



Figure S1 Steps taken in estimating the global burden of neck pain, GBD study 2017.

Table S1 The detailed information of prevalence age-standardized prevalence rate and all-age prevalence number of neck pain in China from 1990 to 2017

	All-Age prevalence number (95% UI), *1000s			Age-Standardized prevalence rate (95% UI), per 100,000 persons		
	Mean	LUI	UUI	Mean	LUI	UUI
1990						
Female	27168	23759	30827	5267.5	4609.6	5961.9
Male	20833	18232	23747	3830.1	3362.1	4333.6
Both	48001	42196	54544	4532.6	3977.0	5113.9
1995						
Female	30834	26954	34934	5267.4	4609.7	5961.5
Male	23573	20668	26808	3830.4	3362.1	4333.7
Both	54407	47718	61627	4532.8	3977.1	5113.9
2000						
Female	35802	31319	40655	5386.8	4705.3	6093.3
Male	26888	23606	30932	3885.6	3430.3	4416.6
Both	62690	55410	71177	4622.7	4072.0	5223.8
2005						
Female	42192	36675	48335	5614.7	4901.2	6392.8
Male	29836	26219	34204	3887.3	3431.6	4417.9
Both	72028	63027	81910	4738.1	4165.1	5358.5
2010						
Female	46148	40024	52940	5517.3	4817.9	6269.9
Male	32717	28587	37474	3896.4	3429.8	4403.3
Both	78866	68853	90239	4696.8	4133.7	5298.5
2015						
Female	49718	43235	56536	5420.2	4750.9	6139.0
Male	35427	30980	40237	3898.2	3430.8	4405.1
Both	85145	74079	96608	4653.4	4100.7	5242.1
2017						
Female	50940	44146	58032	5377.3	4688.5	6097.4
Male	36407	31847	41352	3898.8	3431.4	4405.9
Both	87346	76052	98717	4634.4	4078.6	5223.8

LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S2 The detailed information of the point prevalence rate of different age categories between 1990 and 2017

