

Table S1: Published studies on background N<sub>2</sub>O emissions from Chinese croplands

Reference	Lat	Lon	MAP	MAT	Sand	Clay	Silt	Texture	Soil C	Soil N	pH	BD	Crop	Crop type	Previous N fertilizer	Duration	Replicate	Cum N <sub>2</sub> O-N	Crop DM yield
	(°)	(°)	(mm)	(°C)	(%)	(%)	(%)								(kg N ha <sup>-1</sup> )	(days)	(n)	(g ha <sup>-1</sup> )	(t ha <sup>-1</sup> )
Ahmad et al. (2009)	29.9	115.5	1360	16.8	-	-	-	Silty clay loam	1.83	0.36	6.6	1.26	Rice	Rice	252	128	3	750	-
Ahmad et al. (2009)	29.9	115.5	1360	16.8	-	-	-	Silty clay loam	1.83	0.36	6.6	1.26	Rice	Rice	252	128	3	590	-
Cai et al. (2011)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Maize	Cereals	150	99	4	400	0.8
Cai et al. (2011)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Wheat	Cereals	150	247	4	110	0.6
Cai et al. (2011)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Maize	Cereals	150	143	4	80	0.8
Cai et al. (2011)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Wheat	Cereals	150	222	4	40	0.6
Cai et al. (2011)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Maize	Cereals	150	143	4	190	0.8
Cai et al. (2011)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Wheat	Cereals	150	224	4	80	0.6
Cai et al. (2013)	35.0	114.4	615	13.9	51	14	35	Loam	0.38	0.04	8.5	1.39	Wheat-maize	Cereals	300	365	4	510	1.4
Cai et al. (2013)	35.0	114.4	615	13.9	54	16	30	Sandy loam	0.38	0.07	8.4	1.43	Wheat-maize	Cereals	300	365	4	1640	12.7
Cai et al. (2013)	35.0	114.4	615	13.9	54	16	30	Sandy loam	0.38	0.07	8.4	1.43	Wheat-maize	Cereals	300	365	4	1420	12.7
Cai et al. (2012)	35.0	114.4	615	13.9	53	15	32	Sandy loam	0.38	0.11	8.3	1.35	Maize	Cereals	300	104	4	920	9.8
Cui et al. (2012)	37.0	118.0	586	13.0	17	17	66	Silt loam	1.77	0.11	8.3	1.42	Maize	Cereals	300	244	5	200	-
Cui et al. (2012)	37.0	118.0	586	13.0	17	17	66	Silt loam	1.77	0.11	8.3	1.42	Wheat	Cereals	300	113	5	300	-
Diao et al. (2013)	39.5	116.4	507	11.5	58	8	34	Sandy loam	1.69	0.07	8.2	-	Cucumber	Vegetables	518	96	4	430	-
Diao et al. (2013)	39.5	116.4	507	11.5	58	8	34	Sandy loam	1.69	0.07	8.2	-	Cabbage	Vegetables	472	123	4	410	-
Ding et al. (2007)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.06	8.7	1.35	Maize	Cereals	200	105	4	440	-
Ding et al. (2007)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.06	8.7	1.35	Wheat	Cereals	200	241	4	160	-
Ding et al. (2011)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Maize	Cereals	150	112	4	110	-
Ding et al. (2011)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Maize	Cereals	150	112	4	110	-
Ding et al. (2011)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Maize	Cereals	150	112	4	250	-
Ding et al. (2011)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Maize	Cereals	150	112	4	160	-
Ding et al. (2011)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Maize	Cereals	150	112	4	180	-
Ding et al. (2011)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Maize	Cereals	150	112	4	160	-
Ding et al. (2013)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Wheat	Cereals	150	233	4	100	-
Ding et al. (2013)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Wheat	Cereals	150	233	4	100	-
Ding et al. (2013)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Wheat	Cereals	150	233	4	180	-
Ding et al. (2013)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Wheat	Cereals	150	233	4	190	-
Ding et al. (2013)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Wheat	Cereals	150	233	4	180	-
Ding et al. (2013)	35.0	114.4	615	13.9	17	11	72	Silt loam	0.73	0.04	8.4	1.40	Wheat	Cereals	150	233	4	150	-
Fu et al. (2015)	28.1	113.2	1500	17.1	-	-	-	Clay loam	1.54	0.16	6.1	1.28	Rice	Rice	120	79	4	580	-
Fu et al. (2015)	28.1	113.2	1500	17.1	-	-	-	Clay loam	1.54	0.16	6.1	1.28	Rice	Rice	120	79	4	620	-
Fu et al. (2015)	28.1	113.2	1500	17.1	-	-	-	Clay loam	1.54	0.16	6.1	1.28	Rice	Rice	135	92	4	320	-
Fu et al. (2015)	28.1	113.2	1500	17.1	-	-	-	Clay loam	1.54	0.16	6.1	1.28	Rice	Rice	135	92	4	540	-
Hao et al. (2012)	39.1	117.0	586	11.6	-	-	-	Loam	1.47	-	-	1.28	Celery	Vegetables	675	140	4	310	-
Hao et al. (2012)	39.1	117.0	586	11.6	-	-	-	Loam	1.47	-	-	1.28	Tomato	Vegetables	675	120	4	550	-
Hu et al. (2013)	36.9	115.2	556	13.1	35	13	52	Silt loam	0.85	0.09	8.2	1.34	Maize	Cereals	279	117	4	600	9.1
Hu et al. (2013)	36.9	115.2	556	13.1	35	13	52	Silt loam	0.85	0.09	8.2	1.34	Wheat	Cereals	935	254	4	240	3.3
Hu et al. (2013)	36.9	115.2	556	13.1	35	13	52	Silt loam	0.85	0.09	8.2	1.34	Maize	Cereals	195	106	4	350	9.0

Hu et al. (2013)	36.9	115.2	556	13.1	35	13	52	Silt loam	0.85	0.09	8.2	1.34	Wheat	Cereals	416	254	4	200	2.5
Hu et al. (2013)	36.9	115.2	556	13.1	42	12	46	Loam	0.85	0.13	8.2	1.34	Maize	Cereals	377	160	4	600	9.1
Hu et al. (2013)	36.9	115.2	556	13.1	42	12	46	Loam	0.85	0.13	8.2	1.34	Wheat	Cereals	288	211	4	240	3.3
Hu et al. (2013)	31.6	120.7	1038	15.5	29	31	41	Clay loam	2.22	0.22	7.6	1.20	Rice	Rice	210	-	4	40	7.4
