

Table S3 The Information of sex-linked loci of *E. multiocellata*

Locus	F count	M count	Criteria for sex-linkag	GBS-tag (T or F)	Seq
482326	7	0	(iii)		TAAACATCATTCCACTAAAAGTAAACAAAATGGGCAGGGTTCACCAGTCCTTTCACCATAAGCCCTGTGCAATGA TGTCTGCTTGAACAACAGGGTTTTCCCCTTTCCTTCCCCTATGCCCCCCTTACAGGGGTGGGG
753445	8	0	(iii)	T	TAAAGACCCTGTAGAAAGCTGTGCTTCTGTACTCTGACACTATCCCATCTGGATTTTTTCCCCTTCCATGAAGAA ATTTCAAATATATTAGCCTCATCTGCCATGAGTGGCTAATTATCTGATATGCTAATGTGAAAATGATT
1363913	7	0	(iii)		TAAGTCCTCTAGGTAAGTGCTTGTGATCCTAGGCAAGTAAGCCACAAGGACTGGAGATAACTTGTGACATTTATGT AAACCATTCTTGACTTTTTTTTTCTTTCTTTTTTTTTTGTAGAAAAGACAGTTACAACAAAGTAGCAAATACCCACTTT TC
1821010	8	0	(iii)	T	TAACCTTTTTTTTTTGTGTTTTGGGGGGGGGGAGGGAGGCAATCAAATGAAATCCCACAAGCTGTCATTGAGCAAAC ACTGACAACACTATATTATGGTATGTATAGGAAGGCTGGGGAACCTTATGGCCTTTTGGTACTGTTGGATTCCAAT
2091823	7	0	(iii)		TAAAGGGAATGCAGTGACGCTACACAGGCAAGAAATGAAACCCCCCTTTTGTGTGTAAGTTGGAATGGTTTG CTTGGAAGTACTTCAGAGAGTTGTTACCCAGTTTCTGAAAGGGGGCGCAGTGAGTGACAGTATGCTGAGTCGG AGGGAGAGCTGTG
2280877	8	0	(iii)	T	TAACCTCCGAGCCAGTTGGAGTCAGTTGGGAACAACGTCAAGGGGTGACCGTTAGAAATTTGAATTGGAGGGAG GAGTATAAAAAGGGAGAAGTACCAGTGTGAGAGTTAATTAGAGTTAGAGTGAGAGTTCTGGGAGAGAGTGTGTG GGTGGTAATTG
2496572	7	0	(iii)		TAATGCAAGGACTTCAACTTGCCCGACAGGACTTCTCTCCCTCTCCCTCTCCCTCTCCCTCTCCTTCTCC CTCTCCCTCTTTCTCTGTAGCCCTGAATCCCAGAAGCCAGTTCTGGCATTTCCTGATGCTCTGGAGCAGATTGAAT GGATGGAGACACAA
2509101	8	0	(iii)	T	TAAAAATTTTATTATTTTTGAAAAGAACGGTAAGGGGTTTTGCAAAGGTTTGGGCCTGATGGCACTCTTCGAATTG TAAGTAACGTTTCCATGTTTTTGTGCGAGACGATCCGTCCAGCGGTGTAGGCGTTCATTTGCCACAAATTT
2604112	7	0	(iii)		TAAACTTAGGAAGAAAAAAAACCACCTAGTGGCCGAACATATATCCCTGAAGCAGATGCTCTGCCTTGTCATC

2604336	7	0	(iii)		GGCGCTTCGTTGCTGTGCGGTGGCTGCCTGCAAGCGGTTCCCTTGGCGGAAAGGGAAAGGCACTCTGTACATGCTC TAATAGCAAAGACAAAAAGTGGTGAGGATAAGGGGGGGGGGGTGAGAGAGAGATGCTTTTGGGCCAACGAGC AACAGGAAGTTTATATGCAAGAGTCAACCAGCTAAACTCAACTGGAATCTAGCCAGCCCATCTGCCTCCCTCACT
2605241	8	0	(iii)	T	TAAGATCAGAATACAGTGTAAAATTTGACCCCTTGGTCCACATACTGTATGTTGCCAATGTTCCACCTGCATATTATA ACCTTTTTTCTCTTTTTTGCCATTTTCATCATACATGGTTTTGCTTCTTCTTGAATTCAGATT
2605598	7	0	(iii)		TAAACCATCTGGTCCTGGTGATTTTCCTGCTTTTGCCTTTTCTATTGCCCATGTACTTCATGTGGGGTTATTTTCTCA TTCAACATAAACTTGTTATCCGTTGGGATTTTCTTCAATTCTCTCTTTAGATATTTATCAAT
2606222	7	0	(iii)		TAAAAACACTTTGATGACGAGCAGAAAAAGCCCCAACAAACGAGCCCTCTATGTGCACATAGCAATATTTTCAAGG CCTCTGTTTGCTGAGAGTTTCCCAATGGCTGTTTGTGACTCAGTGAAAGCTATTGCTTTGGTGTCGC
2606425	7	0	(iii)		TAAAAAATACATTTTAATTTATATTTTATGATACAACCTTTTTATAATGGAAGATCAATCTCAGAACTGCCGAAAG CCTCCAGTGAAGATGATCCCAAGGAAGCCAAATAAAACTAAACTTTTGACAGGGTATAAAAAATACATGCTACGTG GAGCACATT
2608067	7	0	(iii)		TAAGAAAGTACTAAAGTACACATTCGAGAAAAAGCCAGAGGCCTTCCTACTGGGCATAGTTGGTAAAGAAATAAA TAATAAAGATAGGACATTTTTTAGCTCATTATATATTTTCTCTAGAAGGCCTTCACTACTGGGCAGGTC
2610570	10	0	(iii)	T	TAATTATATTGTAAACCTCATCCCAGAATGGTCTTATTTTTATGCACGTCCACCACATGTGCCATACTGTCCCTACATC CAACTTGCACCTCCAACAGACATTACTACATCCTTTATACATTTTTGCCAATTTGTGTGGTACCA
2612740	7	0	(iii)		TAACAGTTTTTCAAACCTCTGTTGCAAAACACTTTTTCATCTGTCAGGGACTGACACCATGCAAAACACCACCATCCG ATAAATTTACTCCCTCTGCCATCTTCATTATAAATAGCCTCTGTATCTTCCATATTGTGCAACATCT
2613373	8	0	(iii)	T	TAAGTACCCACCACCCAAAAGTACAATAGAATTCCTTTGCATGTGTGGAGCCTTAGGCAATTCTGATGATGAGATT TGGGGCTTCCCTTGGCAGACAGTGAGCTCAGCAATGGTCTCCTCAGGGCATTTCCTTGAGTTAGAGG
2613552	7	0	(iii)		TAAGCACCTCTTACTTGCCTTTTTCCACACCAACCCACAAGCCCATAGATGTTGTAAGCTTTACTCATAGGAGAG AAGGGACACGGGTGGCACTATGGTCTAAACCACTGAGCCTCTTGGGCTTGCCTATCAGAAGGCTGGCG
2614555	7	0	(iii)		TAATACAAAAGGTCTCAGGAAAGAAGAGGGTGCAATAATTCTAATTCAGCAAGGAATACATCATTATAACCATCGG TTGGGAACCTTTGGCTCCCCGCATATCACTGAACTATAATTCCAATTAGCCCCAGCAAACAAACCAAT
2615254	7	0	(iii)		TAACAAGAAGAACCAGAGGCAGGGGGTCTCCAAGGACAGGACTGGATGCAGAGGGACACATTTGAGCTCAG GATCTGAAGGAGAGGACAGGGAGGGGGCAGGTGCTGCAACAGCATCACAGCAGAAGCCTGGTCCCTCTTCC