Age category	1990 prevalence rate (95% UI), per 100,000 persons.			2017 prevalence rate (95% UI), per 100,000 persons.			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
0-4							
Female	0.0	0.0	0.0	0.0	0.0	0.0	0.00
Male	0.0	0.0	0.0	0.0	0.0	0.0	0.00
Both	0.0	0.0	0.0	0.0	0.0	0.0	0.00
5-9							
Female	115.2	68.4	172.8	116.9	69.9	189.5	1.48
Male	118.2	69.3	184.0	118.4	68.3	187.7	0.17
Both	116.8	69.3	178.2	117.7	69.5	188.5	0.77
10-14							
Female	613.3	429.7	841.9	657.4	469.3	910.4	7.19
Male	581.8	405.4	802.3	615.9	433.6	848.8	5.86
Both	597.1	418.9	820.2	634.9	455.4	876.6	6.33
15-19							
Female	1293.9	866.7	1832.3	1429.9	970.2	2052.5	10.51
Male	1081.7	722.2	1548.7	1196.2	806.3	1682.8	10.59
Both	1184.9	785.0	1690.5	1305.6	889.4	1851.2	10.19
20-24							
Female	2208.7	1486.4	3128.3	2284.7	1524.6	3245.4	3.44
Male	1739.3	1179.0	2491.2	1791.4	1202.8	2564.0	3.00
Both	1968.7	1337.8	2786.0	2029.4	1368.2	2859.4	3.08
25-29							
Female	3376.6	2422.4	4719.3	3391.9	2416.9	4791.7	0.45
Male	2713.7	1931.0	3826.0	2705.6	1928.0	3677.7	-0.30
Both	3036.1	2170.3	4182.3	3045.8	2184.6	4250.8	0.32
30-34							
Female	4812.9	3522.6	6636.4	4841.1	3495.7	6681.7	0.59
Male	3978.2	2881.1	5533.6	4011.8	2948.3	5569.7	0.84
Both	4377.3	3206.7	6005.9	4420.9	3215.1	6119.2	1.00
35-39							
Female	6456.7	4673.8	8907.3	6576.6	4682.2	9238.4	1.86
Male	5121.5	3668.7	7117.7	5196.7	3740.9	7334.7	1.47
Both	5766.1	4203.9	7911.0	5874.1	4161.7	8263.9	1.87
40-44							
Female	8908.8	5788.8	12398.4	9127.4	6012.2	12872.4	2.45
Male	6329.4	4193.9	8804.0	6507.1	4211.4	8970.6	2.81
Both	7556.1	5003.1	10427.5	7793.3	5080.0	10775.2	3.14
45-49							
Female	11688.3	8248.8	15723.1	11973.1	8513.8	16463.2	2.44
Male	7542.6	5305.9	10386.1	7716.3	5524.3	10659.0	2.30
Both	9500.6	6775.0	12828.6	9805.8	7013.4	13437.0	3.21
50-54							
Female	13077.7	9292.2	17531.7	13404.7	9476.1	17904.9	2.50
Male	8395.6	5836.5	11464.1	8510.3	5965.8	11427.0	1.37
Both	10599.1	7525.1	14111.9	10947.4	7750.3	14577.7	3.29
55-59							
Female	12073.8	8339.1	16931.5	12289.2	8502.7	17304.3	1.78
Male	8255.7	5555.0	11795.9	8383.5	5782.7	12140.3	1.55
Both	10072.6	6937.4	14077.6	10315.8	7170.5	14455.6	2.41
60-64							
Female	11719.6	8191.6	15826.2	11827.1	8399.0	15887.7	0.92
Male	8334.5	5832.4	11173.1	8498.1	6026.4	11480.2	1.96
Both	9975.9	7031.4	13308.3	10157.0	7198.1	13547.2	1.82
65-69							
Female	13416.7	9465.0	18058.9	13761.7	9753.9	18331.7	2.57
Male	9589.9	6550.5	13015.7	9713.0	6904.9	13390.5	1.28
Both	11534.2	8136.0	15456.9	11768.0	8362.8	15862.1	2.03
70-74							
Female	14499.3	10399.5	19729.0	14749.5	10533.2	20009.0	1.73
Male	10358.7	7099.3	14426.4	10430.4	7204.5	14461.4	0.69
Both	12578.8	9198.4	17108.3	12635.9	9015.2	17129.8	0.45
75-79							
Female	12903.0	9175.0	17657.3	13026.5	9200.2	17948.6	0.96
Male	9636.2	6741.5	13699.5	9718.6	6818.3	13876.9	0.86
Both	11494.9	8211.0	15945.8	11432.5	8123.3	15822.7	-0.54
80-84							
Female	11728.4	8260.8	16198.8	11848.9	8273.5	16494.5	1.03
Male	9580.9	6606.5	13355.5	9640.1	6629.1	13528.4	0.62
Both	10868.3	7618.1	14997.5	10857.5	7617.3	15023.3	-0.10
85-89							
Female	9380.1	6643.2	13020.3	9424.7	6715.6	13061.5	0.48
Male	8536.0	6009.7	11901.9	8622.5	6100.7	11800.5	1.01
Both	9077.0	6500.6	12612.2	9101.0	6474.1	12497.7	0.26
90-94							
Female	6704.2	4852.2	9120.1	6685.5	4826.8	9016.1	-0.28
Male	6708.8	4874.5	9115.1	6773.4	4898.3	9309.2	0.96
Both	6705.7	4897.9	9084.9	6715.1	4910.0	9103.8	0.14
95+							
Female	5575.8	3897.9	7588.6	5553.6	3858.3	7511.0	-0.40
Male	5909.1	4177.4	7927.5	5916.3	4190.3	8032.2	0.12
Both	5673.7	3986.3	7692.5	5650.3	3954.1	7627.8	-0.41

LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S3 The detailed information of the age-standardized prevalence rate in different provinces/regions between 1990 and 2017