Hu et al. (2013)	35.2	107.7	584	9.1	-	-	-	Loam	1.74	0.10	8.0	1.30	Maize	Cereals	549	165	4	310	-
Ji et al. (2012)	32.0	119.3	1297	15.1	17	14	69	Silt loam	1.10	0.17	6.9	1.31	Wheat	Cereals	150	209	4	950	2.9
Ji et al. (2012)	32.0	119.3	1297	15.1	17	14	69	Silt loam	1.10	0.17	6.9	1.31	Wheat	Cereals	185	206	4	350	3.2
Ji et al. (2013)	32.0	119.3	1019	15.1	17	14	69	Silt loam	1.10	0.17	6.9	1.31	Rice	Rice	240	132	4	100	6.6
Ji et al. (2013)	32.0	119.3	1019	15.1	17	14	69	Silt loam	1.10	0.17	6.9	1.31	Rice	Rice	240	132	4	90	6.2
Ji et al. (2013)	32.0	119.3	1019	15.1	17	14	69	Silt loam	1.10	0.17	6.9	1.31	Rice	Rice	240	129	4	420	6.5
Ji et al. (2013)	32.0	119.3	1019	15.1	17	14	69	Silt loam	1.10	0.17	6.9	1.31	Rice	Rice	240	155	4	150	7.0
Jiang et al. (2010)	32.0	118.8	1256	16.0	4	51	45	Silty clay	1.31	0.11	6.7	1.15	Wheat	Cereals	250	180	3	140	-
Jiang et al. (2010)	32.0	118.8	1256	16.0	4	51	45	Silty clay	1.31	0.11	6.7	1.15	Maize	Cereals	300	81	3	0	-
Jiang et al. (2010)	32.0	118.8	1256	16.0	4	51	45	Silty clay	1.31	0.11	6.7	1.15	Maize	Cereals	300	78	3	520	-
Li et al. (2013)	47.4	126.6	550	1.5	-	-	-	Clay loam	2.86	0.21	5.9	1.00	Maize	Cereals	469	142	4	640	-
Lin et al. (2011)	29.6	139.6	1577	16.8	-	-	-	Clay Loam	2.48	0.27	5.1	1.35	Rape	Vegetables	150	330	4	160	-
Liu et al. (2011)	34.9	110.7	559	14.7	29	32	39	Clay loam	1.13	0.11	8.7	1.17	Wheat-maize	Cereals	493	361	4	1500	11.2
Liu et al. (2014)	34.9	110.7	562	14.8	17	38	46	Silty clay loam	-	0.11	8.0	1.20	Maize	Cereals	120	-	4	900	6.1
Liu et al. (2014)	34.9	110.7	562	14.8	17	38	46	Silty clay loam	-	0.11	8.0	1.20	Maize	Cereals	210	-	4	390	5.3
Liu et al. (2014)	34.9	110.7	562	14.8	17	38	46	Silty clay loam	-	0.11	8.0	1.20	Maize	Cereals	250	-	4	1010	4.9
Liu et al. (2014)	34.9	110.7	562	14.8	17	38	46	Silty clay loam	-	0.11	8.0	1.20	Wheat	Cereals	180	-	4	1320	4.6
Liu et al. (2014)	34.9	110.7	562	14.8	17	38	46	Silty clay loam	-	0.11	8.0	1.20	Wheat	Cereals	180	-	4	950	4.4
Liu et al. (2014)	34.9	110.7	562	14.8	17	38	46	Silty clay loam	-	0.11	8.0	1.20	Wheat	Cereals	180	-	4	480	5.7
Liu et al. (2010)	31.9	118.8	1250	15.9	6	54	40	Silty clay	-	0.15	6.5	1.24	Rice	Rice	200	-	5	30	-
Liu et al. (2010)	31.9	118.8	1250	15.9	6	54	40	Silty clay	-	0.15	6.5	1.24	Rice	Rice	200	-	5	600	-
Liu et al. (2010)	31.9	118.8	1250	15.9	6	54	40	Silty clay	-	0.15	6.5	1.24	Rice	Rice	200	-	5	760	-
Liu et al. (2010)	31.9	118.8	1250	15.9	6	54	40	Silty clay	-	0.15	6.5	1.24	Wheat	Cereals	163	-	5	1200	-
Liu et al. (2010)	31.9	118.8	1250	15.9	6	54	40	Silty clay	-	0.15	6.5	1.24	Wheat	Cereals	163	-	5	1510	-
Liu et al. (2010)	31.9	118.8	1250	15.9	6	54	40	Silty clay	-	0.15	6.5	1.24	Wheat	Cereals	163	-	5	960	-
Liu et al. (2011)	37.6	112.9	430	9.3	29	39	32	Clay loam	-	0.18	7.5	1.33	Maize	Cereals	225	130	-	180	8.4
Liu et al. (2012)	31.1	104.2	807	16.5	52	16	32	Loam	2.01	0.18	6.0	-	Rice	Rice	297	106	4	110	8.4
Liu et al. (2012)	28.1	113.2	1500	17.1	54	18	28	Sandy loam	1.88	0.18	6.2	-	Rice	Rice	297	106	4	230	6.4
Liu et al. (2012)	28.3	116.3	1400	17.7	42	20	38	Loam	1.77	0.16	4.9	-	Rice	Rice	297	106	4	90	6.7
Liu et al. (2013)	41.1	121.3	258	5.2	-	-	-	Loam	1.32	0.14	7.1	-	Maize	Cereals	237	147	-	1280	10.3
Liu et al. (2013)	41.1	121.3	976	8.3	-	-	-	Loam	1.32	0.14	7.1	-	Maize	Cereals	237	147	-	630	8.8
Liu et al. (2013)	41.1	121.3	447	8.7	-	-	-	Loam	1.32	0.14	7.1	-	Maize	Cereals	237	147	-	540	8.7
Liu et al. (2013)	31.3	105.5	836	17.3	35	7	59	Silt loam	0.51	0.08	8.2	1.34	Wheat	Cereals	130	188	-	40	1.3
Liu et al. (2013)	31.3	105.5	836	17.3	35	7	59	Silt loam	0.51	0.08	8.2	1.34	Maize	Cereals	150	101	-	80	1.9
Lu et al. (2015)	26.7	115.1	1590	18.0	58	11	31	Sandy loam	0.94	0.10	5.0	1.30	Early-rice+late-rice	Rice	365	363	5	1430	-
Lu et al. (2015)	24.7	102.7	785	14.9	-	-	-	Clay loam	1.79	0.21	7.1	1.29	Celery	Vegetables	825	95	4	1950	-
Ma et al. (2014)	24.7	102.7	785	14.9	-	-	-	Sandy loam	1.68	0.17	6.9	1.29	Celery	Vegetables	825	99	4	2340	-
Ma et al. (2014)	31.6	120.7	1288	16.4	-	-	-	Silty clay	2.03	0.21	7.4	1.11	Wheat	Cereals	240	199	4	570	1.8
Ma et al. (2014)	31.6	120.7	1288	16.4	-	-	-	Silty clay	2.03	0.21	7.4	1.11	Wheat	Cereals	240	199	4	620	1.7
Ma et al. (2014)	29.8	106.4	1223	18.4	7	53	40	Silty clay	0.88	0.15	5.6	1.29	Cabbage	Vegetables	232	117	3	800	-

Ma et al. (2014)	29.8	106.4	1223	18.4	7	53	40	Silty clay	0.88	0.15	5.6	1.29	Cabbage	Vegetables	105	87	3	200	-
Ma et al. (2014)	29.8	106.4	1223	18.4	7	53	40	Silty clay	0.88	0.15	5.6	1.29	Cabbage	Vegetables	247	148	3	200	-
Ma et al. (2014)	29.8	106.4	1223	18.4	7	53	40	Silty clay	0.88	0.15	5.6	1.29	Cabbage	Vegetables	134	112	3	100	-
Ma et al. (2014)	29.8	106.4	1223	18.4	7	53	40	Silty clay	0.88	0.15	5.6	1.29	Radish	Vegetables	203	98	3	600	-
Ma et al. (2014)	29.9	106.4	965	19.4	43	20	38	Loam	1.41	0.13	5.7	1.29	Maize	Cereals	252	141	3	1400	-
Ma et al. (2014)	29.9	106.4	965	19.4	43	20	38	Loam	1.41	0.13	5.7	1.29	Lettuce	Vegetables	160	68	3	1200	-
