



**North Carolina  
Insurance Underwriting Association (NCIUA)**

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**North Carolina  
Joint Underwriting Association (NCJUA)**

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## North Carolina IUA - RMS Hurricane Summary

Data inforce as of 11/1/2016

### Per Occurrence PMLs:

#### RMS - Stochastic Hurricane View

Return Period	11/1/2015 - v15	11/1/2016 - v16	Overall Change
1,000	\$9,915,265,051	\$8,881,206,421	-10.4%
500	\$7,397,296,370	\$6,622,137,753	-10.5%
250	\$4,886,514,606	\$4,389,927,287	-10.2%
150	\$3,556,319,334	\$3,203,411,774	-9.9%
100	\$2,779,612,194	\$2,513,041,282	-9.6%
75	\$2,310,445,091	\$2,095,668,786	-9.3%
50	\$1,746,246,264	\$1,592,546,095	-8.8%
20	\$832,218,355	\$769,785,552	-7.5%
10	\$370,906,093	\$348,950,422	-5.9%

#### RMS - Historical Hurricane View

Return Period	11/1/2015 - v15	11/1/2016 - v16	Overall Change
1,000	\$9,734,414,632	\$8,719,788,377	-10.4%
500	\$7,060,938,393	\$6,325,425,303	-10.4%
250	\$4,619,583,371	\$4,150,783,703	-10.1%
150	\$3,384,277,618	\$3,050,502,614	-9.9%
100	\$2,640,549,468	\$2,389,378,512	-9.5%
75	\$2,192,492,519	\$1,990,665,557	-9.2%
50	\$1,658,870,753	\$1,514,617,292	-8.7%
20	\$787,573,970	\$729,857,749	-7.3%
10	\$341,884,540	\$322,309,812	-5.7%

### Annual Aggregate PMLs:

#### RMS - Stochastic Hurricane View

Return Period	11/1/2015 - v15	11/1/2016 - v16	Overall Change
1,000	\$10,117,321,854	\$9,067,770,937	-10.4%
500	\$7,566,776,851	\$6,778,680,111	-10.4%
250	\$5,070,317,647	\$4,560,923,782	-10.0%
150	\$3,715,219,422	\$3,352,385,769	-9.8%
100	\$2,918,733,311	\$2,643,221,805	-9.4%
75	\$2,436,458,339	\$2,213,659,526	-9.1%
50	\$1,852,004,491	\$1,691,781,221	-8.7%
20	\$886,338,295	\$820,994,985	-7.4%
10	\$393,310,425	\$370,488,262	-5.8%
Average Annual Loss	\$172,874,940	\$158,949,927	-8.1%
Standard Deviation	\$776,262,812	\$700,123,450	-9.8%
100 Yr PML:Premium	7.1	6.8	-4.9%
Implied HU Loss Ratio	44.3%	42.9%	-3.2%

#### RMS - Historical Hurricane View

Return Period	11/1/2015 - v15	11/1/2016 - v16	Overall Change
1,000	\$9,918,285,468	\$8,890,251,639	-10.4%
500	\$7,226,151,477	\$6,478,067,820	-10.4%
250	\$4,791,267,844	\$4,310,992,739	-10.0%
150	\$3,532,036,764	\$3,188,894,415	-9.7%
100	\$2,770,971,650	\$2,511,904,211	-9.3%
75	\$2,310,301,737	\$2,101,188,754	-9.1%
50	\$1,756,418,002	\$1,606,246,410	-8.5%
20	\$836,856,618	\$776,591,463	-7.2%
10	\$362,099,977	\$341,771,909	-5.6%
Average Annual Loss	\$162,879,323	\$149,863,403	-8.0%
Standard Deviation	\$742,578,889	\$669,716,368	-9.8%
100 Yr PML:Premium	6.8	6.4	-4.8%
Implied HU Loss Ratio	41.7%	40.4%	-3.2%