Province/region	1990, Age-Standardized prevalence rate (95% UI), per 100,000 persons			2017, Age-Standardized prevalence rate (95% UI), per 100,000 persons			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
Anhui	4510.2	3958.3	5088.8	4621.9	4070.0	5212.3	2.5
Beijing	4610.8	4073.8	5208.1	4655.7	4081.2	5242.0	1.0
Chongqing	4497.3	3944.4	5073.5	4629.0	4075.8	5223.4	2.9
Fujian	4508.6	3955.8	5086.8	4608.2	4057.6	5194.7	2.2
Gansu	4502.0	3949.2	5078.1	4618.0	4065.9	5207.3	2.6
Guangdong	4522.0	3968.1	5105.5	4596.0	4046.1	5181.8	1.6
Guangxi	4508.7	3956.6	5088.1	4606.9	4055.8	5191.6	2.2
Guizhou	4510.6	3957.6	5089.3	4616.3	4063.5	5201.9	2.3
Hainan	4520.8	3967.5	5101.4	4581.4	4033.1	5163.3	1.3
Hebei	4514.4	3960.6	5095.1	4620.0	4067.7	5208.5	2.3
Heilongjiang	4503.8	3951.7	5081.8	4617.5	4064.4	5203.8	2.5
Henan	4522.6	3968.7	5105.5	4644.3	4087.9	5236.6	2.7
Hong Kong	3631.1	3125.9	4232.3	3874.6	3307.1	4550.7	6.7
Hubei	4511.5	3958.4	5090.4	4616.3	4066.2	5206.3	2.3
Hunan	4494.4	3942.9	5070.9	4610.5	4059.2	5197.1	2.6
Inner Mongolia	4480.4	3931.8	5058.0	4593.4	4041.4	5177.3	2.5
Jiangsu	4527.8	3973.4	5112.2	4623.9	4071.9	5215.7	2.1
Jiangxi	4509.6	3956.5	5087.8	4621.4	4069.2	5211.4	2.5
Jilin	4507.8	3953.9	5087.1	4618.7	4066.3	5206.4	2.5
Liaoning	4513.9	3959.3	5092.7	4617.3	4064.9	5204.5	2.3
Macao	4538.0	3980.3	5122.5	4658.7	4096.7	5259.4	2.7
Ningxia	4497.8	3946.3	5074.3	4609.3	4057.1	5195.3	2.5
Qinghai	4512.0	3960.7	5088.9	4595.4	4044.3	5177.9	1.8
Shaanxi	4502.9	3949.3	5080.5	4605.4	4054.9	5191.0	2.3
Shandong	4527.0	3972.8	5111.5	4620.9	4068.4	5209.4	2.1
Shanghai	6065.4	5345.6	6819.1	5740.3	5042.1	6501.0	-5.4
Shanxi	4498.4	3946.3	5074.8	4605.1	4053.4	5190.9	2.4
Sichuan	4504.4	3951.4	5080.8	4620.2	4067.9	5211.1	2.6
Tianjin	4526.9	3971.5	5110.5	4561.8	4015.9	5136.2	0.8
Tibet	4558.6	3998.9	5149.5	4613.5	4062.2	5197.7	1.2
Xinjiang	4481.0	3936.4	5057.6	4590.9	4039.0	5174.7	2.5
Yunnan	4520.6	3967.2	5102.1	4606.7	4054.8	5191.9	1.9
Zhejiang	4500.4	3950.1	5075.5	4602.9	4051.4	5189.1	2.3
China	4532.6	3977.0	5113.9	4634.4	4078.6	5223.8	2.2

LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S4 The detailed information of the all age prevalent numbers in different provinces/regions between 1990 and 2017

Province/region	1990, All-Age prevalence number (95% UI), *1000s.			2017, All-Age prevalence number (95% UI), *1000s.			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
Anhui	2276	1996	2584	3871	3358	4400	70.1
Beijing	535	470	606	1530	1338	1731	185.7
Chongqing	677	593	768	1722	1498	1947	154.5
Fujian	1147	1009	1302	2353	2047	2675	105.1
Gansu	874	764	999	1590	1383	1808	81.9
Guangdong	2523	2219	2864	6456	5634	7353	155.9
Guangxi	1608	1414	1824	2720	2372	3078	69.2
Guizhou	1214	1066	1383	1969	1714	2231	62.2
Hainan	249	220	283	536	467	606	114.8
Hebei	2573	2261	2919	4546	3970	5131	76.7
Heilongjiang	1389	1215	1587	2743	2371	3120	97.5
Henan	3456	3039	3920	5518	4817	6238	59.7
Hong Kong	225	193	262	431	363	508	91.9
Hubei	2201	1929	2500	3662	3174	4153	66.4
Hunan	2485	2182	2819	4135	3597	4681	66.4
Inner Mongolia	829	729	946	1679	1455	1912	102.5
Jiangsu	3078	2708	3491	5412	4713	6132	75.9
Jiangxi	1415	1245	1603	2677	2331	3036	89.2
Jilin	1006	881	1146	1921	1662	2184	91.0
Liaoning	1762	1544	2005	3155	2730	3594	79.1
Macao	15	13	17	43	37	48	184.5
Ningxia	163	143	186	388	337	441	138.4
Qinghai	161	141	185	350	304	401	117.2
Shaanxi	1342	1177	1524	2438	2122	2759	81.7
Shandong	3635	3197	4121	6380	5550	7221	75.5
Shanghai	974	861	1098	2271	1981	2576	133.2
Shanxi	1175	1031	1337	2312	2008	2619	96.8
Sichuan	4672	4093	5309	5419	4722	6144	16.0
Tianjin	417	366	473	959	837	1086	130.0
Tibet	82	72	93	162	141	185	97.0
Xinjiang	547	479	624	1346	1167	1541	146.1
Yunnan	1411	1240	1603	2755	2399	3135	95.3
Zhejiang	1888	1661	2136	3897	3384	4414	106.4
China	48001	42196	54544	87346	76052	98717	82.0

LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S5 The detailed information of age-standardized YLDs rate and all-age YLDs of neck pain in China from 1990 to 2017

	All-Age YLDs (95% UI), *1000s			Age-Standardized YLDs rate (95% UI), per 100,000 persons		
	Mean	LUI	UUI	Mean	LUI	UUI
1990						
Female	2721	1886	3779	525.1	363.8	733.8
Male	2116	1462	3007	386.2	267.6	544.7
Both	4837	3370	6750	454.0	315.7	636.9
1995						
Female	3094	2144	4301	526.2	365.8	734.8
Male	2395	1647	3405	386.7	267.3	546.9
Both	5489	3816	7704	454.8	314.9	639.1
2000						
Female	3596	2484	5060	539.2	372.2	755.8
Male	2732	1900	3848	392.6	272.8	548.3
Both	6328	4380	8864	464.5	321.3	646.4
2005						
Female	4233	2918	5971	562.1	389.0	789.1
Male	3025	2110	4240	392.5	272.5	549.4
Both	7258	5025	10182	475.9	331.0	662.9
2010						
Female	4621	3204	6548	552.2	383.6	779.9
Male	3310	2301	4640	393.3	272.9	549.3
Both	7931	5480	11175	471.7	327.0	662.1
2015						
Female	4968	3432	7020	542.5	376.3	761.1
Male	3575	2480	5018	393.4	272.5	548.4
Both	8543	5912	12042	467.3	324.9	653.8
2017						
Female	5086	3515	7166	538.3	374.6	752.5
Male	3672	2550	5163	393.7	272.6	549.0
Both	8758	6067	12292	465.6	323.4	650.4

Table S6 The detailed information of the all-age YLDs of different age categories between 1990 and 2017