Mu et al. (2006)	29.9	106.4	965	19.4	43	20	38	Loam	1.41	0.13	5.7	1.29	Lettuce	Vegetables	214	185	3	300	-
Ni et al. (2008)	29.9	106.4	965	19.4	43	20	38	Loam	1.41	0.13	5.7	1.29	Pepper	Vegetables	191	129	3	2700	-
Qiao et al. (2014)	45.7	126.6	533	3.5	18	34	48	Silty clay loam	1.62	0.13	7.1	1.05	Maize	Cereals	225	143	4	210	5.9
Qiao et al. (2014)	47.4	126.6	550	1.5	-	-	-	Silty clay loam	2.80	0.22	7.0	1.20	Maize	Cereals	131	-	4	530	3.9
Qiao et al. (2014)	47.4	126.6	550	1.5	-	-	-	Silty clay loam	2.80	0.22	7.0	1.20	Soybean	Vegetables	38	-	4	360	2.2
Shi et al. (2013)	47.4	126.6	550	1.5	-	-	-	Silty clay loam	2.80	0.22	7.0	1.20	Wheat	Cereals	131	-	4	140	1.8
Shi et al. (2013)	37.0	118.0	543	12.5	74	14	13	Sandy loam	1.09	0.04	7.7	1.58	Maize	Cereals	209	98	4	450	6.1
Shi et al. (2014)	37.0	118.0	543	12.5	74	14	13	Sandy loam	1.09	0.04	7.7	1.58	Wheat	Cereals	196	260	5	510	3.2
Sun et al. (2015)	37.0	118.0	543	12.5	74	14	13	Sandy loam	-	0.04	7.7	1.52	Maize	Cereals	243	-	5	430	5.9
Wang et al. (2010)	43.5	123.4	675	7.5	-	-	-	Sandy clay loam	1.37	0.12	7.8	1.25	Rice	Rice	180	-	3	40	-
Wang et al. (2011)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.70	0.14	-	-	Rice	Rice	150	106	4	930	-
Wang et al. (2011)	31.9	118.8	1250	15.9	6	14	80	Silt loam	0.70	0.13	5.7	1.28	Rice	Rice	220	128	4	130	8.4
Wang et al. (2011)	31.9	118.8	1250	15.9	6	14	80	Silt loam	0.70	0.13	5.7	1.28	Rice	Rice	220	128	4	200	9.0
Wang et al. (2014)	31.6	120.7	1178	16.6	7	50	43	Silty clay	1.39	0.20	7.7	1.19	Rice	Rice	180	120	4	180	6.1
Wei et al. (2014)	35.5	104.7	380	6.5	-	-	-	Clay loam	0.70	0.08	8.4	-	Wheat	Cereals	131	121	3	590	-
Wu et al. (2013)	38.8	115.4	572	12.0	43	16	41	Loam	0.80	-	8.5	1.29	Maize	Cereals	270	109	3	200	7.0
Wu et al. (2014)	35.2	107.7	560	9.2	-	24	-	Clay loam	0.65	0.08	8.4	-	Maize	Cereals	180	138	5	550	7.3
Wu et al. (2014)	35.2	107.7	560	9.2	-	24	-	Clay loam	0.65	0.08	8.4	-	Maize	Cereals	180	138	5	460	4.0
Wu et al. (2014)	31.4	120.4	1139	16.0	11	30	59	Silty clay loam	1.14	0.05	6.0	1.20	Wheat	Cereals	247	-	4	540	1.3
Xiong et al. (2002)	39.1	117.0	1552	17.3	28	31	40	Clay loam	0.84	0.35	5.8	1.28	Maize	Cereals	204	106	3	380	2.0
Xiong et al. (2002)	28.3	116.9	1795	17.6	79	9	12	Loamy sand	0.72	0.08	5.5	-	Rice	Rice	262	70	4	180	-
Xiong et al. (1999)	28.3	116.9	1795	17.6	79	9	12	Loamy sand	0.72	0.08	5.5	-	Rice	Rice	262	98	4	230	-
Xiong et al. (1999)	28.3	116.9	1795	17.6	79	9	12	Loamy sand	0.72	0.07	4.8	-	Soybean	Vegetables	35	154	4	660	-
Xiong et al. (1999)	28.3	116.9	1795	17.6	79	9	12	Loamy sand	0.72	0.07	4.8	-	Peanut	Vegetables	104	116	4	530	-
Yan et al. (2013)	28.3	116.9	1795	17.6	79	9	12	Loamy sand	0.72	0.07	4.8	-	Upland-rice	Rice	104	127	4	490	-
Yan et al. (2013)	37.0	118.0	627	14.4	17	17	66	Silt loam	-	0.11	8.3	1.42	Wheat-maize	Cereals	500	365	5	540	9.6
Yan et al. (2014)	37.0	118.0	627	14.4	17	17	66	Silt loam	-	0.11	8.3	1.42	Wheat-maize	Cereals	500	365	5	790	8.4
Yan et al. (2014)	39.5	116.4	507	11.5	58	8	34	Sandy loam	-	0.09	8.3	-	Cucumber	Vegetables	500	94	-	470	-
Yan et al. (2014)	41.1	121.4	610	8.7	57	19	23	Sandy loam	1.32	0.14	7.1	1.33	Maize	Cereals	238	120	5	630	8.8
Yang et al. (2011)	41.1	121.4	610	8.7	57	19	23	Sandy loam	1.32	0.14	7.1	1.33	Maize	Cereals	238	124	5	540	8.7
Yang et al. (2011)	39.4	116.2	-	18.0	-	-	-	Sandy loam	1.35	1.18	7.9	1.33	Cabbage	Vegetables	375	89	4	180	177.0
Yang et al. (2011)	39.4	116.2	-	18.0	-	-	-	Sandy loam	1.35	1.18	7.9	1.33	Cabbage	Vegetables	0	89	4	260	174.0
Yang et al. (2012)	40.1	116.7	-	18.0	-	-	-	Loam	0.98	0.13	7.9	1.54	Tomato	Vegetables	0	163	2	2480	123.0
Yang et al. (2012)	39.4	116.2	-	18.0	-	-	-	Sandy loam	1.61	0.17	7.6	1.10	Celery	Vegetables	375	80	4	220	141.0
Yao et al. (2009)	39.4	116.2	-	18.0	-	-	-	Sandy loam	1.61	0.17	7.6	1.10	Celery	Vegetables	375	80	4	190	129.0
Yao et al. (2012)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.15	8.0	1.16	Wheat	Cereals	0	214	5	880	-
Yao et al. (2012)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.15	8.0	1.16	Rice	Rice	200	138	5	400	5.3
Yao et al. (2012)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.15	8.0	1.16	Rice	Rice	200	138	5	420	4.8

Yao et al. (2015)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.15	8.0	1.16	Rice	Rice	0	138	5	330	5.6
Yao et al. (2015)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.16	7.9	1.20	Amaranth	Vegetables	0	66	5	390	-
Yao et al. (2015)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.16	7.9	1.20	Turnip	Vegetables	418	81	5	250	-
Yao et al. (2012)	32.6	119.7	924	15.9	58	14	29	Sandy loam	1.84	0.16	7.9	1.20	Garlic	Vegetables	393	196	5	90	-
Yao et al. (2012)	32.6	110.6	834	15.3	61	5	34	Sandy loam	1.03	0.12	6.2	1.30	Rice	Rice	150	365	4	540	5.5
Zhang et al. (2010)	33.3	120.8	-	-	65	21	14	Sandy clay loam	1.18	0.06	8.2	1.28	Jerusalem	Vegetables	183	153	5	450	6.4
Zhang et al. (2012)	31.4	119.7	1177	15.7	-	39	-	Loam	2.40	0.18	6.5	1.01	Rice	Rice	298	-	4	760	8.6