2615774	7	0	(iii)		TAAAGATAAGCAAACCTCCTACACAGAGAGCTCAGTAGCAGAGAACTGGGCAAAGAAAGCTGCATGTTTATTTGAG AAGTGCTGTAGCTCAGTGGTAGAGCATCTGCTTCCCCCAAGTTTGAACCCCAGCAGCTCCAGGTGGAGG
2618458	7	0	(iii)		TAATTCTCTATAAGGCAGTCATATCTGTAAAAATGGGCGCTGCTGTGATCGACCTCACAAAGCTGTTGTGCGGGCA AAACGTTGCCCCAAATTTCCAGGGCATTTTGCACTACGGAGTTTTGCGACAACACTGAGAAAAGCTCTCT
2619237	8	0	(iii)	T	TAATGTATGCTGCAATAAATCATTTTTGATAAAAGCAAGCTGGCTGCAAAGTGCAGTTCTTGCAGAGACACCCCTCT AATTGACTCATAACAACGGATAACGACAGAACTTATGAGTTTATTTTGGCTCTCTTTCAATGGCTGG
2623261	7	0	(iii)		TAATCTCTGACCTCTCTCTGTTTCTTCTCCCAAGGCCACTCCTCTACCTTTACCAAAGTTCCTTTACAAACTTTGCT GGCTTCTGGGCCAGTTCTGCCAACTGACACCAGCAACAATAGAGATAGAATCACAGGATCTGATT
2623385	8	0	(iii)	T	TAAGAAAGCAGGAAGGGGAGTGGCTATACTATTGCTCAAACCTGTCCAAGACAGAGCAGTAGTCTGCAGAGGTAG ATTGCCTTGAGCTAGTTAGTGTGGAATGGTGTGCATATCCTTGACCTTAGGAGCTGATGTAATGGAGT
2624170	7	0	(iii)		TAATCATTTCTAAACTGGTTCCATGGGGAGAGCATCTCCCACCAGGTAAACATCTGGATTTTACCCTGCTTCAGGGCT CATATAAAGGACCAAAGTCTGCCCGCTTTCAGTTAGACCAGTTAGCGAAACTACTAGGAAATGGGG
2624288	7	0	(iii)		TAAACACAGCTCAGACGTGACAAGAATGAACGCCTAACCTCAATGCTCTGAAAAAGCCACCAGTCAACAGCGCC TGTCCAACCTCATCAAGTCAACAACACCCATCAACTGCCCCCAATACAACCTCCAACCAGAACACACCCAAC
2624394	8	0	(iii)	T	TAAGAGGTGGGGGGTAAGTTACAGGGGTGTCCCATATACAGTCATATGGGTGTTGCGATTGGGGTAGTTTGGGCCA TTTGGCACATGGCCGTTTGGTCCCAGGTCTCAGCTGACATGAAGGGCCTTGTTTCAGGGGCAGGCCGTT
2625313	7	0	(iii)		TAAACAGGACTTATGAGTAGAGAGGGCTCAGATTGCACTGCTATCTATCGCTCCATCATAGGAATGAGTATTGCATT GAGAGGAATGAATTTGCAAGTGAGATGTACAGTAATTTATATGTGTGCAAATGTGTTTTGTGCACACTCTCA
2627302	7	0	(iii)		TAAACAGTTCCCAGTCTTTCTCCACTGCTTCTTCACTGAGGTCGCGGATTCTCCCAGTCATCTCCGCGAGTTCCATG TACTCCAGCAACATCATCTCCACTCTTGCTTGTGCGGTAATTCTTGTGTCTTCCAGTATTTGCAA
2627643	8	0	(iii)	T	TAAGAGTGATATTTTAATTGGAATAATGTGCATTCTCAAAAGTACAATTGACTCTGACGTCCCAATGTAGCAATATAC ACAGAGGAGAGTACAGTATTTTCAGTGCCTCATCTGAAAAAGTTGCTTTAGGATATAACAATTACTGCATTAGCCCT TTATGCCAG
2627651	7	0	(iii)		TAAGAACGGTCCTCTGGAACGGATTTTGGTTGTGATTAGAGGTTCCACTGTAATGTTACTAGTTGGTAGCATAGCTA TACTTCTCCCCCTTCCACCCACACATCTTCTACTTGCCGCCTTCTCCTCCAGCAACCCACTT
2627803	9	0	(iii)	T	TAAGATTACACCTCATAAACTACTTTTGACGACAGGAGGAAAATGTGCCAGGAGTGCATCAGCATGTACCGACGT

