brought multiple areas of low pressure to the Pacific Northwest from October 12-16, causing widespread damages in parts of Washington and Oregon. Tens of thousands of power outages occurred as the high winds downed trees and power lines. Additional damage resulted from 5 to 7 inches (127 to 254 millimeters) of rainfall spawning isolated reports of flooding and landslides. Two tornado touchdowns were noted in Oregon with most of the damage reported in the town of Manzanita.

Remainder of North America (Non-US)

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
09/28-10/07	HU Matthew	Caribbean	552+	250,000+	5.5+ billion
10/09-10/10	HU Matthew	Canada	0	Thousands	10s of millions
10/13	HU Nicole	Bermuda	0	Hundreds	Millions
10/18-10/20	Flooding	Central America	10	81,000+	Unknown

Hurricane Matthew brought devastating impacts to portions of the Caribbean from the end of September into early October. The official death toll reached 552, of which 546 were in Haiti (though the final toll could be far higher). The storm caused major wind, storm surge, and flash flood damage in several countries in its path including the Bahamas, Hispaniola, Cuba, and northern regions of South America. It made separate landfalls in Haiti and Cuba at Category 4 intensity and caused catastrophic damage. Hundreds of thousands of homes and other structures were damaged or destroyed. Matthew caused economic damage of more than USD5.0 billion outside of the US: Cuba (USD2.6 billion), Haiti (USD1.9 billion), and the Bahamas (USD600 million). Insured losses were largely minimal in Cuba and Haiti, though the Bahamas insurance industry forecast a USD400 million loss – the costliest event in its history.

Portions of Atlantic Canada were lashed by a low pressure area, fuelled by the remnant tropical moisture of Hurricane Matthew, which brought significant heavy rainfall to parts of New Brunswick, Prince Edward Island, Nova Scotia, and Newfoundland on October 9-10. Despite widespread damage and disruption, there were no reports of fatalities. Officials in Cape Breton reported that damage to be well in the 10s of millions (CAD); while the repair bill for damages to roads alone in Newfoundland was expected to top CAD1.5 million (USD1.1 million).

Hurricane Nicole tracked within a few miles of Bermuda as a powerful Category 3 strength storm on October 13, bringing extremely gusty winds, storm surge and heavy rain to the island. Government agencies indicated that there was damage to the country's infrastructure due to fallen or collapsed walls and roads while some roofs were torn from buildings and homes. Scores of trees and power lines were toppled leading to significant power outages while numerous homes, businesses, and roads were inundated. Disruption to travel and transportation was also noted. Total damage was estimated well into the millions of dollars (USD).

Heavy rainfall over portions of Central America from October 18-20 claimed at least 10 lives and damaged tens of thousands of homes. Honduras, Nicaragua, and El Salvador were all impacted as a tropical disturbance unleashed torrential downpours that prompted widespread flooding and landslides. Worst affected were southwestern departments of Honduras where six people were killed and 80,000 homes were damaged or destroyed.

South America

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
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No significant natural disaster events were recorded in South America during the month of October.

Europe

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
10/26	Earthquake	Italy	1	Thousands	TBD
10/30	Earthquake	Italy	0	Thousands	TBD

A pair of strong earthquakes struck central Italy on October 26, bringing a fresh wave of damage and injuries to a region that was still in the midst of recovering from a major tremor just two months earlier. The first temblor (magnitude-5.5) struck during the evening of October 26; while the second (magnitude-6.1) struck just two hours later. One fatality was reported and dozens of others were injured. Damage in the community of Ussita was particularly significant. It remained too early to provide a financial loss estimate for this earthquake, but losses were expected to be considerable.

A strong magnitude-6.6 earthquake rattled central Italy on October 30, causing further devastation in areas that were affected by strong tremors on October 26 and August 24. There were no reports of any fatalities, a fact largely attributed to the fact that the majority of people who normally reside in the region had evacuated due to recent seismic activity in the area. About 20 people were injured. Catastrophic damage to homes, churches, and historical buildings were reported. It remained too early to provide a financial loss estimate for this earthquake, but losses were expected to be considerable.