Zhang et al. (2012)	39.2	115.3	555	12.3	-	-	-	Sandy loam	0.89	0.11	8.1	1.20	Maize	Cereals	321	116	4	850	-
Zhang et al. (2014)	39.2	115.3	555	12.3	-	-	-	Sandy loam	0.89	0.11	8.1	1.20	Maize	Cereals	138	106	4	3090	-
Zhang et al. (2012)	36.2	117.1	903	13.6	-	-	-	Clay loam	0.98	0.16	7.0	1.28	Wheat-maize	Cereals	465	360	5	1330	7.5/8.6
Zhang et al. (2013)	39.6	115.9	635	11.9	-	-	-	Silt loam	0.20	0.02	8.0	1.21	Tomato-cabbage-lettuce	Vegetables	2122	365	5	1690	167.0
Zhao et al. (2015)	31.6	120.6	1042	15.5	-	-	-	Clay loam	1.88	0.17	6.3	1.20	Wheat	Cereals	210	205	4	620	3.2
Zhao et al. (2015)	31.5	120.7	-	-	28	34	29	Clay loam	3.50	0.22	7.6	1.27	Rice	Rice	368	154	4	20	5.6
Zhao et al. (2014)	31.5	120.7	-	-	28	34	29	Clay loam	3.50	0.22	7.6	1.27	Rice	Rice	368	154	4	80	5.9
Zhao et al. (2012)	42.4	123.9	700	7.4	46	27	27	Sandy clay loam	1.06	-	6.9	1.27	Maize	Cereals	150	145	3	2930	9.9
Zhou et al. (2013)	31.1	121.1	1145	15.6	-	-	-	Silty clay loam	1.63	0.12	7.1	1.34	Rice	Rice	300	134	5	60	-
Zhou et al. (2013)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.85	0.10	8.3	1.32	Wheat	Cereals	200	199	4	1290	-
Zhou et al. (2013)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.85	0.10	8.3	1.32	Maize	Cereals	200	113	4	930	-
Zhou et al. (2013)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.85	0.10	8.3	1.32	Wheat	Cereals	200	198	4	710	-
Zhou et al. (2013)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.85	0.10	8.3	1.32	Maize	Cereals	200	113	4	170	-
Zhou et al. (2013)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.85	0.10	8.3	1.32	Wheat	Cereals	200	202	4	410	-
Zhou et al. (2016)	31.3	105.5	826	17.3	35	7	59	Silt loam	0.85	0.10	8.3	1.32	Maize	Cereals	200	119	4	130	-
Zhou et al. (2014)	31.3	105.5	826	17.3	34	30	36	Clay loam	0.64	0.06	8.3	1.32	Wheat-maize	Cereals	280	330	4	140	1.0
Zhou et al. (2014)	32.0	118.8	1050	15.7	6	14	80	Silt loam	1.26	0.13	6.8	1.20	Rice	Rice	293	135	4	230	-
Zhou et al. (2014)	32.0	118.8	1050	15.7	6	14	80	Silt loam	1.26	0.13	6.8	1.20	Wheat	Cereals	250	212	4	570	-
Zhu et al. (2009&2012)	32.0	118.8	1050	15.7	6	14	80	Silt loam	1.26	0.13	6.8	1.20	Wheat	Cereals	250	212	4	760	-
Zhu et al. (2009&2012)	37.6	112.9	450	9.8	-	-	-	Clay loam	0.94	0.18	8.5	1.33	Maize	Cereals	180	-	4	250	8.8
Zhu et al. (2009&2012)	37.6	112.9	450	9.8	-	-	-	Clay loam	0.94	0.18	8.5	1.33	Maize	Cereals	180	-	4	150	8.4
Zhu et al. (2009&2012)	37.6	112.9	450	9.8	-	-	-	Clay loam	0.94	0.18	8.5	1.33	Maize	Cereals	180	-	4	330	9.9
Zou et al. (2002)	37.6	112.9	450	9.8	-	-	-	Clay loam	0.94	0.18	8.5	1.33	Maize	Cereals	180	-	4	510	9.7
Zou et al. (2002)	31.9	118.8	1000	25.0	4	51	45	Silty clay	1.31	0.11	6.7	1.29	Rice	Rice	300	117	5	1380	-
Zou_et_al. (2009)	31.9	118.8	1000	25.0	4	51	45	Silty clay	1.31	0.11	6.7	1.29	Wheat	Rice	300	207	5	2840	-
Zou_et_al. (2009)	31.9	118.8	1000	25.0	-	-	-	Sandy soil	1.52	0.17	6.3	-	Paddy rice	Rice	200	120	4	300	3.2
Zheng et al. (2000)	31.9	118.8	1000	25.0	-	-	-	Sandy soil	1.52	0.17	6.3	-	Paddy rice	Rice	200	120	4	810	3.9
Zheng et al. (2000)	31.3	120.6	1080	16.0	-	47	-	Loam clay	2.03	0.19	6.5	-	Rice	Rice	191	140	3	728	-
Zheng et al. (2000)	31.3	120.6	1080	16.0	-	47	-	Loam clay	2.03	0.19	6.5	-	Wheat	Cereals	31	228	3	3238	-
Zheng et al. (2000)	31.3	120.6	1080	16.0	-	47	-	Loam clay	2.03	0.19	6.5	-	Rice	Rice	191	140	3	787	-
Zhang et al. (2018)	31.3	120.6	1080	16.0	-	47	-	Loam clay	2.03	0.19	6.5	-	Wheat	Cereals	31	228	3	8124	-
Zhang et al. (2018)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Tomato	Vegetables	1300	107	3	3270	75.1
Zhang et al. (2018)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Cabbage	Vegetables	733	358	3	460	36.9
Zhang et al. (2018)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Tomato	Vegetables	1300	156	3	1150	85.0
Zhang et al. (2018)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Pakchoi	Vegetables	84	90	3	360	67.5
Zhang et al. (2018)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Lettuce	Vegetables	733	119	3	150	13.8
Zhang et al. (2018)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Tomato	Vegetables	1325	166	3	1070	84.1

Zhang et al. (2016)	39.6	115.9	635	11.9	14	23	63	Silt loam	3.40	0.19	8.0	1.20	Cabbage	Vegetables	733	87	3	590	39.7
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Rice	Rice	250	122	3	340	5.9
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Wheat	Cereals	225	212	3	780	2.4
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Rice	Rice	250	122	3	400	5.3
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Wheat	Cereals	225	212	3	850	2.9
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Rice	Rice	250	122	3	420	4.8
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Wheat	Cereals	225	212	3	1180	3.1
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Rice	Rice	250	122	3	330	5.6
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Wheat	Cereals	225	212	3	830	2.7