					AGCAGCTCTGCCTTCGTGCAGTCGCAGTGGCTTGTAATTGCAACTCCCTGCTGTCAAGGGCGCTTGA
2627893	7	0	(iii)		TAAAAAATAAATAATAATCCTTCCTGGATCACAATACAGTATCATTACATTTAGCAACATATAGAGAATCCACAAC
					AGAAGCTGTTGGGGAAAAACAATTCTGTATCAGGAAGCTTATACTGTTTGATGCTTTATTATGTTTTATATATT
2627947	7	0	(iii)		TAACCCATGTCTGAGGCCCCACTGCTGCGCCCCAGATATGGTCCCGAACGCACGCGCGTAAAAGTGCGCTGTTCG
					TCCGAATGGAGATGGGGAATTTAGCACTCCTGGCTGCGTCACGCTCTTTCCTGCTGCTCACGGTGGACA
2628103	10	0	(iii)	T	TAACCTGCCTGCTTCTTACTTGAAGAGCCTCTTCTTCCACTTCCAACCTGTCTGTCCCCACCTTCTTCTGACT
					GCTCAGACTCTTCCCTTCCCTTTGCCCTGGCTCCTGTTTCACAGGTGGCAACAAATAGCCATAAAAT
2628230	7	0	(iii)		TAACCTTCTCTTCTCCAGGCTAAACATCCCCAGCTCCCTAAGCCGTTTCTCACAAGGCATTGTTTCCAGGCCTTTGA
					CCATTTTGGTTGCCCTCCTCTGGACACGCTCCAGCTTGTCCGTATCCTTCTTGAAGTGTGGGGCCCAA
2628336	10	0	(iii)	T	TAATTTCTTGCGTAGCGGAAGCTTTCAGCTTATTTTGCCAAGAGTGATCAAAAATAAAGGCAGCAACACTGTTTCT
					TCTAATCTACAGTGTTTATTAGCAAACTTCAAAAACAACAAACAGTATATATATTACAGATAACTTC
2629184	8	0	(iii)	T	TAAGCCCCCAAAGCGGGAGAATCCCGCAAAAAAATGGGAGGGTTGACAGGCATGCTGGGGAGAGTCCAGAAG
					GCCAGATAGATGTGATGCTCATGGAGCTATACAGAACCCAAATCCTAATAATTAGCAGAAGAGATACATCACATGTC
2629307	10	0	(iii)	T	TAAAAACTTTTGAGCTACTGTGGATGACTGTCCATCACTACCCACAGCTTGTTGTTGCTTCTTAGCTGCCTCCCATC
					ACAGTTCTTCCACATTTCTGTAGTGGCAACCTTGCCCCATCCTAGTTGTCATAGTCCCTAATGATA
2629531	7	0	(iii)		TAAGAATTCCTTTGGCATTTTAGTCACTGTGTGTTTTTGAATTTACATTATCTACAGTATGTGTTCTTCTTCCAGCAA
					ATGCCTCTCCAGGACTTGCAGCTTCCCTGGTTGCCTGAAAGAGCAAGTAGGGAGATAITTCATGATGTCT
2629796	7	0	(iii)		TAATAATAGATGATCCTCTCTTCTTCCCTCCCCCCCCCTCACTTGCTTTGCATGTGTAACCAAGCTGTGGTCAGATAAT
					GCAGCTGGCCCTTTGTTTGACACATTTGGGGAAGAATGACCCCTGGGACAGGATGCAGCAGTGTGCAAAGCT
2629867	7	0	(iii)		TAAATCCGTATAGACTTACCCATGTGTACAGCAGGGAGGATAAATACCAAGGAAACAAAGCAACTGGTCAGGAAC
					ATGTTTGGGTGTGGAGATGCACTTTGAAGATATGCCTCGTCTTCTGAAGACCTGTAAAGAGGAGCAGGG
2630176	9	0	(iii)	T	TAAGCTTCTGGGCGGGGAACAGACAATCGGTACTTCGAGGTTCTGATTCTGACTAAGCATGTCTACTTTCTGCTT
					TGCTGTACATAATGCAATAAAGTTAGTTAGTACTACCAGTTGGCTGGTTTATGTCTGCGGACGCTGAT
2631438	7	0	(iii)		TAATTATATTATTTAGTTTTGATCTCACATCTCTTTATAATATAGAACTATTACTTATCTGAGGGCCAAATGGCTTCT
					ACTCTGGAAGTTTCTATTGTACATGGGCTTATGTCAGGGGTATCCACTCTTCCCATTATTGTT
2632474	8	0	(iii)	T	TAACAAATAAGGACTGTGGCAGGAAAGGGGGCCAAAAATAAGGAAAATCCCTGGAAATAAGGGATACTTGACAG

2632491	7	0	(iii)		CTATGGCGATGGGGTGAGCTCCCGTTGCTCAGTCCCAGCTCCTGTCAACCTAACAGTTCAAAAGCACTTT TAAGTACGGACCTCCAGAACAGATTATGGTTGTAAGTAGACTCACCACCTTTAGCTAATGGGGGCTTCTGCTACCA CCGTGCCGCTAGCACGCGATTCTGTACTCATCTTGAGGCAAAGGTTGTAACCTGGAGCAACTACTTC
2633125	7	0	(iii)		TAATGTCGGTTCAGAGGTCAGTCTCATGGAAATGGAGATGAAATGAAAGACTATGGCAAGGTGGACAGTGCT CCCGCTTGGGTGGCCGTCCAACCTTCATGACTCCTTGCACTCCCTCCTTAGGGCTCTTTATTTTTACTACT
2634103	10	0	(iii)	T	TAATAGAGATATATAATAATCAGAAGAAACATACAAGTGGAGTCATGATGCCAGTCTGAGGATTGTGGTCCTGAA CACAATGGCCAGGCTCAACAGCATGTATGAATTCTGATCATAAATCCCACATGATTCCTACAATGCAG
2634483	7	0	(iii)		TAATCCAGTAGTTTCTGCTTTCAAAATAAAGTGCTCTTCAGCTGTAAAAATGACCACCTCCAATGAGAGGATCAAA GATAATGCGTCTGATTCTAGAGAGGGCTTTTCTTAGCCTTGAGGCCCTTCATGGACTGTGCAATGA
2634869	7	0	(iii)		TAACAGGGATGCGGGGGGCCCTGTAGTCTAAACCACTGAGCTTCTTGGGCTTGCCGATTGGAAGGTCAGCGGTTT GAATCTGGGTAAAGCTCCTGTTTCTGTCCCAGCTTCTGCCAACCTAGCAGCTCAAAAGCACACCCGTACA
2634927	7	0	(iii)		TAATAATAGGCCTGTTTCTCATTATTTCCCCCATACACACACACACACACACACACACGCACACACACACGC ACACAGAGAGAGACACAAGTTCTGGTGGACTCGGGTGGACTTGTGGGTATCTTGGCGACGTTTCGACGAGGTCTC ACTCCTCATCTTCAGGCTG
2635844	10	0	(iii)	T	TAACAAATAATTCGCCAACAGGCTAAAATCTGACCCACAAACAGCACATAGGTGGCACCAGAGCGTACCAATACA CCCACCCCTCCCACAACACACCAATGATGTTGCTAGTAATCTTAGCAACATTGCTCACAAACCTCATGC
2638060	8	0	(iii)	T	TAATTTGTGATTTGTGATTGATGGAGTCGGCATGGAGAGAAGAAAGAAAAGACTCTCAGATTCCCCACTTTCCCAA ATGTTGCAGTTCTTTTATCAGGTAGCTTATGTCCAACAAATCATAGTTACCTCACCAAAGACTCTTAT
2638191	7	0	(iii)		TAAAACAGGAGGAGGAGGAGTTTGGACTTGATATCCCCTTTATCACAAACCCTAAGGAGTCTCAAAGCGGCTAAC AATCTCCTCTCCCTTCTCCCTACAACAAACACTCTGTGGGTGAATGAGGCTGAGAGACTTCAGAGA
2641161	9	0	(iii)	T	TAAAAAATATATAACCACCTTTTAGAATGGGAACTAAAGACGAGTATGTAAAAGAGGCAATGATCAGGTGGGCC CAGGATATGGGCAAAAATATTATGTTAGAAGAGTGGCAGACTTTATGGAATAAAGGACTGAAGTTTACA
2641543	7	0	(iii)		TAATTTGTTGTTTATTGACTTTATTTACTTCCCTTCAAATTTAGGGGTGGCATTCCATCATTTCTCTGGCAATCATGGA TCATCATCATCATCATCATTATAAGTTTGTATACATCAATATAGGGTCGCCAGGAAGAAATAATGATG
2642383	7	0	(iii)		TAAATCCTTCAAGACTAAAAAGCCATTGATCAGTTTTTATAGATATTAGTATCAGTAAATCAATTTGAACACAAAA TCTAAGAATCCAAAATGTAATACAAATTCCTCTAATCCAAATCCTATTGCTGAGCAGACCACCTTCA