Africa

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
10/27-10/29	Flooding	Egypt	28	Thousands	11+ million

Powerful thunderstorms in eastern portions of Egypt prompted flooding that claimed at least 26 lives from October 27-29. Lightning strikes claimed two other victims while a further 72 people were injured. The impacted governates were South Sinai, Red Sea, Sohag, Ismailia, and Beni Suef. The resort town of Ras Gharib, Red Sea, was among the worst-affected areas. Losses to homes and businesses in the affected areas were still being quantified. Authorities in Egypt allocated EGP100 million (USD11 million) for compensation of flood victims and urgent repairs to infrastructure.

Asia

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
10/1-10/13	Flooding	Thailand	4	88,000+	10s of millions
10/05-10/06	TY Chaba	South Korea, Japan	10	33,100+	100s of millions
10/13-10/15	TS Aere	Vietnam	31	122,250	10s of millions
10/16-10/19	TY Sarika	Philippines, China	2	19,500+	890+ million
10/19-10/21	STY Haima	Philippines, China	14	95,000+	945+ million
10/31-11/2	Flooding	Vietnam	15	41,000+	22+ million
10/31-11/2	Flooding	China	0	Unknown	65+ million

Widespread flooding was reported throughout Thailand following particularly heavy rainfall in the first two weeks of October. Seventeen provinces were affected with Ayutthaya and Nakhon Sawan, in Central Region, particularly badly affected. At least four people were killed and 28,000 homes were damaged in Nakhon Sawan; while more than 28,000 homes and numerous historical sites were affected in Ayutthaya. In total, almost 88,000 homes were affected in the country. Vast areas of farmland were also inundated.

Super Typhoon Chaba caused widespread disruption and damage in southern portions of Japan and South Korea as it grazed the countries on October 5-6. Southern South Korea was hardest-hit by Chaba which claimed at least nine lives, left one person missing, damaged 500 homes, and inundated 1,500 vehicles. Widespread damage was reported in Busan, Ulsan, and on Jeju Island. Minimal damages were reported in portions of Japan. In South Korea, more than 33,100 insurance claims were filed totaling almost KRW143 billion (USD126 million). Economic losses were expected to be much higher.

Tropical Storm Aere brought heavy rainfall to central portions of Vietnam from October 13-15 that caused widespread and significant flooding. At least 31 people died and 122,000 homes were inundated. Worst affected were Thừa Thiên-Huế, Quảng Trị, Quảng Bình, Hà Tĩnh, and Nghệ An provinces. More than 500,000 people were displaced and there were reports of significant damages to agricultural interests.

Typhoon Sarika made one landfall in Philippines and two separate landfalls in southern China from October 16-19. The storm claimed two lives in the Philippines and caused significant damage to agricultural interests in the Chinese provinces of Hainan, Guangdong, and Guangxi. Economic damage estimates totaled nearly USD890 million – with a large portion of these attributed to agricultural losses.

Super Typhoon Haima made separate landfalls in the Philippines on October 19 and in southern China on October 21 prompting widespread damage and destruction. At least 14 people were killed in the Philippines where more than 90,000 homes were damaged or destroyed. A further 4,000 homes were damaged in China's Guangdong province where 239,500 hectares (591,815 acres) of crops were also impacted. Aggregated economic losses were listed at USD945 million, the bulk of which was attributed to agricultural damage.

The Northeast monsoon brought very heavy rainfall to ten coastal provinces of Vietnam from October 31 through November 2. Worst affected by the subsequent flooding were Phú Yên, Quảng Bình, Hà Tĩnh, and Quảng Trị provinces. At least 15 people were killed and 41,000 homes were inundated. Seven fatalities were reported in Phú Yên. Three of the fatalities were reported in Quảng Bình where 4,000 homes were submerged. A total of 2,700 homes Hà Tĩnh and a further 2,000 homes in Quảng Trị were also damaged.