Yao et al. (2013)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Rice	Rice	250	122	3	370	5.4
Yao et al. (2010)	32.6	119.7	924	15.9	58	14	28	Sandy loam	1.84	0.15	8.0	-	Wheat	Cereals	225	212	3	910	2.7
Yao et al. (2010)	37.0	118.0	586	13.0	17	17	66	Silt loam	1.03	0.11	8.3	1.42	Maize	Cereals	420	99	3	150	6.6
Yao et al. (2010)	37.0	118.0	586	13.0	17	17	66	Silt loam	1.03	0.11	8.3	1.42	Wheat	Cereals	420	246	3	220	3.2
Yao et al. (2010)	36.8	117.5	600	12.8	21	25	54	Silt loam	0.96	0.09	8.1	1.38	Welsh onion	Vegetables	476	155	3	440	5.2
Yao et al. (2010)	36.8	117.5	600	12.8	21	25	54	Silt loam	0.96	0.09	8.1	1.38	Wheat	Cereals	485	247	3	580	4.1
Yao et al. (2010)	37.0	118.0	210	9.8	-	-	-	Clay loam	1.74	0.10	7.7	1.52	Winter wheat	Cereals	125	245	3	253	7.0
Yao et al. (2010)	35.3	107.9	375	9.7	-	-	-	-	0.81	0.10	8.3	1.30	Maize	Cereals	225	153	3	128.5	6.1
Yao et al. (2017)	39.2	115.1	555	12.3	-	-	-	Sandy loam	0.89	0.11	8.1	-	Wheat	Cereals	165	243	3	590	2.1
Yao et al. (2017)	39.2	115.1	555	12.3	-	-	-	Sandy loam	0.89	0.11	8.1	-	Wheat	Cereals	117	243	3	550	2.1
Yao et al. (2017)	39.2	115.1	555	12.3	-	-	-	Sandy loam	0.89	0.11	8.1	-	Maize	Cereals	176	105	3	650	5.1
Yao et al. (2017)	39.2	115.1	555	12.3	-	-	-	Sandy loam	0.89	0.11	8.1	-	Maize	Cereals	123	105	3	590	5.8
Xu et al. (2019)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Wheat	Cereals	285	-	3	550	-
Wang et al. (2016)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Wheat	Cereals	225	-	3	550	-
Tian et al. (2020)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Wheat	Cereals	225	-	3	550	-
Tian et al. (2020)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Wheat	Cereals	245	-	3	550	-
Tian et al. (2020)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Maize	Cereals	390	-	3	750	-
Shu et al. (2021)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Maize	Cereals	300	-	3	750	-
Shu et al. (2021)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Wheat	Cereals	225	-	3	550	4.0
Xu et al. (2019)	38.8	115.4	500	13.0	23	6	71	Silty loam	1.13	0.15	8.3	-	Maize	Cereals	300	-	3	750	4.0
Li et al. (2020)	23.3	113.6	1517	22.5	41	26	34	-	2.23	0.13	5.1	1.15	Vegetables	Vegetables	1010	347	3	12900	106.0
Htun et al. (2017)	34.3	108.0	550	12.9	16	32	52	-	1.71	0.10	7.4	1.21	Winter wheat	Cereals	220	365	3	146	4.3
Cao et al. (2006)	29.3	120.2	-	-	-	21	-	-	1.47	1.52	7.7	1.40	Cabbage	Vegetables	333	93	3	1770	-
Hua et al. (1997)	28.3	116.9	-	-	-	21	-	Loamy clay	1.11	1.16	8.0	1.41	Rice	Rice	100	105	3	136.6	-
Zhang and Zhang et al. (2011)	29.9	115.5	1361	16.8	-	21	-	Silty clay loam	1.57	2.70	5.9	1.28	Rice	Rice	210	126	3	280	6.6
Zhang and Zhang et al. (2011)	29.9	115.5	1361	16.8	-	21	-	Silty clay loam	1.57	3.34	5.4	1.31	Rice	Rice	210	126	3	440	6.5
Cai et al. (1997)	32.5	118.6	724	14.5	41	20	39	Loam	1.07	0.12	8.0	1.47	Rice	rice	100-300	115	3	130	5.2
Chen et al. (2002)	41.5	122.4	680	7.5	-	22	-	Silt loam	2.94	0.08	6.7	1.27	Soybean	Vegetables	50-100	123	3	910	-
Chen et al. (2002)	41.5	122.4	680	7.5	-	22	-	Silt loam	1.10	0.08	6.7	1.46	Maize	Cereals	150-250	123	3	800	-
Chen et al. (2002)	41.5	122.4	680	7.5	-	22	-	Silt loam	1.28	0.08	6.7	1.46	Maize	Cereals	150-250	123	3	800	-
Chen et al. (2008)	32.0	119.3	724	14.5	29	55	16	Sand clay loam	1.67	0.11	6.1	1.41	Wheat	Cereals	100-300	206	3	2600	1.2
Chen et al. (2008)	32.0	119.3	724	14.5	29	55	16	Sand clay loam	1.67	0.11	6.1	1.41	Wheat	Cereals	100-300	206	3	2600	3.7
Chen et al. (2016)	28.1	112.3	1358	16.8	-	48	-	Silty clay loam	1.29	0.26	6.1	1.29	Rice	Rice	165-225	79	3	127.5	7.8
Chen et al. (2016)	28.1	112.3	1358	16.8	-	48	-	Silty clay loam	1.29	0.26	6.1	1.29	Rice	Rice	165-225	85	3	133.4	7.8
Chen et al. (2016)	28.1	112.3	1358	16.8	-	48	-	Silty clay loam	1.29	0.26	6.1	1.29	Rice	Rice	165-225	94	3	255.3	6.2

Chen et al. (2016)	28.1	112.3	1358	16.8	-	48	-	Silty clay loam	1.29	0.26	6.1	1.29	Rice	Rice	165-225	96	3	331.4	6.3
Deng et al. (2012)	31.6	120.5	1080	16.0	28	31	41	Clay loam	1.50	0.16	6.8	1.20	Rice	Rice	250	136	3	430	-
Deng et al. (2012)	31.6	120.5	1080	16.0	28	31	41	Clay loam	1.50	0.16	6.8	1.20	Wheat	Cereals	180	203	3	960	-
Deng et al. (2018)	45.8	126.8	508-583	26-27	-	23	-	Mollisols	1.95	-	-	1.30	Rice	Rice	75-225	118	3	1690.68	5.0
Deng et al. (2018)	45.8	126.8	508-583	26-27	-	23	-	Mollisols	1.95	-	-	1.30	Rice	Rice	75-225	111	3	2046.61	4.7
He et al. (2018)	31.2	120.8	1139	16.0	-	21	-	Anthrosol.	2.26	0.18	5.6	1.25	Wheat	Cereals	125-150	179	4	260	1.3
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	106	3	90	2.7
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	106	3	200	2.9
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	258	3	110	5.4
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	258	3	340	5.0
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	106	3	170	2.4
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	106	3	190	2.5
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	257	3	300	3.9