2642522	7	0	(iii)		TAACAGGAACCGCACACACAGCTGGAGATCAAGAAGTAGGACTTGTCTCCTATGGGCAACTGTTGATTTGGGTTT ACAAACTGGCCCTAACTTGGAGACGCCACCAGCCCTGCCGACGAACAAATGACTATGGTGCTAACTGG
2642652	8	0	(iii)	T	TAAGTCACACAGAGCCCTCTGTAACGCCTCTGGGGTCCCATGCTCCTTTTATTTTATTTTATTTTGAAGGAGGAT GTGGGAGGCTGTTTTAGTTTGGTGGTTCATTCTGTCTCTTCCATCCCTCCCTGTAGCGGGTTATGAGCT
2644282	8	0	(iii)	T	TAAGGGATATCGTGTAGGGCAAGAAAGCAATGGCAGCTACAGTAGTTTTATTAGAGGTAAATGTGTAATGGACTGT AGCTGATAGAGGACTTTTTATTTTGTGATGAGAAGCAAATGGTGAGCCACTGTGTGAGACAGAATGG
2645069	10	0	(iii)	T	TAAAGCATCTTCTCCCTCTCTCTTTATTTATAATTGCCATTTGAAACATACAAAAGTGCCTTATATTTAGTCAGAAG ATTGATCTATCTAGATCTGTGCTGACTGGCAGCAGCTTTTCTGGGCTTCAGGCAGCAGACATTCC
2645688	7	0	(iii)		TAAATTGTACCACTAAACCATTATCTTGAAGATGATAAACTGTTTCATTCCACAACAGGTCCATAGACACCGCACAA TTTCTGACAGGAAATTAGTTCCCTCAGTCAGACAGAATTTCAAAAGGAAATCCTAGTCTACAAAACAC
2647001	8	0	(iii)	T	TAAAAAATCCTTTGTATTTTTCTGTCTTCCATCTAACCAAACTTTCTAACAGTAGAGCCTCTGAAGGTAGGAGCCC TGGCTTCAATCTGTGGGTAACCTCTGTGGGATCTGGATTGGCTGTTGCATTTGCATGCAGAAGGTCC
2647600	9	0	(iii)	T	TAAAAACCTGGTATTTGGGAAAATTACTTTCTTGATGCATAGGAACTGAGTCAGTTTACAGAAACCTGGTAAAG TACAGGAAATGTCTGGGACAGGTAGGGCTCTGTGAGTGTGTGATGGAGATGGGGGGAGGAGAAGCT
2647780	7	0	(iii)		TAACGTCAACCATCGGTTTAGGCTTTTCTTTCTGGTACCGAACAGTTGCAAGGCATGAGCCTAGATTTTGCTTAGG AAAACAAGACAAAACAGAAAATGGTGCTATTTACTTCCAAATGAAAGGCTTTTGCATTACCACATTAC
2648122	7	0	(iii)		TAAAAACTTTGATAAACTGTAGCTTTTCAGACATTATTGGCTAGTGAAATAATGGGAGAGGACCAGGATGATGGTT GATTCCTTCCATGACTTTCATTATAATGCAAAACGTTCTAATGTTCCATATCATTATCATATTTCAAT
2648560	9	0	(iii)	T	TAACTTCTGGGTTGTGCGCATACAAAACCCGAAACATTTGACTTCTGACGCATTCACCAAATGAGGTTCCACTGTA TTCCAAATGGAGGGAAATAAACAATGCCAGCTACATGGTTAGCATAGTTTCCCTCCAATTCTGGGGAC
2648724	7	0	(iii)		TAACAGATAAAGTTTCCTTTTACAGCACATATATAGTCTTTCACAGAGATTTCCACATTCTGTTGTAGAGAGACTTA TACAACCATGATCCTTTCTTCAGTTAGCTAATTGGCTGACTACAGATCCTGCCATTCCCTTTTGGA
2650231	7	0	(iii)		TAAAAAGAAAACGGCATAAGTTGAGCCTCAGATAATCTCCACTCCGCTGCCTGAGCCAGCTCTGGGAACCTGTGAT CCCTTATTTTGGCTGCTGTGATCCCTTATTTTCCAAGCCAAAACCTTGACAGCTATGCTTTTGGCCACTC
2650492	7	0	(iii)		TAACACAGGGACTGGGCCGCAAAGTGATGACAACCACATGTCATCCTGAGCCACAAGAGCGGGCTTCCCCCAGTA TGCATCTATGGTTTGCTGGGTCTTGGTTTAGCCAGCATTTCTAAACTAATTATGGAACCTTGAGTATGC