Age category	1990, All-Age YLDs (95% UI)			2017, All-Age YLDs (95% UI)			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
0-4							
Female	0	0	0	0	0	0	0.0
Male	0	0	0	0	0	0	0.0
Both	0	0	0	0	0	0	0.0
5-9							
Female	6150	3072	10352	4075	2147	6984	-33.7
Male	6823	3447	11663	4929	2523	8461	-27.8
Both	12973	6680	21857	9004	4665	15467	-30.6
10-14							
Female	32016	18464	51032	23353	13691	36842	-27.1
Male	32429	18375	50917	25898	15155	40641	-20.1
Both	64445	37476	101026	49251	28941	77810	-23.6
15-19							
Female	83340	49525	133180	53887	31896	86415	-35.3
Male	73948	43057	118260	51433	29647	81514	-30.4
Both	157288	92394	250672	105320	61570	168247	-33.0
20-24							
Female	147587	84616	238678	105184	61272	170663	-28.7
Male	122703	69922	198437	88916	49823	144931	-27.5
Both	270290	154759	438323	194100	110823	313597	-28.2
25-29							
Female	186349	114278	288886	214473	128588	337018	15.1
Male	159586	94176	249931	174746	105104	274625	9.5
Both	345934	209397	536374	389219	234165	600283	12.5
30-34							
Female	208648	126624	331921	294264	178034	460534	41.0
Male	189867	112423	297818	251634	153312	395276	32.5
Both	398515	242186	614575	545898	329118	849873	37.0
35-39							
Female	291124	175498	461075	322648	192741	512753	10.8
Male	250046	146361	401220	266077	161058	416695	6.4
Both	541170	326258	853677	588726	349892	929514	8.8
40-44							
Female	288323	164942	452681	505630	292071	789052	75.4
Male	228612	133962	359731	376804	216718	584960	64.8
Both	516935	299108	803869	882434	508783	1376330	70.7
45-49							
Female	287546	171918	433859	742983	444046	1155726	158.4
Male	210108	122841	322667	501510	300242	783327	138.7
Both	497654	297400	754825	1244493	745552	1944361	150.1
50-54							
Female	294632	173664	446870	800998	480863	1214961	171.9
Male	215165	126554	329837	517561	309589	794103	140.5
Both	509797	302091	776045	1318559	798593	1995561	158.6
55-59							
Female	247657	153610	386465	487076	297856	754294	96.7
Male	188347	115262	295557	342392	210473	531359	81.8
Both	436005	272771	675924	829468	515097	1282854	90.2
60-64							
Female	197900	118570	299084	479913	293297	723038	142.5
Male	151093	91744	230602	350351	217507	535983	131.9
Both	348994	213222	525716	830264	512767	1248330	137.9
65-69							
Female	180775	109802	273846	415141	250123	624627	129.6
Male	126721	75536	193324	287378	171589	439960	126.8
Both	307496	187086	469613	702519	426110	1067738	128.5
70-74							
Female	139625	89253	209216	293363	186241	443289	110.1
Male	87468	55033	135221	201043	125245	311197	129.8
Both	227093	143553	340997	494406	313734	750753	117.7
75-79							
Female	78702	49622	121964	179337	112947	273782	127.9
Male	45134	27982	70806	125803	77528	199184	178.7
Both	123836	78372	192003	305140	192810	470792	146.4
80-84							
Female	37869	23926	57054	109695	68998	164358	189.7
Male	20929	12910	31941	73484	45485	110938	251.1
Both	58798	37168	88621	183179	115165	275971	211.5
85-89							
Female	11184	6948	16989	42435	26172	65455	279.4
Male	5773	3532	8783	26552	16175	40592	359.9
Both	16957	10330	25792	68988	42259	105315	306.8
90-94							
Female	1697	1064	2556	9757	6271	15012	474.9
Male	825	525	1255	5076	3233	7558	515.2
Both	2522	1604	3770	14833	9500	22544	488.1
95+							
Female	198	123	302	1590	993	2405	703.1
Male	88	56	131	623	395	936	604.8
Both	286	180	435	2212	1378	3343	672.7

YLDs, years lived with disability; LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S7 The detailed information of the YLDs rate of different age categories between 1990 and 2017