Huang et al. (2013)	38.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	257	3	640	4.5
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	104	3	88.6	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	104	3	88.6	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	107	3	126.6	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	107	3	126.6	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	102	3	177.22	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Maize	Cereals	260	102	3	177.22	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	257	3	329.11	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	257	3	329.11	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	259	3	189.873	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	259	3	189.873	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	258	3	303.797	-
Huang et al. (2017)	39.8	116.5	500-700	10.0	40	28	32	Clay loam	0.71	0.08	8.1	1.31	Wheat	Cereals	300	258	3	303.797	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt soil	2.13	0.12	7.9	1.34	Maize	Cereals	50-122	92	4	150	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt loam	2.13	0.12	7.9	1.34	Wheat	Cereals	66-104	273	4	30	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt loam	2.13	0.12	7.9	1.34	Maize	Cereals	50-122	92	4	154.4	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt loam	2.13	0.12	7.9	1.34	Wheat	Cereals	66-104	273	4	134	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt loam	2.13	0.12	7.9	1.34	Maize	Cereals	50-122	92	4	50	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt loam	2.13	0.12	7.9	1.34	Wheat	Cereals	66-104	274	4	128	-
Ju et al. (2011)	40.1	116.5	500-700	10.0	27	16	57	Silt loam	2.13	0.12	7.9	1.34	Maize	Cereals	50-122	92	4	157	-
Lan et al. (2013)	33.4	118.9	1198	15.7	1	16	83	Clay soil	1.49	0.14	8.3	1.38	Wheat	Cereals	300	212	3	1760	-
Lan et al. (2013)	31.4	119.8	1198	15.7	1	16	83	Clay soil	1.49	0.14	6.2	1.41	Wheat	Cereals	300	212	3	1910	-
Li et al. (2015)	33.0	118.9	1107	15.4	5	30	65	Silty clay loam	1.59	0.21	5.1	1.35	Amaranth	Vegetables	312-416	89	3	5700	-
Li et al. (2015)	33.0	118.9	1107	15.4	5	30	65	Silty clay loam	1.59	0.21	5.1	1.35	Tung choy	Vegetables	600-800	131	3	12600	-
Li et al. (2015)	33.0	118.9	1107	15.4	5	30	65	Silty clay loam	1.59	0.21	5.1	1.35	Baby bok choy	Vegetables	250-333	127	3	600	-
Li et al. (2015)	33.0	118.9	1107	15.4	5	30	65	Silty clay loam	1.59	0.21	5.1	1.35	Baby bok choy	Vegetables	312-416	58	3	600	-
Ma et al. (2007)	31.3	119.9	-	-	-	1	-	-	1.26	0.13	6.2	1.27	Rice	Rice	200-270	131	3	31.8888	6.3
Ma et al. (2007)	31.3	119.9	-	-	-	1	-	-	1.26	0.13	6.2	1.27	Rice	Rice	200-270	131	3	45.2016	6.7
Ma et al. (2007)	31.3	119.9	-	-	-	1	-	-	1.26	0.13	6.2	1.27	Rice	Rice	200-270	131	3	20.7432	5.6
Ma et al. (2007)	31.3	119.9	-	-	-	1	-	-	1.26	0.13	6.2	1.27	Rice	Rice	200-270	131	3	51.7032	6.1
Ma et al. (2007)	31.3	119.9	-	-	-	1	-	-	1.26	0.13	6.2	1.27	Rice	Rice	200-270	135	3	40.8576	5.8

Ma et al. (2007)	31.3	119.9	-	-	-	1	-	-	1.26	0.13	6.2	1.27	Rice	Rice	200-270	135	3	46.9224	6.5
Ma et al. (2013)	31.6	120.7	704-1250	13.6-16.1	-	24	-	Silty clay loam	2.03	0.21	7.4	1.11	Wheat	Cereals	-	199	3	570	1.8
Ma et al. (2013)	31.6	120.7	704-1250	13.6-16.1	-	24	-	Silty clay loam	2.03	0.21	7.4	1.11	Wheat	Cereals	-	199	3	620	1.7
Ni et al. (2012)	45.7	126.6	533	3.5	18	23	48	Clay loam	1.62	0.13	7.1	1.30	Maize	Cereals	225	143	3	209	5.5
Niu et al. (2019)	35.0	114.4	615	19.3	-	6	-	-	0.42	0.06	8.3	1.53	Wheat	Cereals	225	236	3	180	3.5
Niu et al. (2019)	35.0	114.4	615	19.3	-	6	-	-	0.42	0.06	8.3	1.53	Wheat	Cereals	225	236	3	220	3.8
Niu et al. (2019)	35.0	114.4	615	19.3	-	6	-	-	0.42	0.06	8.3	1.53	Maize	Cereals	225	96	3	360	7.3
Niu et al. (2019)	35.0	114.4	615	19.3	-	6	-	-	0.42	0.06	8.3	1.53	Maize	Cereals	225	96	3	350	7.3
Song & Zhang (2009)	47.6	133.5	550-560	1.9	-	47	-	Silty clay	3.68	0.31	6.1	1.54	Maize	Cereals	250	101	3	440	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	0.75	0.20	6.9	1.15	Rice	Rice	225	132	3	60	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	0.75	0.20	6.9	1.15	Rice	Rice	225	130	3	60	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	1.56	0.20	6.9	1.15	Wheat	Cereals	180	183	3	1100	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	1.56	0.20	6.9	1.15	Wheat	Cereals	180	183	3	400	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	0.75	0.20	6.9	1.15	Rice	Rice	225	108	3	90	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	0.75	0.20	6.9	1.15	Rice	Rice	225	124	3	100	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	1.56	0.20	6.9	1.15	Wheat	Cereals	180	183	3	480	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	1.56	0.20	6.9	1.15	Wheat	Cereals	180	183	3	980	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	1.56	0.20	6.9	1.15	Maize	Cereals	225	108	3	1370	-
Sun et al. (2017)	29.1	106.2	1117	18.4	-	21	-	-	1.56	0.20	6.9	1.15	Maize	Cereals	225	124	3	1850	-