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					GCTTCTTCAGGTTACAT
2660240	7	0	(iii)		TAATGGAAGAAATACCTGTAAGCCTCTGTAGATGCTGGATGTAGATGTTTATGTAGATGTGGAAGAACTGGGCAAAAC GTAGCAGCTTCTGTTTCATTTTCCCCTTGTTTTTTCATATACCATTATGATACTTGCTGTGTGGCACACCTGGA
2660482	7	0	(iii)		TAAAGGATTTTGGGGGGGGGAGGAGTTGGGAGAAATTAGCTGGAGAGGGGGAGAAAGGGGTTCAGATATGGA GGGGGGGGGTTCCCTTTTACTCTCCCTGGATCTACAAAGGGGCAGCTGGGAGGGGAAGGAGGTTTCTTGGGGGA GGG
2665400	7	0	(iii)		TAACCCGAAGTACCACTGTATTGGCAAACCCTGGAAAAGCAACAACATCCTACAGTTGCATCACAAGGTAACAAA GTTGTAAAGAGCTGAGTTTCCTGCTCTGTTGTTCTTGCTCTGACTTACACCTTTCTAGGACAAAAGAAAGTT
2666913	8	0	(iii)	T	TAATTCTCTCAAATCCATTTCTGGACCTGCCATCGATCTGCGGCCAGAATTGAGGATGCACGCATGCAAACATGAC AATTGTGTTCTGCAGCTTCACATCTGCATCGTTCTCAACTGTTTCAACACAACAGGCTCTCGGTTGTG
2668377	7	0	(iii)		TAAGTCCTCCTTGTTCAAGGTATTCTGATGTGACCCGAAAAATTCTTCTCCTGTTGTTTTTCTGGCAATGCCTTGC AAAAAAAAAGAAGTTTTCTCTAATTGCATCACCATCCACAAAACGCACATTGGCCAAGAGTTGAGCATGTCCACTG ATATCA
2669513	7	0	(iii)		TAAGCAATCATATATGTCCGACAGTCAACTGATTGCGGCAAGTAGAGGGAGGAAGCATGTTCAAGAAACCAAAAAG AATGACTACATAGAAAAAGGAAAAACCTGTCTTTAGAGAATACTTTAGCTTATTGATGCGGCACGTGCT
2675858	7	0	(iii)		TAACCACATCAAAATTACATAAATTTATTTGAGCAGAAACAAATGCTTGGATAAAACAAAATGTTTTCAGTTGCTTG CGAAAGCATCATCCTCAGGATATTTTCTGTGTCTCTTGGGGCAGACTGCTCCAAATTGCAGACTATACCATTGAG
2676964	7	0	(iii)		TAAAGCGTGCGTACACTGCAGGTAGCTGAGGGATCGTTGTAGCGCTGAGGTGGGGTAACTGTACTGACTGCTTGC GCTCGTGGCTTCCTTGCAAACAATGTTCTGTGCAGAACTTATAGTCAAATCTGATAGATTATCTGCCC
2686458	8	0	(iii)	T	TAATACCCCTCCCTTCACCCAGAGGGAAGGTTACATTGTGTAAAAACACAAGAAGAAACACAATAAAGTTACAGTA GACTGTAATAAAAAGCATCAGCAAATCAGTATGAAATAATGGAGGGAGTAGATCATTTTCATATCAACCCT
2691342	7	0	(iii)		TAAGCCATTTCTATAAATTGTGATACCGCCATTTTTTTGTCTAAGGATTTTCATGGCATCCAAAATGGGAAGACCACT GTTTTTGGGAAGGACTTGCCATCCTACATTCTCTAGAATTGACCTCTTATGAATTTTGTGGGTTTGA
2692930	8	0	(iii)	T	TAAACCCTCCATTTGGGAATCCCTTGCAGATAACTGAAGTAGCTGAAGACAGTCAGGTCTTTTCTCCACACCACTG ACCAGAGGAGGAATGACCCCTGGGGGGAACACCAGAATGAAGAAATGCCATTATGAACCTGCAGGAGC
2693823	9	0	(iii)	T	TAACAAAATGACCATTGAATACAAATATGTCCTGATGCCAAACCGCTTGTGGCACTGCAGTGTCTATCTACAGGAC

2695650	8	0	(iii)	T	CAC TTTT TAGCTGAAGGGTATGGCACAAAGAAAACCAGCAAGCATGCTGCAGCAGACGAGGCACTGAA TAAGCGACTTTGCTAGCATAGATTACAGCTGGGACCCTGAGTTCCAGTGATGAACCTGTGAGATTCAAAGCTGCAA ATTCTCTGGAAATCAAGCTGGAGAACTCCCAGATTGCAAATGTGATGCATGGGAGGAGGGAATGAAATC
2695803	7	0	(iii)		TAATGTTACATAAAATGCAGGTGGTGTGTGGTCTAAACAACCTGAGCCTCTTGGGTTTGCTGATCAGAAGGTTGG CGGTTTCAATCCCTGCGATGGGGCAAGGTCCCGTTGCACAGTCCCAGCTCCTGTCAACCTAACAGTTC
2697440	7	0	(iii)		TAACTTGGAGAGGCGTGGTCTGCGTCTGAGCGTCTGACGATGTTCTGCCTACGCTCCCCTGTGACGGGACCTG CACCTCCCCCTCTCCTGAACTGGAAGTGGACATTGGCTGTGAAATCGGTTCTACTGTCTGGGATGCTG
2700196	7	0	(iii)		TAAGGGAGATCTCGACAGTAGATCGGACTGAAATTCAAAGAACAGCAACTTGGAAAGCTATCCTCACTCTCCCAG GCTTCCATCAGATGATCCCAGGCCAGCCACCAAGCTCTCTGTGTGGTCTCATGCAAGTCACTCTCCCTC
2701758	7	0	(iii)		TAACCTCCTTTTACTACTATTATGAAAAATAAAGCAGTAGCATCTACTATATGGAATCTACTTTGGTCCCCAGCTCT TGATCTGAAGAAGTGTGTATGGGATCAGTTTGAGAATAGTAGAGAGATAAAATGGAGGAAAGAGA
2703351	7	0	(iii)		TAATTCTATGACATATTGTTGAAGGTTTTTACCGTGTCCATGAACATCAGGATTGCCTATTTATCTGGTCTCATTTCT AAGTACTCCAGTATGTCAATTACCATTCTTGTGCTACTGTGCATTTGTATCCCTGGCAAGAAGCC
2703674	7	0	(iii)		TAACCTGAGGCACCACTTTAGCTAATGGGGCTCCTGCTTCCGCCACGCCGCTGGCGCACGATTCTGTACTCATC TTGGGGCAAAGTTTGCAACTAGGAGCAACTACTTCCAGGTTAGCAGAGTTTGTAAACCAGAAGTGTCTG
2706132	8	0	(iii)	T	TAAGTCTCCTTCACCAGTATTGCCTTGTTGAAGCAGTTACCACAATATTATTTGATACCAGTATTCAATGATATGGC AGTTTATTACACAACCTACTAGCTGGGAACTCCTTATTGTGTTCAGTACAGTCATACCTTAGTTG
2709754	9	0	(iii)	T	TAAAAGATTACAGCAGGACAAAAGGGCAGGGGAGGTCTCACATAATGCTGGACCAGCCTAAATTCAACAGCGA CATGCCAATATGGACTTTGCCAGGACTGTATGCCCTTGAATGAGCAACAGGGTCACCTGCCACCAATCCC
2710219	7	0	(iii)		TAAAATGCCCCAATCCAAATTCACAGCCTTCTGGGTTCTCAGCCAGATGAATGACCAGCAGGTGCCCAGAAGCAG TGAATATATTTGGAAAGGACAGAACTAAAGTCACTACTGCGTCCCAGTCTGTGAATCCAGGAAACATACA
2710492	7	0	(iii)		TAAGTCCATATATCATTGAAAGTGAAAAGACTATAAGAGGAAGGTCCGACCTTATATGCCTCTTCTTTGAGGCTGCA TGAAGATTTGCAGTGTTAGAGCAGAGATTTTGAGATGGTAAGAAGGAGGCATTCCAATAATGTGCT
2711760	7	0	(iii)		TAAGGCTACGCAGTAGTTATTCCTGTGCAACTCTCTGGACAGCAACATCCTAACGCTTAGGGTAAAGAAAGACTG CATCCACAGGTTATGGGCCAGATTCTGAGGCTTCCAAGTTGTGGTGTCCAGAGTTGGTGAGGTCGTG
2717683	7	0	(iii)		TAAGGCTGTCCCGCATTGCAGTAGTCCAAGCGGGAGATGACCAGAGCTTGCACCACTCTGGTGAGACAGTACACA