Heavy rainfall affected portions of China's Jiangsu and Anhui provinces from October 31 through November 2 prompting damaging floods. There were no reports of any casualties. In total 83,500 hectares (206,335 acres) of agricultural land was impacted including 7,700 hectares (19,025 acres) of crops that were destroyed. Economic losses were listed at CNY440 million (USD65 million).

Oceania (Australia, New Zealand, South Pacific Islands)

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
10/08-10/09	Severe Weather	Australia	1+	5,000+	10+ of millions

A powerful cold front swept across Victoria, Australia, on October 8-9 prompting widespread damage and disruption. At least one person was killed and 10 others were injured as a result. The storms generated by the front downed scores of large trees and caused significant damages to roofs and vehicles. At the height of the storms approximately 130,000 customers were without power in the state. The Insurance Council of Australia noted that 5,000 claims amounting to AUD7.5 million (USD5.8 million) were filed.

Appendix

Updated 2016 Data: January-September

United States

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/04-01/08	Flooding	California	0	10,000+	125+ million
01/09	Severe Weather	Florida	0	200+	10+ million
01/17	Severe Weather	Florida	2	200+	20+ million
01/21-01/24	Winter Weather	Mid-Atlantic, Northeast, Southeast	58	25,000+	1.0+ billion
01/31-02/01	Severe Weather	California	0	12,500+	175+ million
02/01-02/03	Winter Weather	Plains, Midwest, Northeast	1	5,000+	100+ million
02/08-02/09	Winter Weather	Northeast, Mid-Atlantic	0	2,000+	25+ million
02/13	Earthquake	Oklahoma	0	Hundreds	Unknown
02/13-02/16	Winter Weather	Northeast, Midwest, Southeast	6	20,000+	700+ million
02/19-02/20	Severe Weather	Midwest	0	25,000+	250+ million
02/22-02/25	Severe Weather	Plains, Midwest, Southeast, Northeast	10	100,000+	1.2+ billion
02/29-03/01	Severe Weather	Plains, Southeast	0	Thousands	25+ million
03/04-03/12	Severe Weather	Plains, Southeast, Midwest, West	6	60,000+	1.5+ billion
03/13-03/14	Severe Weather	Plains, Midwest, Southeast	0	20,000+	175+ million
03/13-03/15	Severe Weather	West, Midwest, Plains	1	10,000+	175+ million
03/17-03/18	Severe Weather	Plains, Southeast	0	135,000+	1.4+ billion
03/22-03/25	Severe Weather	Rockies, Plains, Southeast, Midwest	0	175,000+	2.5+ billion
03/26-03/27	Severe Weather	Midwest, Southeast	0	10,000+	75+ million
03/30-04/01	Severe Weather	Plains, Southeast, Midwest	0	20,000+	200+ million
04/02-04/04	Severe Weather	Midwest, Mid-Atlantic, Northeast	2	60,000+	450+ million
04/06-04/07	Severe Weather	Southeast, Midwest	0	2,000+	10+ million
04/10-04/15	Severe Weather	Plains, Southeast	1	350,000+	4.3+ billion
04/15-04/19	Flooding	Plains, Rockies	9	70,000+	2.0+ billion
04/24-04/28	Severe Weather	Plains, Midwest, Southeast, Mid-Atlantic	1	100,000+	800+ million
04/29-05/03	Severe Weather	Plains, Midwest, Southeast, Mid-Atlantic	6	150,000+	1.8+ billion
05/07-05/10	Severe Weather	Plains, Midwest, Mississippi Valley	2	90,000+	1.0+ billion
05/11-05/12	Severe Weather	Plains, Midwest	0	90,000+	950+ million
05/16-05/19	Severe Weather	Texas, Oklahoma	0	17,000+	175+ million
05/21-05/28	Severe Weather	Plains, Midwest	1	100,000+	1.3+ billion
05/29-06/02	Severe Weather	Plains	12	25,000+	300+ million
06/06-06/07	Severe Weather	Colorado	0	15,000+	175+ million
06/16-06/18	Severe Weather	Mid-Atlantic, Southeast, Northeast	0	20,000+	275+ million
06/16-06/18	Severe Weather	Plains, Midwest	0	17,500+	175+ million
06/22-06/26	Severe Weather	Mid-Atlantic, Midwest	23	25,000+	750+ of Millions
06/23-06/30	Wildfire	California	2	2,000+	150+ million
06/27-06/29	Severe Weather	Rockies, Plains	0	10,000+	200+ million
07/05-07/07	Severe Weather	Plains, Midwest, Mid-Atlantic, Southeast	0	20,000+	200+ million