Age category	1990, YLDs rate (95% UI), per 100,000 persons			2017, YLDs rate (95% UI), per 100,000 persons			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
0-4							
Female	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Male	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Both	0.0	0.0	0.0	0.0	0.0	0.0	0.0
5-9							
Female	12.2	6.1	20.5	12.4	6.5	21.2	1.4
Male	12.5	6.3	21.4	12.6	6.4	21.6	0.6
Both	12.4	6.4	20.8	12.5	6.5	21.4	1.0
10-14							
Female	64.6	37.3	103.0	69.4	40.7	109.5	7.4
Male	61.3	34.8	96.3	65.1	38.1	102.1	6.1
Both	62.9	36.6	98.6	67.0	39.4	105.9	6.6
15-19							
Female	134.9	80.1	215.5	149.5	88.5	239.8	10.9
Male	113.4	66.0	181.3	125.7	72.5	199.2	10.9
Both	123.8	72.7	197.3	136.9	80.0	218.6	10.5
20-24							
Female	228.4	131.0	369.4	237.9	138.6	386.0	4.1
Male	181.6	103.5	293.6	187.5	105.1	305.6	3.3
Both	204.5	117.1	331.6	211.8	120.9	342.2	3.6
25-29							
Female	347.7	213.2	539.1	351.8	210.9	552.8	1.2
Male	282.0	166.4	441.7	281.7	169.5	442.8	-0.1
Both	314.0	190.1	486.8	316.4	190.4	488.1	0.8
30-34							
Female	493.8	299.7	785.6	499.8	302.4	782.2	1.2
Male	411.8	243.8	645.9	416.1	253.5	653.7	1.1
Both	451.0	274.1	695.5	457.4	275.8	712.1	1.4
35-39							
Female	658.8	397.1	1043.4	675.1	403.3	1072.9	2.5
Male	528.2	309.1	847.5	536.8	324.9	840.7	1.6
Both	591.2	356.4	932.6	604.7	359.4	954.8	2.3
40-44							
Female	901.6	515.8	1415.5	929.6	536.9	1450.6	3.1
Male	648.3	379.9	1020.2	667.9	384.1	1036.8	3.0
Both	768.8	444.8	1195.5	796.3	459.1	1242.0	3.6
45-49							
Female	1177.5	704.0	1776.6	1212.3	724.6	1885.8	3.0
Male	770.1	450.2	1182.6	789.0	472.3	1232.3	2.5
Both	962.5	575.2	1459.9	996.8	597.2	1557.3	3.6
50-54							
Female	1309.8	772.0	1986.6	1346.3	808.2	2042.1	2.8
Male	850.4	500.2	1303.6	862.7	516.1	1323.7	1.5
Both	1066.6	632.0	1623.6	1103.5	668.4	1670.1	3.5
55-59							
Female	1197.6	742.8	1868.8	1222.3	747.4	1892.8	2.1
Male	826.9	506.0	1297.6	841.2	517.1	1305.5	1.7
Both	1003.3	627.7	1555.4	1029.7	639.5	1592.6	2.6
60-64							
Female	1151.4	689.9	1740.1	1163.3	710.9	1752.6	1.0
Male	827.5	502.5	1263.0	843.6	523.7	1290.6	1.9
Both	984.6	601.5	1483.1	1002.9	619.4	1507.9	1.9
65-69							
Female	1300.0	789.6	1969.3	1336.2	805.1	2010.5	2.8
Male	941.2	561.1	1436.0	953.4	569.3	1459.6	1.3
Both	1123.5	683.6	1715.9	1147.7	696.1	1744.4	2.2
70-74							
Female	1380.6	882.5	2068.8	1409.6	894.9	2130.0	2.1
Male	999.8	629.0	1545.6	1008.0	628.0	1560.3	0.8
Both	1204.0	761.1	1807.9	1213.1	769.8	1842.1	0.8
75-79							
Female	1211.1	763.6	1876.8	1225.5	771.8	1870.9	1.2
Male	916.8	568.4	1438.2	924.4	569.7	1463.6	0.8
Both	1084.2	686.2	1681.0	1080.4	682.7	1666.9	-0.4
80-84							
Female	1080.4	682.6	1627.8	1091.5	686.6	1635.4	1.0
Male	893.8	551.4	1364.2	897.9	555.8	1355.6	0.5
Both	1005.7	635.7	1515.8	1004.6	631.6	1513.5	-0.1
85-89							
Female	849.7	527.8	1290.7	852.6	525.8	1315.1	0.3
Male	782.8	479.0	1191.0	788.7	480.4	1205.7	0.7
Both	825.7	503.0	1255.8	826.8	506.5	1262.2	0.1
90-94							
Female	596.6	374.1	898.5	594.8	382.3	915.1	-0.3
Male	605.4	385.1	921.1	609.4	388.1	907.5	0.7
Both	599.4	381.2	895.9	599.7	384.1	911.5	0.0
95+							
Female	488.9	303.7	746.0	487.2	304.4	737.3	-0.3
Male	524.8	331.0	779.8	525.3	333.4	789.6	0.1
Both	499.5	313.4	758.4	497.4	309.8	751.6	-0.4

YLDs, years lived with disability; LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S8 The detailed information of age standardized YLDs rate of different provinces/regions between 1990 and 2017