2718013	7	0	(iii)		GGCAAATAGGATCTCATCCAGTGTAACCAAATGAAGCTGGGAGAGAGCCACCCACCTTCAATGCAGACAG TAATAGGATGTTCCCTATGCGGTTCTGCTTCTGCCTAGCAGTTAGGTCAGCACTGTCTTTTCTGTTGTTACTGAAA GAAGAAAAAGAGGATCCACAGTGTGGGAAAGATTATCAAGACCAAAGAGGAGGTGGATCTTCCCAC
2718166	7	0	(iii)		TAAGTGCTTTACTAATAACACTGTGCATTACAGAATGAGTCTGACAACCACATTTCCAGCTGTGTTTCCCTTGCCGTA AACCCATGCACCACCTCACCAGTAGCAAGCACCCCTCTCTTTTCACCCACAGCCCTGCCTGTGGTGGTTTTTTCAT ACCCC
2719220	7	0	(iii)		TAAATACCACTTTCTTGGCTCATTACATACGCTTTTATATCTTTTATATTTTTTCGAACAACTGCACACACCACCCAG GTGTTATCTTGTTTACCAGACAGGGTTGCTCTTTAGACTGTATCAAGTTCAGTCAAAGGGGAAAGA
2722314	7	0	(iii)		TAAAAGTCTCAAACTTCAGCTAGCTTTTCTCAAAGCTTTAGCTCTCCAAAACAGCCACTTTGCCTCCCAGGACC CAATCCTTACTACTCTTAGGATGTGTCCGAGGCTCTCTCCGTTTTCTTCACTGGCGCCCTTCCACTGTCTGATT
2748810	7	0	(iii)		TAAGCAATGGAGACATTTCTAATTGGAGCCAAGCATAGAGTGCAGGTGTGCACGGATCACAAGAATCTGGAGTA CTGGAGGACGGCTAAGATACTGAACAAGAGGCAGATACGATGGGCAGAGTTCTTTGCGGACTTCAATTT
2749663	7	0	(iii)		TAATAAAAATCGAACTCCAAAACCTTAGGCTGAAGTGAACGCGAAAGCCTCTGACTAAGTTCCTTCAGAAAAATCA TGAAAACGTTCCCTTACCATTCAAAGAGTGCCAACGTGCCCAAAGCTTTCAAACCTCCTTACCGTTTTTTATAATAT ATAA
2751846	8	0	(iii)	T	TAAAGACTGCTATATCTGAAGAAGCAGACTCCTCTACAAATGCTTAGACCACAATAAACATGTTAGTCTTTAGGGC AGGGGAAGCCAGCCTGATGCCTTCCAGAGGCTGTTGGACTACAACGCCCATTGTCTCAGCTGGCATG
2752760	7	0	(iii)		TAAATTGAAATGGTAAATCCGTGGGAATCGTAGGAATGCGTGGAATGAGGACATCTTCACCTTTCTTGTTGGAG ACTGATTTGGTGTCTTCTGGTTGAGTTCTTTCCGCCACTGAGAGCCTTTTGCATTGAATCTGTTGAGAA
2753130	7	0	(iii)		TAAGTTGGCATGTTTTCTCTAACCATAGTAAAGAATAGCCACAGTTCTGATGATCCAGCAAACCTGTGAATAATATAA AACACAAACAAATTTCTGAATTCCAGCTTGTAACTACTGTATACCTGCAAAAAGGAGGGAGCAATCCAAGAATTG
2753926	7	0	(iii)		TAAGAATCTGATGCTCTGCTGACTGTGCATATCCCAGTTATCTTGGGAGAAAATGGTTAGTGTAGTTACAAAAAGT TTCCCCCATCACCACAACCTTGCTTTATGGAGGCTCAGTATTTTACCCTGTGAGAACTTTGTCTCTG
2758178	7	0	(iii)		TAAAGGGGTCAGCAATCTGCTGTGCCACCTCCATGTTCCCCCTTCCCGCCCTGCGCTCCCCCTCCCAGCCGCGTT CAGCTGCATTGATGTGGGGCATGGCGGTGAGAAACACCATCAACCTCCTCCCTTCCCCCATCCTTCT
2758804	7	0	(iii)		TAAGATGATGTGATTTATAGCTCTTTGAGAGCTAGAAAAAAATTGCATTGAGACAAAGCCACAGGCTGAGTTGCG

					ATCCTATTGGGAGCATGTCTTTGCTTATTCCAAGCAAACATATTGGATTGTGCTGCAAATACATGC
2761861	7	0	(iii)		TAATGACTGCTGTAATTACAAGTCATCTTTTCTCTTTGGGTGGTCGCTGCTGGGACTTGAACCACTGTCCCCCTCCA CATCTGCAAAGAAGGGATCTACTCTGTGAGTAAGGGTGAAGAAGCTTGTTTTGAGTTCTTCTAGTTAGAG
2764875	7	0	(iii)		TAACTAGGCAAGAAAAATGGATTCTGGACCAAAGCTCACAATCTGAAAGAGATTATTAGAGAAAAATGAAAA TTATTGTCTAAAATGTATAAGCTAACATAAGAACATCCCTGCTGAAACAGGCCACAGCCCATCCAGTCCAG
2766984	7	0	(iii)		TAACATTGAGTCCGTAAGTGATTGTGGAGGCTAATTCTGGATCCAAACATCCTTCCACAGTGGGGACATAGGTTTC TGGGTGAGAATTGATCATGAGGAGGGTTTGCCAAGCATGCCTTCCTCTATCTCAATTTCTCCCTTTCG
2767727	7	0	(iii)		TAAGCAGCTTGTATGCAAATACTGTAGGAACAAGATAAAACCAAGACAAGCCTCAAGGGATGACTAAAGGTGCTG CTCTTTCAAGTAATAGATTTTGCCCAGAATTGAGAGATACACTTTAGGAATGCCCAAGAGTAATTGTAA
2770340	7	0	(iii)		TAATGACGTAAGTTGAGGTACCACTGTATCTTGAATACCCATGGGTAATGGTGAAGAGAAACCAAGGCAAAGATGC ACAACCATACAGCTCACACAGATGCCTTCAGATACAAGGAAGTGGATGTTCTTTGTTCTTTTGGCCCT
2775401	7	0	(iii)		TAAGGGCCAGACTTGAGTGAGCTCAGCTGGCCATAGCCCCACATCTGTATGGAGTTTGGATTTACACCAAAAATTGC AGCAGCATAATTTACTCTGGTTGGCTTCCTGTAGTTTGGATTGTTTCAGATGTTGCTGGACTACAGTAC
2781689	7	0	(iii)		TAAAGTCTGAAACTGCGTACCATGTGAATTTACTTGGTTTTGTCAATTTTCCCTCCATGTCAATGGCCAAGCAGGG CAATTGTGATACCATAAECTACCATGTGATCAAGATGGTGTAAAGTCGTAAGCAGCTTGCAAATGTGT
2785097	9	0	(iii)	T	TAAGTCATTGTCCTCACAAAATGGAAGCATGGTGAGGACTAAATGCAAATCAAACCTCAAGAAGAACGGGCATAGG CGAATGAACAAAGGAGACAAAGGATGGCTCAAATGCATGCCAAAGAAGCAGCAGACAAACGCACAGCCA
2794446	8	0	(iii)	T	TAAAATGCTAAAAAGCAAAGGTCTATACAATGTTTGGGGCGAAAAAAACCCAGGTGACACTAGCCACACATTCCA GTCTGGACGTCATGGCACAATGTCCAGACTAGACAGCATTCTTCTCACTCAGGGTCTGATGCCCTTGGTGGAATCA A
2803012	7	0	(iii)		TAATGGGAAAGACTTACTAGATGAGGGAAGGAAAGTGGAGGGGAGGGAGTTTACTAGGGATCATATGTAGATATTT GAAGATATATACAAGTTTGGTGAATTCAGGTCTTTTCCCGTGAAGTTTGGGGGTATCTTGGTGACG
2807588	7	0	(iii)		TAATGTTCTCGAAGGTCTTCTTTCCCTGCTTTTCCCTCGTATCTTCTTTCTTCACAGTAGTTGTTAGTAAAGGTGTC TTGGAGTACAATAGTGTGTGTCATGTCTCTTTTATGAGTTGTTTCATTTTACAGTTCAGTTTGT
2809142	8	0	(iii)	T	TAAGCGTCTTTGCGGTGCTGGATTTGAGCATGAGGTTTATAAGCACTGTTGCTAGTGTTATTAGCAACAGCATTGTT GTGTTTGGGTAGGGTGGGTGTCTTGGTACGCTCTGGTGCCACCAATGTGCTATTTGTATGTCAGGAT