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
07/07-07/09	Severe Weather	Rockies, Midwest, Southeast	0	40,000+	375+ million
07/13-07/15	Severe Weather	Rockies, Plains, Midwest, Southeast	7	50,000+	500+ million
07/19-07/21	Severe Weather	Midwest, Ohio Valley	3	10,000+	125+ million
07/20-07/21	Severe Weather	Midwest	0	10,000+	140+ million
07/22-08/01	Wildfire	California	2	250+	100+ million
07/22-09/30	Wildfire	California	1	100+	250+ million
07/28-07/29	Severe Weather	Rockies, Plains	0	115,000+	1.6+ billion
07/30-08/01	Flooding	Mid-Atlantic, Northeast	2	15,000+	700+ million
08/02-08/04	Flooding	Desert Southwest	0	Thousands	10s of millions
08/09-08/16	Flooding	Louisiana, Mississippi, MS Valley	13	250,000+	10 to 15 billion
08/13-08/31	Wildfires	West	0	Thousands	100+ million
08/13-08/31	Wildfire	California	0	2,000+	100+ million
08/16-08/31	Wildfire	California	0	2,000+	100+ million
08/23-08/24	Flooding	Midwest	1	Thousands	100+ million
08/24-08/25	Severe Weather	Midwest	0	3,500+	125+ million
09/01-09/08	HU Hermine	Southeast, Mid-Atlantic	3	50,000+	800+ million
09/03	Earthquake	Oklahoma	0	Hundreds	10s of millions
09/21-09/30	Flooding	Iowa, Wisconsin, Minnesota	1	30,000+	550+ million

Remainder of North America (Non-US)

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/01-02/29	Drought	Haiti	0	Unknown	84+ million
02/23-02/25	Winter Weather	Canada	0	5,000+	25+ million
02/28	Flooding	Haiti	5	10,000+	Millions
03/09-03/10	Severe Weather	Canada	1	5,000+	50+ million
03/24-03/25	Winter Weather	Canada	0	10,000+	100+ million
04/23-04/24	Flooding	Haiti	6	4,400+	Unknown
04/27-05/01	Flooding	Haiti, Dominican Republic	1	2,500+	Millions
05/02-05/31	Wildfire	Canada	0	35,000+	5.0+ billion
05/26-05/31	Flooding	Haiti	1	2,900+	Unknown
06/09	Earthquake	Nicaragua, Honduras	0	3,000+	Millions
06/24-06/25	Severe Weather	Canada	0	4,000+	44+ million
06/28-06/30	Severe Weather	Canada	0	8,500+	85+ million
07/08	Severe Weather	Canada	0	5,000+	40+ million
07/08-07/11	Severe Weather	Canada	0	5,000+	50+ million
07/15-07/16	Severe Weather	Canada	0	7,000+	80+ million
07/18-07/20	Severe Weather	Canada	0	10,000+	100+ million
07/22	Severe Weather	Canada	0	5,000+	95+ million
07/27	Severe Weather	Canada	0	7,000+	67+ million
07/30-08/01	Severe Weather	Canada	0	42,000+	435+ million
08/02-08/10	HU Earl	Mexico, Central America, Caribbean	67	15,000+	250+ million
09/06-09/08	HU Newton	Mexico	11	2,000+	50+ million
09/14-09/18	Flooding	Mexico	13	2,000+	Unknown
09/28-09/30	Flooding	Canada	0	6,000+	150+ million
09/29-09/30	Flooding	Mexico	5	2,000+	10s of millions