### Exposure Summary:

	11/1/2015	11/1/2016	Change
Total Limit	\$88,345,908,484	\$81,252,974,196	-8.0%
Premium	\$390,314,085	\$370,918,286	-5.0%
Policy Count	229,190	216,165	-5.7%
Location Count	247,383	232,714	-5.9%

### Modeling Notes:

1. Demand surge ("loss amplification") is included.
2. Storm surge is excluded.

## North Carolina JUA - RMS Hurricane Summary

Data inforce as of 11/1/2016

### Per Occurrence PMLs:

#### RMS - Stochastic Hurricane View

Return Period	11/1/2015 - v15	11/1/2016 - v16	Change	11/1/2015 - v15	11/1/2016 - v16	Change
1,000	\$788,558,061	\$847,548,476	7.5%	\$757,470,082	\$815,726,064	7.7%
500	\$586,867,007	\$643,443,676	9.6%	\$561,113,800	\$616,641,943	9.9%
250	\$404,395,852	\$453,384,657	12.1%	\$384,491,546	\$432,159,676	12.4%
150	\$298,710,525	\$341,382,152	14.3%	\$283,144,937	\$325,197,752	14.9%
100	\$231,227,690	\$269,375,968	16.5%	\$218,806,726	\$256,579,739	17.3%
75	\$190,413,146	\$225,480,440	18.4%	\$180,404,142	\$214,917,409	19.1%
50	\$141,813,225	\$171,942,003	21.2%	\$134,934,473	\$164,374,704	21.8%
20	\$62,521,680	\$80,415,906	28.6%	\$59,725,444	\$77,157,634	29.2%
10	\$24,563,508	\$32,986,954	34.3%	\$22,855,334	\$30,884,608	35.1%

#### RMS - Historical Hurricane View

### Annual Aggregate PMLs:

#### RMS - Stochastic Hurricane View

Return Period	11/1/2015 - v15	11/1/2016 - v16	Change	11/1/2015 - v15	11/1/2016 - v16	Change
1,000	\$803,249,529	\$866,294,157	7.8%	\$771,189,283	\$833,218,023	8.0%
500	\$600,704,361	\$660,881,623	10.0%	\$574,175,085	\$633,239,484	10.3%
250	\$417,238,154	\$470,038,037	12.7%	\$396,596,825	\$447,971,576	13.0%
150	\$310,045,292	\$356,182,284	14.9%	\$293,883,888	\$339,257,556	15.4%
100	\$241,116,009	\$282,277,543	17.1%	\$228,190,633	\$268,826,825	17.8%
75	\$199,232,354	\$236,958,245	18.9%	\$188,706,274	\$225,779,763	19.6%
50	\$148,971,962	\$181,323,684	21.7%	\$141,594,232	\$173,143,538	22.3%
20	\$66,036,262	\$85,080,951	28.8%	\$62,925,947	\$81,422,835	29.4%
10	\$25,933,705	\$34,864,569	34.4%	\$24,077,622	\$32,566,359	35.3%
Average Annual Loss	\$13,107,634	\$15,948,282	21.7%	\$12,372,569	\$15,102,535	22.1%
Standard Deviation	\$62,940,721	\$69,917,306	11.1%	\$59,786,595	\$66,605,721	11.4%
100 Yr PML:Premium	3.2	3.5	7.3%	3.1	3.3	8.0%
Implied HU Loss Ratio	18.4%	20.6%	12.1%	17.4%	19.5%	12.4%

#### RMS - Historical Hurricane View

### Exposure Summary:

	11/1/2015	11/1/2016	
Total Limit	\$16,681,971,210	\$18,350,842,955	10.0%
Premium	\$71,165,137	\$77,253,784	8.6%
Policy Count	145,614	154,672	6.2%
Location Count	183,372	195,052	6.4%

### Modeling Notes:

1. Demand surge ("loss amplification") is included.
2. Storm surge is excluded.

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