2811108	8	0	(iii)	T	TAACCTAGTGTGAATGGAAGCAATTCCTCTGATGGCCTTGGACCATCATTTGATGAACTACCATCAACTGTTGGAGC TGCTCTCATCAGAAGGATCACTGTACATATGTTCAATTAGTCCTAGATGTCTCATAACGTGTGATGCT
2811212	8	0	(iii)	T	TAAACTTTTTATGTCCAACATCCTTTGCCCAATCTATCATAACAGATTTTACTTGTTTCATCTTTCATATGCCACTCCAG CAATAAATTATACATTTTGAAAATATTCTTAGTCTTGGAACGCTTGGCAACTCTCACCTCGCTGGGCT
2812086	7	0	(iii)		TAAGTGGAGGATGAAACAGAGAAACCACCTCACTGGACTTTTCTTGGCTTACTGCCACCCATAGCTACTCTCTCTG GGAAGGAAGTGAGCTATGATTTTGCAATCGTATCTGTGCAGTAGGGAGGCAGAAGAGTGGAGGAAGAA
2818973	7	0	(iii)		TAAGCCTCTAGGCAACCTGAGCTACCGTGTAGATACTGATATCATATGAGGACGTCATGCCTCTTATTGCAAGAATG GGGAACCTGTGGCCTTCCAACCTGCCACTGAACTGCAACTGCCAGCACTCTTGACCATTGGAAATCAAGCTCCAAC AA
2835896	7	0	(iii)		TAAGGCTGTCTTTTTGTGGTTTTTGGGATAGAGACTATTTTGGAGTGGGTCCAGGTTTTGGGGATGGGTCTCTGTAAG GGAGTCAGGGGAAGAGAAGGCAGAGGGCAAAAGCGGGAAAGAGGGAGAGAGGGAAGTGCCAGGGCTAT
2836578	7	0	(iii)		TAACACAGCAAGCACCAACAGCATTCCCCAACCCACACCTCCACATAGATCCCCATGCAACACCAAGTCTGGACG ACACTAAATCACACTACCCATCAACCCACAATTCACCCCTACCACTGACCACTTCAGAACCAAGCAAAC
2843274	7	0	(iii)		TAAGGGGTGTGGGGAGAGTTACAGGGGTGTCTATATGTGGTCATATAGGTGTTTCAATTTGGGGTAATTTGGGCCAT TTGGTGCATGTCCGTTTCGGCCCTAGGTCTCAGCTGACATGGAAGGCCTTGTTTCGGGGACAGGCCGTT
2847708	8	0	(iii)	T	TAAACAGCATGGGGGATAAAATCAAACCCTGAGGAACCCACATTGAAGGCTTCACAGGGCTTCACAGCTCTCCC CAATCATCACCTCTTGAAATGACCATCCAAGTAGGACTGGAACAACCACAAAGCTGGGCTCCCTATCC
2869181	7	0	(iii)		TAAGTCGTCTGGTAAATTTATACCTATGCTACTCTGCCACAGCGCTTAGCTTTGGAAGACAGATCAACCTGAC TGCACAAATCATTGCATGGTCACACCATCAAATCTGCTACTTGGGGTTTGGAGAGAGCAAAATCCAA
2871145	7	0	(iii)		TAATGGAGGAGAGAGCTATTGGCTTCTGAATCCCAGTTGCTGCAAACCTCAGGAGGGGGGGAGTTGTGTTTTGG GGTTTCCCATTGGGGCATCTGGTTGTCCCTTGTAAGAACAGATGCTGGCCTAGATGGGCTTCTCTTGGGT
2872615	7	0	(iii)		TAACAACTCCTCCAGTTCATAGAAGAGCTGGCAATCCAGTTGCCAACCCTTTTCTGGTAGTAAGAGATGACACAA TTTGGTCAATTCTCTCTTCCCACACCTGAGCCACCTCCTACATATGTCCAGAGGGCCTTCCAACAATC
2873202	7	0	(iii)		TAAATCTCCCAATAATATAATTTTATAGTCCAAATAATCAGCCAAAGTCTTATCCAAGTCTTATAGAATTCAGCTTTT CCATCATTTGGTGCATAGATACCAGCCATCAAAATCTTTTCGCCTTGTTGGACCGTTTCCACCAG
2874027	7	0	(iii)		TAAAAAACAAACACATGAGGCGTGCGTCCCCAGACCCTATCTACTTCCAGAATTGTAAACAATAAAATGAACTGT