South America

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/01-01/25	Flooding	Ecuador	9	2,000+	10+ million
01/09-01/15	Flooding	Brazil	3	25,000+	100+ million
02/20-02/25	Flooding	Peru	1	2,000+	Millions
03/10-03/11	Flooding	Brazil	30	5,000+	100+ million
04/04-04/10	Flooding	Argentina, Uruguay	0	7,500+	1.3+ billion
04/15-04/18	Flooding	Chile	12	5,000+	100+ million
04/15-04/18	Severe Weather	Uruguay	8	5,000+	25+ million
04/16	Earthquake	Ecuador	673	10,000+	3.4+ billion
08/14	Earthquake	Peru	4	2,600+	Unknown

Europe

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/01-01/08	Winter Weather	Central & Northern Europe	22	Unknown	Unknown
01/12-01/14	Winter Weather	Central & Northern Europe	3	Hundreds	10s of millions
01/25	Earthquake	Spain, Morocco	1	Hundreds	13+ million
01/29-01/30	WS Marita	UK, Scandinavia	1	10,000+	275+ million
02/01-02/02	WS Norkys	United Kingdom	0	Thousands	75+ million
02/08	WS Ruzica	UK, France, Scandinavia	0	Thousands	275+ million
02/27-02/29	Severe Weather	Italy	6	Thousands	25+ million
03/01-03/02	WS Aloisia	UK, Ireland	3	2,000+	160+ million
03/06-03/08	Flooding	Serbia, Croatia, Montenegro	0	1,000+	100+ million
03/09-03/10	Flooding	United Kingdom	0	1,000+	10s of millions
03/27-03/29	WS Jeanne	UK, Scandinavia	1	25,000+	300+ million
04/16-04/22	Flooding	Russia	0	8,000+	Millions
05/23-06/01	Severe Weather	Czech Republic	0	24,000+	80+ million
05/26-06/06	Flooding	Germany, France, Austria, Poland	17	250,000+	5.5+ billion
06/04-06/06	Severe Weather	Russia	0	3,000+	Unknown
06/23-06/24	Severe Weather	Netherlands	0	5,000+	1.1+ billion
07/22	Flooding	Luxembourg	0	Thousands	50+ million
08/06-08/07	Flooding	Macedonia	22	5,000+	75+ million
08/08-08/20	Wildfires	Portugal, France, Spain	5	200+	250+ million
08/24	Earthquake	Italy	297	Thousands	5.0+ billion
09/06-09/07	Flooding	Greece	5	Thousands	56+ million
09/11	Earthquake	Macedonia	0	Hundreds	Millions

Africa

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/01-01/10	Heatwave	South Africa	11	Unknown	Unknown
01/01-02/15	Flooding	Burundi	52	5,100+	13+ million
01/01-03/31	Drought	Namibia	0	Unknown	60+ million
01/01-06/30	Drought	South Africa	0	Unknown	250+ million
01/01-06/30	Drought	Zimbabwe	0	Unknown	1.6+ billion
02/29	Flooding	Angola	54	Thousands	Unknown
03/06-03/09	Flooding	Angola	6	550+	Unknown
03/10	Flooding	Kenya	3	1,000+	Unknown
04/02-04/07	Flooding	Ethiopia	28	1,000+	Unknown
04/06-04/11	Flooding	Somalia, Malawi	19	10,000+	Millions
04/12-04/18	Flooding	Tanzania	3	3,000+	Unknown
04/13-04/17	Flooding	Uganda	0	5,000+	2.7+ million
04/16-04/22	Flooding	Angola	19	5,000+	Unknown
04/29-05/02	Flooding	Kenya	39	2,000+	Unknown
05/07-05/08	Landslide	Rwanda	50	500+	Unknown
05/09	Landslide	Ethiopia	100	Unknown	Unknown
06/01-07/31	Flooding	Niger	14	2,000+	Unknown
06/13	Flooding	Ghana	10	Unknown	Unknown
07/01-08/31	Flooding	Sudan, South Sudan	129+	41,000+	Unknown
07/12-08/09	Flooding	Mali, Burkina Faso	26	10,000+	Unknown
07/13-07/15	Flooding	Sudan	13	2,000+	Unknown
07/27	Severe Weather	South Africa	7	Thousands	250+ million
08/14-09/07	Severe Weather	Nigeria	28	15,000+	Unknown
09/10	Earthquake	Tanzania	23	16,500+	458+ million
09/20	Flooding	Nigeria	29	17,500+	Unknown