Province/region	1990, age standardized YLDs rate, per 100,000 persons.			2017, age standardized YLDs rate, per 100,000 persons.			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
Anhui	450.9	311.6	633.9	464.3	320.9	647.5	3.0
Beijing	462.2	320.4	651.5	466.9	323.7	651.4	1.0
Chongqing	450.3	314.2	636.4	465.6	324.3	648.5	3.4
Fujian	452.1	312.8	629.9	464.3	322.4	644.0	2.7
Gansu	449.6	312.5	631.6	463.9	322.4	648.8	3.2
Guangdong	452.8	314.5	634.9	461.0	320.7	641.6	1.8
Guangxi	451.7	314.1	631.6	463.7	321.1	648.2	2.7
Guizhou	449.5	312.0	627.9	462.6	324.3	648.1	2.9
Hainan	452.0	315.1	636.2	460.9	319.9	640.6	2.0
Hebei	453.4	315.5	636.5	462.9	323.0	646.7	2.1
Heilongjiang	450.4	313.6	633.4	463.3	321.8	644.8	2.9
Henan	453.8	316.3	636.9	466.9	325.0	651.5	2.9
Hong Kong	366.6	248.2	524.0	390.7	262.9	559.1	6.5
Hubei	450.3	312.9	631.3	462.3	320.9	641.0	2.7
Hunan	450.1	313.4	631.7	463.7	321.9	647.6	3.0
Inner Mongolia	449.2	311.7	630.8	461.7	320.0	645.4	2.8
Jiangsu	453.2	313.8	639.1	464.2	323.5	647.3	2.4
Jiangxi	450.7	315.5	631.0	465.3	324.5	647.6	3.2
Jilin	453.3	313.4	635.9	465.4	322.2	647.7	2.7
Liaoning	452.1	313.4	636.2	463.9	321.0	643.8	2.6
Macao	457.3	318.0	645.0	469.6	326.7	652.4	2.7
Ningxia	451.5	314.4	633.1	464.1	323.7	646.9	2.8
Qinghai	452.8	313.6	634.3	462.5	322.2	645.7	2.2
Shaanxi	453.0	314.2	637.0	463.5	322.0	649.0	2.3
Shandong	454.0	316.0	635.7	464.7	322.7	649.7	2.4
Shanghai	606.6	422.6	850.8	576.3	398.1	804.2	-5.0
Shanxi	450.8	313.2	632.1	463.2	323.9	642.9	2.8
Sichuan	451.2	313.7	633.7	463.6	322.7	646.8	2.8
Tianjin	454.8	316.3	638.3	458.8	319.3	641.2	0.9
Tibet	455.3	316.3	638.8	463.6	321.3	646.9	1.8
Xinjiang	450.1	312.3	631.7	461.7	321.4	646.4	2.6
Yunnan	452.1	313.3	636.8	462.4	322.2	644.9	2.3
Zhejiang	449.6	312.3	629.6	462.9	321.7	648.1	3.0
China	454.0	315.7	636.9	465.6	323.4	650.4	2.6

YLDs, years lived with disability; LUI, lower uncertainty interval; UUI, upper uncertainty interval.

Table S9 The detailed information of the all age YLDs of different provinces/regions between 1990 and 2017

Province/region	1990 All-Age YLDs (95% UI), *1000s.			2017 All-Age YLDs (95% UI), *1000s.			Changes, %
	Mean	LUI	UUI	Mean	LUI	UUI	
Anhui	229	159	322	387	267	543	69.2
Beijing	54	37	76	153	106	217	184.3
Chongqing	68	47	96	172	119	240	152.2
Fujian	116	80	162	237	165	333	104.8
Gansu	88	61	124	160	110	225	81.1
Guangdong	254	177	358	649	452	915	155.7
Guangxi	162	112	226	273	189	383	68.7
Guizhou	122	85	170	197	137	276	61.6
Hainan	25	17	35	54	37	76	114.8
Hebei	260	181	363	455	315	639	75.0
Heilongjiang	140	98	197	275	190	390	95.7
Henan	349	243	488	554	385	782	58.9
Hong Kong	23	15	33	43	29	62	89.8
Hubei	221	154	309	366	253	511	65.3
Hunan	250	174	350	415	285	583	65.7
Inner Mongolia	84	58	118	169	117	239	101.1
Jiangsu	309	214	435	541	375	759	74.7
Jiangxi	142	99	197	269	188	379	89.1
Jilin	102	71	143	193	134	273	89.3
Liaoning	178	123	249	316	218	445	77.6
Macao	2	1	2	4	3	6	183.1
Ningxia	16	11	23	39	27	55	137.3
Qinghai	16	11	23	35	24	50	116.3
Shaanxi	136	94	190	245	171	346	80.5
Shandong	366	255	512	639	442	901	74.5
Shanghai	97	68	137	227	158	318	133.3
Shanxi	118	83	166	232	162	326	96.2
Sichuan	471	328	661	541	375	754	15.0
Tianjin	42	29	59	96	67	135	129.0
Tibet	8	6	12	16	11	23	98.2
Xinjiang	55	38	78	136	94	193	145.0
Yunnan	142	98	200	277	192	391	94.8
Zhejiang	189	132	263	391	270	553	106.5
China	4837	3370	6750	8758	6067	12292	81.1

YLDs, years lived with disability; LUI, lower uncertainty interval; UUI, upper uncertainty interval.