2875107	7	0	(iii)		TCAAGACACTGAAATGCAGAATATAAGCACAGTAACCTTTCACAGTACGTATGGCCAGCTACTGCTGTA TAAATTATATTTAGAGTCCTTTTCTTTTCTTTGAGCCATGTTTTGATCTTTTTCTCTCTCTGAAGCAGCCAAGGCCAGTTC CAAACCACAAATATTTTCTTACATAAAACATCCAGTGTTCCACTATTTCAAGGTCACCTCAGAGATAC
2876301	8	0	(iii)	T	TAAGCCCTGTATACCTGATGGAGTGTGTCTTCCCCCATCATTAGCCTGGACACTGAGGTCCAGCGCTGTCAGGGG TTCACCCAGAGTAGCAGAGTGATCAGTGAGGCTGAGCAGGAGGACAAGATAGAGGAAGAGGAGTGGG
2876954	8	0	(iii)		TAAGAAATGGGAGTGCCTGACCACCTCATCTGTCTTCTGAGAAATCTCTATGCAGGACAAGAAGCTTCAGTTAGA ACTGGATATGGAACCACTGACTTCTTCAAAATTGGGAAGGGAGTATGACAAGGCTATATATTGTCTCCCTTTTTTTT TTTTT
2877631	7	0	(iii)		TAAACATATGGAAGTGAAGAGAGAATTAGACTTCTTAGAAATCAACAAAACAATGATAAACATTCCATACCTA AAACAGCACTTCTACAAATATTTGGGGGGGGGGGACGGCACGACTCCAGGCTATTAGCAAATAGGTGTAGGAAA
2883610	7	0	(iii)		TAAGATCAAGTTCCTATAAAGGCAGGCATTTGAGGGAGGGAGCCTCATCACAGACCCAGGGCTAGGGTGCTGT GAGTGGGTTTGTGTGTCCTCGCTACCCATTTGAGGGGCTCCTGGGAGTAGATTGGGGACATGCTGATT
2899017	7	0	(iii)		TAAGCAGAGGTTGGATAGCCATCTCTCATGGATGCTTTCGTTGAGATTCTGCCTTGTAGGAGGGTTGGACGCGAT GACTCTTTGGGTTCTGCCCAGCGCTACAGTTCTGTGATTCTTCCCTGCTTCTGATTCTAGCCTAATCT
2946768	7	0	(iii)		TAATCTGAACTCTTCGGTGCCGTACCGCACCCAGAGCTCAGAAATTGCTCACTGTAATGAAATTCCTTGTGCGAAA ATGCGTCTAGAACAAATGGGAGTGTCAAACACTGATGGAAACTACCTGCGTTTAGTATGTGCCTTACTG
2977889	7	0	(iii)		TAAAATATAAAGGCACCTTTTTTTACTTTTAGATAACACCATGGCAAAAAAAAAAACCAGTAGCTCATTATTGAAT TGAATTGAATTGATTATTTGTACCCTGCCCATCTGGCTAACAGTCTGGTCCTAGTGGAAGCAAATGTTATTCT
2981102	7	0	(iii)		TAAATATGCAGATGATATAACTGGTGGGTCAGATTCAGGAAGAAAATGGGGGGCTGTACTGAGAGGAAGGAAGAG TCTAGTGAATTGCTGCAGGAGAAATAATCTTGGGCTGAATGTGGAAATACCAGAGAGATCGTTGTGCGAT
3000569	7	0	(iii)		TAAACTCCCATGATCCCTAGGTAACAGGACCAGCAGTGAGGGATGATGGGGAGTTGTAGGTCAAAATATCTGGAG GGCCAAAGTTTGCCTATGCCTGCCTTTGAATGACTGCAAAATAGCTGCAAGAAGACTTTGGTGGCAGCA
3017866	7	0	(iii)		TAAGTGTTTGCTGGCAGGGAAAAGGAAAAACACTTGGTGACCCAACCTGCCAGCGAAACAATTTTTTCCGCCA CACCTCCTGGCCTGAAAACACAGCCTTCCACTATCCTCTGACCCATAGGACAAATCACCTATATGCC
3028454	7	0	(iii)		TAAATTCACCTGCAAGCAACTGCCTTAGGGAGGAACTAAACATGGACAATGTGGGACTGCTTTTGAAAACCAACC TTCAATACCATGTCATATTTTCCCCCATCTTGGCAGTGGCAGCTGATCGTCATGTTGAGCAGAAGTGGA

3057829	7	0	(iii)	TAAAGCACATACACCAAAGAACCATGTGAACTCTATTTTGTATGGGTGCTGGGAGTGGGAACAATACATGCAATA TATTGGAGTGGTAAACTACAGTTCCCAGGATTCGGAAGGAACAGTGTGCGTAGGCAGCTCCGCATTTCC
3122315	7	0	(iii)	TAAACTACAAGGCCTGCTCATTACTCAATACGAAATACTGTATACTGTATATTGCTCAAGGGTACGCAATAATTGTGC CTAACATAAAAGGCAGTTGTAAACTTGTGACTATTGTAAATTGTAAATACAGTGGAAGCTCAACAA
3167280	7	0	(iii)	TAAGTTGAGCTTTACGGCCTCATGTTGAGCAAGGTGCCCAGGGCTGTTGGATGAATTGGCTGCTAGTTGAAGCAG CCTCAAGTTGAATAGAATAGAATAAGATAAAATTTATTATTTGTACCCCGCCCATCTGGCTGGGTTTCC
3213775	7	0	(iii)	TAATTTGTAAACCAAATAATACAGGTTCTACTACAGTCAAAGGTAGAACACAGGAAAGGCAAGCTATGTGGAGC AAAACCAACAAAATATGGGCTAATCATCATGATGGCAGAAATTGCACCCTACACTTATAGGTTGAACAT
3306623	7	0	(iii)	TAAATGGCAATTCTCAGAATGCTTGAGGCAGCTAACAAAGCAATCACAAGTAAGCCTTCAAAATCCCAATACTAAA AACATCTTCACAATAAAAAATAAAAAATAAAAAAGCTGAGCAGTTGCTTACCTGGAAGAGCTGACTTGAATACA
3326811	7	0	(iii)	TAATCATCTGAGGGTCAATGGCGCTGTGGTCTAAACCACTGAGCCTCTTCGACTTGCCAATCAGAAGGTCGGCGGT TTGAATCCCTGTGACGGGGTGAGCTCCCGTTGCTCGGTCCCAGCTCCTGCCCACCTAGCAGTTCAAAA
3506757	7	0	(iii)	TAAGTGACGTTTCGGTCAGCCGTAGAGGAGGGCTGTGTTTCTGTTGTTTGAAGTAGAAAGCAAAGCCAGTCTCCTC AAAGTCTGGGGAGTAATCCTTGTGTAAATTGCCTCTACTCTGTAATGCAAAGTAAATCCAGGACCACC

Note: Col, the nucleotide site within the catalog locus, reported using a zero-based offset (first nucleotide is enumerated as 0); F count / M count, we split samples into male and female: males were assigned to M count, females were assigned to F count; Criteria for sex-linkage, the approaches screened for sex-linked loci confirmed, validation of sex-linked markers, 'F' and 'M' indicate true and false, respectively.