Asia

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/01-03/31	Drought	Philippines	0	Unknown	41+ million
01/01-06/30	Drought	India	0	Unknown	5.0+ billion
01/01-06/30	Drought	Vietnam	0	Unknown	675+ million
01/01-06/30	Drought	Thailand	0	Unknown	3.3+ million
01/03	Earthquake	India	22	1,000+	75+ million
01/21	Earthquake	China	0	2,200+	15+ million
01/20-01/26	Winter Weather	China, Taiwan, Korea, Japan, Thailand	116	25,000+	2.0+ billion
01/26-01/29	Flooding	China	11	1,000+	20+ million
02/01-05/02	Wildfire	India, Nepal	18	Unknown	Unknown
02/03	Winter Weather	India	10	Unknown	Unknown
02/05-02/09	Flooding	Indonesia	6	4,000+	Millions
02/06	Earthquake	Taiwan	117	Thousands	750+ million
02/18-02/19	Severe Weather	China	0	1,600+	62+ million
02/19-02/24	Flooding	Indonesia, Malaysia	1	7,200+	Millions
02/21-02/26	Winter Weather	China	0	1,000+	15+ million
03/03-03/09	Severe Weather	China	0	4,000+	315+ million
03/07-03/08	Flooding	Indonesia	6	2,500+	Unknown
03/07-03/11	Winter Weather	China	0	1,000+	140+ million
03/08-03/11	Severe Weather	United Arab Emirates, Oman	0	15,000+	500+ million
03/09-03/29	Flooding	Pakistan	141	1,100+	Millions
03/13	Flooding	Indonesia	5	5,900+	Unknown
03/19-03/22	Severe Weather	China	13	82,000+	170+ million
03/25-03/28	Severe Weather	China	0	2,000+	77+ million
03/26-03/29	Winter Weather	China	0	Unknown	146+ million
04/01-04/08	Flooding	China	10	30,000+	45+ million
04/01-04/15	Heatwave	India	300	Unknown	Unknown
04/02-04/08	Flooding	Pakistan, Afghanistan	152	5,000+	Millions
04/08-04/15	Flooding	Saudi Arabia, Yemen, Oman	47	25,000+	100+ million
04/10-04/12	Severe Weather	China	8	22,000+	130+ million
04/13	Earthquake	Myanmar, Bangladesh, India	2	Hundreds	Unknown
04/14 & 04/16	Earthquake	Japan	120	260,000+	38+ billion
04/16-04/17	Flooding	Afghanistan	31	Unknown	Unknown
04/16-04/19	Severe Weather	China	6	2,000+	14+ million
04/20-04/28	Flooding	China	20	16,000+	97+ million
04/21-04/23	Severe Weather	Myanmar	8	10,000+	Millions
04/22-04/25	Flooding	India	18	Thousands	150+ million
04/24-04/27	Severe Weather	China	0	2,000+	216+ million
04/28-05/03	Flooding	China	3	6,000+	31+ million
04/29-05/03	Severe Weather	Myanmar	18	17,900+	2.6+ million
05/01-05/05	Severe Weather	China	4	31,500+	115+ million
05/01-08/31	Flooding	China	475	500,000+	28+ billion
05/09-05/12	Flooding	Tajikistan, Afghanistan	10	5,000+	Unknown