Tan et al. (2017)	37.0	118.0	543	12.5	30	38	32	Clay loam	1.09	0.11	7.7	1.50	Wheat	Cereals	180-270	240	3	220	3.2
Tan et al. (2017)	37.0	118.0	543	12.5	-	38	-	Clay loam	1.09	0.11	7.7	1.50	Wheat	Cereals	180-270	288	3	170	3.2
Tan et al. (2017)	37.0	118.0	543	12.5	-	38	-	Clay loam	1.09	0.11	7.7	1.50	Wheat	Cereals	180-270	236	3	230	3.2
Tan et al. (2017)	37.0	118.0	543	12.5	-	38	-	Clay loam	1.09	0.11	7.7	1.50	Maize	Cereals	240-330	100	3	90	5.8
Tan et al. (2017)	37.0	118.0	543	12.5	-	38	-	Clay loam	1.09	0.11	7.7	1.50	Maize	Cereals	240-330	87	3	280	5.8
Tan et al. (2017)	37.0	118.0	543	12.5	-	38	-	Clay loam	1.09	0.11	7.7	1.50	Maize	Cereals	240-330	104	3	330	5.8
Tan et al. (2018)	45.0	124.7	-	-	-	47	-	-	0.43	0.10	9.7	1.32	Rice	Rice	150	129	3	180	-
Tan et al. (2018)	45.0	124.7	-	-	-	47	-	-	0.43	0.10	9.7	1.32	Rice	Rice	150	129	3	220	-
Wang et al. (2013)	31.6	120.7	1178	16.6	7	24	43	Loam clay	1.13	0.20	7.4	1.26	Rice	Rice	126-180	120	3	180	6.1
Yi et al. (2018)	32.7	119.7	451-462	-	-	21	-	Sandy loam	2.24	0.10	7.8	1.41	Wheat	Cereals	189-270	213	3	620	3.9-4.3
Zhang et al. (2014)a	29.9	115.1	1360	16.8	-	24	-	Clay loam	1.79	0.22	6.6	1.26	Rice	Rice	210	133	3	550	7.7
Zhang et al. (2015)	29.9	115.6	1361	17.8	-	21	-	Sandy loam	1.69	0.22	5.8	1.41	Rice	Rice	180	137	3	2040	8.7
Zhang et al. (2015)	29.9	115.6	1361	17.8	-	21	-	Sandy loam	1.69	0.22	5.8	1.41	Wheat	Cereals	144	137	3	1670	5.7
Zhang et al. (2009)	31.3	120.4	1038	15.5	-	10	-	-	1.61	0.18	7.1	1.43	Rice	Rice	100-300	213	3	270	7.5
Zhang et al. (2009)	31.3	120.4	1038	15.5	-	10	-	-	1.61	0.18	7.1	1.43	Wheat	Cereals	100-250	117	3	130	4.5
Zhou et al. (2014)	30.3	105.5	826	17.3	36	12	-	Silt loam	0.97	0.12	8.0	1.12	Rice	Rice	150-180	185	3	740	0.5
Zhou et al. (2014)	30.3	105.5	826	17.3	36	12	-	Silt loam	0.97	0.12	8.0	1.12	Wheat	Cereals	150-180	204	3	390	0.5
Zhou et al. (2014)	30.3	105.5	826	17.3	36	12	-	Silt loam	0.97	0.12	8.0	1.12	Rapeseed	Vegetables	150-180	175	3	110	0.5
Zou et al. (2005)	31.9	118.8	1100	20.0	4	51	45	Silty clay	1.31	0.11	6.7	1.28	Rice	Rice	150-450	117	3	1380	-
Zou et al. (2005)	31.9	118.8	1100	20.0	4	51	45	Silty clay	1.31	0.11	6.7	1.28	Rice	Rice	150-450	117	3	1380	-
Zou et al. (2005)	31.9	118.8	1100	20.0	4	51	45	Silty clay	1.31	0.11	6.7	1.28	Wheat	Cereals	100-300	207	3	2840	-
Zou et al. (2005)	31.9	118.8	1100	20.0	4	51	45	Silty clay	1.31	0.11	6.7	1.28	Wheat	Cereals	100-300	207	3	2840	-
Zou et al. (2003)	31.8	118.9	1100	20.0	-	49	-	Silty clay	1.75	0.11	6.7	1.28	Rice	Rice	-	122	2	960	-
Zhou et al. (2017)	30.3	105.5	826	17.3	-	12	-	Silt loam	0.97	-	8.4	1.12	Rice	Rice	-	123	3	510	-
Zhou et al. (2017)	30.3	105.5	826	17.3	-	12	-	Silt loam	0.97	-	8.4	1.12	Rice	Rice	-	123	3	320	-

Zhou et al. (2017)	30.3	105.5	826	17.3	-	12	-	Silt loam	0.97	-	8.4	1.12	Rice	Rice	-	123	3	330	-
Zhou et al. (2017)	30.3	105.5	826	17.3	-	12	-	Silt loam	0.97	-	8.0	1.12	Wheat	Cereals	-	181	3	1330	-
Zhou et al. (2017)	30.3	105.5	826	17.3	-	12	-	Silt loam	0.97	-	8.0	1.12	Wheat	Cereals	-	181	3	420	-
Zhou et al. (2017)	30.3	105.5	826	17.3	-	12	-	Silt loam	0.97	-	8.0	1.12	Wheat	Cereals	-	182	3	240	-
Zhou et al. (2015)	30.3	105.5	826	17.3	-	13	-	Silt loam	0.99	-	8.3	1.12	Rice	Rice	-	111	3	400	-
Zhou et al. (2015)	30.3	105.5	826	17.3	-	13	-	Silt loam	0.99	-	8.3	1.12	Rice	Rice	-	111	3	30	-
Zhou et al. (2015)	30.3	105.5	826	17.3	-	13	-	Silt loam	0.99	-	8.3	1.12	Rice	Rice	-	111	3	200	-
Zhou et al. (2015)	30.3	105.5	826	17.3	-	13	-	Silt loam	0.86	-	8.3	1.12	Rapeseed	Vegetables	-	181	3	840	-
Zhou et al. (2015)	30.3	105.5	826	17.3	-	13	-	Silt loam	0.86	-	8.3	1.12	Rapeseed	Vegetables	-	181	3	400	-
Zhou et al. (2015)	30.3	105.5	826	17.3	-	13	-	Silt loam	0.86	-	8.3	1.12	Rapeseed	Vegetables	-	182	3	100	-
Zhang et al. (2014)b	32.0	122.0	-	-	-	17	-	-	1.57	-	7.9	1.40	Rice	Rice	-	154	3	79.2	-
Zhang et al. (2012)	39.2	115.3	-	-	-	21	-	-	0.89	-	8.2	1.41	Maize	Cereals	-	105	3	902	-
Zhang et al. (2012)	39.2	115.3	-	-	-	21	-	-	0.89	-	8.2	1.41	Maize	Cereals	-	115	2	850	-
Zhang et al. (2013)	35.2	113.8	-	-	-	47	-	-	0.97	-	8.3	1.39	Wheat	Cereals	-	249	3	290	-
Yang et al. (2007)	41.8	123.6	-	-	-	22	-	-	0.74	-	6.5	1.43	Maize	Cereals	-	188	3	10	-
Xiang et al. (2015)	31.4	120.4	-	-	-	21	-	-	1.14	-	6.0	1.20	Wheat	Cereals	-	186	3	540	-
Xiang et al. (2007)	31.3	105.5	-	-	-	21	-	-	0.48	-	8.3	1.37	Maize	Cereals	-	112	3	820	-
Xia et al. (2014)	31.6	120.7	-	-	-	24	-	-	1.97	-	8.1	1.26	Rice	Rice	-	125	3	780	-
Xia et al. (2014)	31.6	120.7	-	-	-	24	-	-	1.97	-	8.1	1.26	Rice	Rice	-	133	3	120	-
Xia et al. (2014)	31.6	120.7	-	-	-	24	-	-	1.97	-	8.1	1.26	Wheat	Cereals	-	205	3	260	-
Xia et al. (2014)	31.6	120.7	-	-	-	24	-	-	1.97	-	8.1	1.26	Wheat	Cereals	-	199	3	180	-
Wang et al. (1994)	37.9	114.7	-	-	-	9	-	-	0.63	-	8.5	1.44	Maize	Cereals	-	106	1	210	-
Wang et al. (2006)	41.5	123.4	-	-	-	22	-	-	1.40	-	6.7	1.37	Wheat	Cereals	-	76	3	510	-
Wang et al. (2006)	41.5	123.4	-	-	-	22	-	-	1.40	-	6.7	1.37	Maize	Cereals	-	161	3	700	-