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
05/10-05/15	Flooding	Indonesia	20	Thousands	Unknown
05/12-05/14	Severe Weather	Bangladesh, India, Myanmar	67	Unknown	Unknown
05/14-05/15	Severe Weather	China	1	1,300	93+ million
05/14-05/23	CY Roanu	Sri Lanka, Southern Asia	135	200,000+	1.8+ billion
05/19	Severe Weather	China	0	Unknown	91+ million
05/22	Landslide	India	10	Unknown	Unknown
05/22	Landslide	Yemen	20	Unknown	Unknown
05/22	Earthquake	China	0	46,166+	Unknown
05/22-05/23	Winter Weather	China	0	Unknown	61+ million
05/24-05/30	Severe Weather	China	0	5,000+	354+ million
06/01	Severe Weather	Pakistan	15	Unknown	Unknown
06/01-08/31	Drought	China	0	N/A	6.0+ billion
06/02-6/08	Severe Weather	China	12	50,000+	768+ million
06/06-06/14	Severe Weather	China	4	21,000+	764+ million
06/08-06/11	Flooding	Myanmar	12	4,500+	Unknown
06/12	Severe Weather	India	11	Unknown	Unknown
06/16-06/23	Severe Weather	China	102	25,000+	500+ million
06/17-06/21	Flooding	Indonesia	62	25,000+	25+ million
06/20-06/21	Severe Weather	India	93	Unknown	Unknown
06/20-06/23	Flooding	Japan	7	2,000+	100+ million
06/25-07/01	Flooding	India	55	Thousands	100+ million
06/26-06/29	Severe Weather	China	1	2,000+	165+ million
06/30-07/01	Flooding	Indonesia	0	14,100+	Unknown
07/01-07/03	Severe Weather	China	0	0	117+ million
07/01-07/15	Flooding	India	90	125,000+	100+ million
07/02-07/15	Flooding	Pakistan	46	100+	Unknown
07/08-07/11	Severe Weather	China	4	5,700+	50+ million
07/08-07/12	STY Nepartak	Philippines, Taiwan, China	111	50,000+	1.4+ billion
07/16-07/24	Flooding	China	289	500,000+	4.7+ billion
07/19	Flooding	Afghanistan	17	Unknown	Unknown
07/21-07/27	Flooding	Nepal	122	5,000+	Unknown
07/22-07/24	Flooding	North Korea	14	250	Unknown
07/22-08/04	Flooding	Bangladesh	60	255,000+	10+ million
07/24	Flooding	Indonesia	4	2,600+	Unknown
07/24	Severe Weather	China	4	9,700+	50+ million
07/24-08/19	Flooding	India	560	100,000+	150+ million
07/25-08/12	Flooding	Myanmar	6	45,000+	Millions
07/27-07/28	TS Mirinae	China, Vietnam	5	2,000+	30+ million
07/28-07/31	Flooding	China	4	7,000	91 million
07/28-08/01	Severe Weather	China	3	2,400+	21+ million
07/31-08/03	Flooding	China	5	3,000+	142+ million
07/31-08/03	TY Nida	Philippines, China, Vietnam	0	20,000+	272+ million
08/02-08/05	Flooding	Vietnam	12	1,000+	10+ million
08/04-08/07	Severe Weather	China	19	4,800+	23+ million

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
08/05-08/08	Flooding	Pakistan	32	580+	Unknown
08/05-08/10	Flooding	China	23	12,300+	130+ million
08/07-08/10	Flooding	India	13	15,000+	10s of millions
08/08-08/16	Flooding	Philippines	26	Thousands	10+ million
08/15-08/16	Flooding	Thailand	3	7,500+	Millions
08/18-08/22	TS Dianmu	China, Vietnam	17	4,100+	273+ million
08/19-08/22	Flooding	India	40	10,000+	312+ million
08/20-08/25	Flooding	China	2	11,400+	96+ million
08/20-08/25	Flooding	China	2	12,000+	165+ million
08/20-08/25	Severe Weather	China	0	400+	70+ million
08/22-08/23	TS Mindulle	Japan	2	5,000+	10s of millions
08/24	Earthquake	Myanmar	4	1,000+	1.0+ million
08/26-08/30	Flooding	China	8	8,400+	76+ million
08/27-08/28	Flooding	Pakistan	10	Unknown	Unknown
08/30-09/01	TY Lionrock	Japan, China, Korean Peninsula	550+	50,000+	325+ million
09/04-09/06	Severe Weather	China	2	5,000+	69+ million
09/05-09/06	Severe Weather	China	0	6,400+	54+ million
09/08-09/13	Severe Weather	China	0	2,000+	175+ million
09/12	Earthquake	South Korea	0	6,000+	21+ million
09/14-09/16	STY Meranti	China, Taiwan, Philippines	44	70,600+	2.5+ billion
09/18-09/22	Flooding	China	23	4,100+	21+ million
09/19-09/22	TY Malakas	Taiwan, Japan	1	5,000+	300+ million
09/20-09/22	Flooding	Indonesia	53	2,550+	22+ million
09/21-09/29	Flooding	India	28	40,000+	479+ million
09/26-09/29	TY Megi	China, Taiwan	43	25,000+	940+ million

Oceania (Australia, New Zealand, South Pacific Islands)

Date	Event	Location	Deaths	Structures/ Claims	Economic Loss (USD)
01/03-01/05	Flooding	Australia (NSW)	0	500	25+ million
01/06-01/13	Bushfire	Australia (WA)	2	1,400+	100+ million
01/14	Severe Weather	Australia (NSW)	1	2,000+	25+ million
01/29-01/30	Severe Weather	Australia (NSW)	0	1,300+	27+ million
02/14	Earthquake	New Zealand	0	7,200+	50+ million
02/16-02/22	TC Winston	Fiji, Tonga	44	46,000+	1.4+ billion
03/23-03/24	Flooding	New Zealand	0	2,000+	25+ million
04/04-04/07	CY Zena	Fiji	2	2,000+	10s of millions
06/04-06/06	Severe Weather	Australia	4	43,500+	375+ million
07/16-07/17	Severe Weather	Australia (South Australia & Victoria)	0	Thousands	20+ million
08/22	Earthquake	Australia (Queensland)	0	1,000+	Millions
09/13-09/15	Flooding	Australia (SA, VIC)	1	2,000+	10+ million
09/20-09/30	Flooding	Australia (NSW)	0	2,300+	765+ million
09/28-09/30	Severe Weather	Australia (SA)	0	5,000+	75+ million

Additional Report Details

TD = Tropical Depression, TS = Tropical Storm, HU = Hurricane, TY = Typhoon, STY = Super Typhoon, CY = Cyclone

Fatality estimates as reported by public news media sources and official government agencies.

Structures defined as any building – including barns, outbuildings, mobile homes, single or multiple family dwellings, and commercial facilities – that is damaged or destroyed by winds, earthquakes, hail, flood, tornadoes, hurricanes or any other natural-occurring phenomenon. Claims defined as the number of claims (which could be a combination of homeowners, commercial, auto and others) reported by various public and private insurance entities through press releases or various public media outlets.

Damage estimates are obtained from various public media sources, including news websites, publications from insurance companies, financial institution press releases and official government agencies. Damage estimates are obtained from various public media sources, including news websites, publications from insurance companies, financial institution press releases and official government agencies. Economic loss totals include any available insured loss estimates, which can be found in the corresponding event text.

Contact Information

Adam Podlaha

Head of Impact Forecasting

Aon Benfield Analytics

Impact Forecasting

+44 (0) 20 7522 3820

adam.podlaha@aonbenfield.com

Steve Bowen

Director / Meteorologist

Aon Benfield Analytics

Impact Forecasting

+1.312.381.5883

steven.bowen@aonbenfield.com

Claire Darbinyan

Senior Analyst / Meteorologist

Aon Benfield Analytics

Impact Forecasting

+65.6645.0110

claire.darbinyan@aonbenfield.com

Michal Lörinc

Catastrophe Analyst

Aon Benfield Analytics

Impact Forecasting

+420.234.618.358

michal.lorinc@aonbenfield.com

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