Wang et al. (2009)	31.5	120.7	-	-	-	24	-	-	1.20	-	7.1	1.26	Rice	Cereals	-	120	3	90	-
Wang et al. (2009)	31.5	120.7	-	-	-	24	-	-	2.03	-	7.1	1.26	Wheat	Cereals	-	184	3	130	-
Song et al. (1997)	37.9	114.7	-	-	-	30	-	-	0.43	-	8.5	1.44	Wheat	Cereals	-	271	1	707.2	-
Song et al. (1997)	37.9	114.7	-	-	-	30	-	-	0.43	-	8.5	1.44	Maize	Cereals	-	121	1	322.8	-
Pei et al. (2012)	38.1	115.3	-	-	-	18	-	-	0.98	-	6.9	1.44	Maize	Cereals	-	115	3	400	-
Pei et al. (2012)	38.1	115.3	-	-	-	9	-	-	0.63	-	8.1	1.44	Wheat	Cereals	-	255	3	900	-
Pei et al. (2012)	38.1	115.3	-	-	-	18	-	-	0.98	-	6.9	1.44	Maize	Cereals	-	109	3	690	-
Qin et al. (2006)	28.3	112.8	-	-	-	21	-	-	1.12	-	6.6	1.41	Rice	Rice	-	88	3	100	-
Qin et al. (2006)	28.3	112.8	-	-	-	21	-	-	1.12	-	6.6	1.41	Rice	Rice	-	80	3	480	-
Qiu et al. (2010)	30.5	114.4	-	-	-	44	-	-	1.15	-	5.8	1.38	Vegetables	Vegetables	-	356	3	480	-
Qiu et al. (2010)	30.5	114.4	-	-	-	44	-	-	1.15	-	5.8	1.38	Vegetables	Vegetables	-	356	3	490	-
Meng et al. (2012)	34.9	110.7	-	-	-	17	-	-	1.05	-	8.7	1.36	Maize	Cereals	-	108	3	160	-
Li et al. (2018)	34.3	108.1	-	-	-	14	-	-	0.79	-	8.3	1.24	Wheat	Cereals	-	244	4	310	-
Li et al. (2018)	34.3	108.1	-	-	-	14	-	-	0.79	-	8.3	1.24	Wheat	Cereals	-	241	4	270	-
Liang et al. (2004)	47.4	126.6	-	-	-	23	-	-	1.37	-	7.0	1.30	Rice	Rice	-	125	3	200	-
Liang et al. (2004)	47.4	126.6	-	-	-	23	-	-	1.37	-	7.0	1.30	Maize	Cereals	-	161	3	900	-
Liu et al. (2004)	40.0	116.3	-	-	-	9	-	-	0.87	-	8.2	1.32	Maize	Cereals	-	49	4	120	-
Liu et al. (2004)	40.0	116.3	-	-	-	9	-	-	0.87	-	8.2	1.32	Maize	Cereals	-	49	4	120	-
Iqbal et al. (2009)	30.5	120.4	-	-	-	20	-	-	0.60	-	7.7	1.35	Rice	Rice	-	64	3	870	-
Ji et al. (2010)	31.1	115.1	-	-	-	22	-	-	1.12	-	8.6	1.43	Wheat	Cereals	-	234	3	130	-



Huang et al. (2005)	30.5	120.4	-	-	-	20	-	-	1.08	-	6.9	1.35	Rice	Rice	-	122	3	360	-
Huang et al. (1998)	41.5	122.4	-	-	-	47	-	-	2.94	-	6.3	1.27	Maize	Cereals	-	230	3	300	-
Guo et al. (2012)	38.3	112.7	-	-	-	21	-	-	0.44	-	8.4	1.41	Maize	Cereals	-	137	3	90	-
Dong et al. (2005)	37.0	116.6	-	-	-	21	-	-	0.85	-	8.5	1.41	Maize	Cereals	-	110	3	2450	-
Dong et al. (2005)	37.0	116.6	-	-	-	21	-	-	0.85	-	8.5	1.41	Maize	Cereals	-	110	3	2450	-
Dong et al. (2005)	30.5	120.4	-	-	-	20	-	-	1.08	-	6.9	1.35	Rice	Rice	-	122	3	364.608	-
Chen et al. (2013)	30.8	121.4	-	-	-	21	-	-	1.12	-	7.8	1.41	Rice	Rice	-	124	3	800	-
Chen et al. (2012)	39.3	116.0	-	-	-	6	-	-	1.97	-	8.0	1.40	Vegetables	Vegetables	-	102	3	1230	-
Chen et al. (2012)	39.3	116.0	-	-	-	6	-	-	1.97	-	8.0	1.40	Vegetables	Vegetables	-	105	3	3890	-
Li et al. (2021)	39.9	116.4	672	12.6	29	7	64	Silt loam	1.27	0.11	8.1	1.52	Cabbage	Vegetables	300	100	4	100	91.3
Kong et al. (2021)	31.5	120.5	1063	18.0	43	19	39	Loam	1.70	0.15	7.7	1.03	Wheat	Cereals	240	143	3	660	1.8
Kong et al. (2021)	31.5	120.5	1063	18.0	43	19	39	Loam	1.70	0.15	7.6	1.03	Rice	Rice	240	243	3	310	7.5
Zhang et al. (2021)	30.7	103.8	868	16.0	48	9	44	Loam	3.00	0.18	7.4	1.23	BJGL	Vegetables	100	130	3	1530	-
Zhang et al. (2021)	30.7	103.8	868	16.0	48	9	44	Loam	3.00	0.18	7.4	1.23	Lettuce	Vegetables	100	45	3	1600	-
Zhang et al. (2021)	30.7	103.8	868	16.0	48	9	44	Loam	3.00	0.18	7.4	1.23	Cabbage	Vegetables	100	85	3	780	-
Zhang et al. (2021)	31.3	105.5	863	17.3	48	8	43	Loam	2.80	0.13	8.4	1.21	BJGL	Vegetables	90	109	3	570	-
Zhang et al. (2021)	31.3	105.5	863	17.3	48	8	43	Loam	2.80	0.13	8.4	1.21	Lettuce	Vegetables	90	55	3	690	-
Zhang et al. (2021)	31.3	105.5	863	17.3	48	8	43	Loam	2.80	0.13	8.4	1.21	Cabbage	Vegetables	90	60	3	760	-
Zhang et al. (2021)	31.3	105.5	863	17.3	48	8	43	Loam	2.80	0.13	8.4	1.21	Chinese cabbag	Vegetables	90	78	3	1380	-
Lv et al. (2021)	44.0	87.5	311	7.7	17	30	53	Silty clay loam	1.52	0.10	8.1	-	Maize	Cereals	240-360	365	3	200	4.9
Lv et al. (2021)	44.0	87.5	311	7.7	17	30	53	Silty clay loam	1.52	0.10	8.1	-	Wheat	Cereals	240-360	365	3	700	2.5
Liao et al. (2021)	35.0	114.4	266	20.0	68	16	16	Sandy loam	7.75	0.78	8.1	1.47	Maize	Cereals	200	86	3	2060	10.5
Lyu et al. (2021)	38.9	100.4	146	7.4	60	6	34	Sandy loam	1.25	0.10	8.2	1.36	Maize	Cereals	450	365	4	331	7.0
Lyu et al. (2019)	38.9	100.4	146	7.4	-	-	-	Sandy loam	2.27	0.10	8.6	1.38	Spring wheat	Cereals	180-280	365	4	420	3.6
Liu et al. (2016)	37.9	114.7	457	12.6	54	12	34	Sandy loam	1.51	0.11	8.1	1.27	Wheat	Cereals	240	365	3	800	-
Deng et al. (2019)	29.2	115.8	1561	17.5	-	-	-	-	1.10	0.12	4.5	1.42	Vegetables	Vegetables	400	384	4	1000	-
Ning et al. (2019)	35.1	112.5	300	25.0	57	4	39	Sandy loam	1.34	0.10	8.0	1.35	Maize	Cereals	150	92	3	800	11.3
Ning et al. (2019)	35.1	112.5	300	25.0	57	4	39	Sandy loam	1.34	0.10	8.0	1.35	Maize	Cereals	150	92	3	650	10.5
Song et al. (2018)	36.8	115.0	473	13.2	-	-	-	-	-	-	-	-	Maize	Cereals	250	365	4	1100	6.7
Liu et al. (2020)	35.0	114.4	615	13.9	-	-	-	-	-	-	-	-	Maize/wheat	Cereals	200	365	3	700	-

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