

Table 18: Regions and SNPs which had highest xp-EHHST values, strongest differentiations, and high derived allele frequency in the tested population CHB+JPT ( $> 0.5$ ) on chromosome 7 of the HapMap phase II data. \* marked regions which were not reported in Table 1, Sabeti et al. (2007). † marked regions which were not identified by EHHST in Zhong et al. (2010).

Chromosome Pop A vs Pop B	SNP Name	Position	Derived Allele Freq		$F_{st}$		xp-EHHST	
			$p_A$	$p_B$	Value	Pct	Value	Pct
Chromosome 7 <sup>*,†</sup> CEU vs CHB+JPT	rs10270418	135458203	0.7333	0.9889	0.5460	0.9913	-16.995	0.9934
	rs1386782	135458694	0.7417	0.9889	0.5488	0.9914	-16.529	0.9929
	rs10251225	135465466	0.7583	0.9889	0.5383	0.9905	-15.901	0.9920
	rs2129801	135465736	0.5333	0.8944	0.6324	0.9971	-15.203	0.9910
	rs6467639	135468663	0.4333	0.8778	0.6268	0.9968	-15.287	0.9911
	rs12534779	135472243	0.4333	0.8778	0.6268	0.9968	-15.000	0.9906
	rs7792573	135481102	0.5833	0.8778	0.5350	0.9903	-28.290	0.9986
	rs7809350	135481149	0.4417	0.8778	0.6257	0.9966	-28.259	0.9986
	rs7457671	135484246	0.4500	0.8778	0.6247	0.9966	-28.654	0.9986
	rs1973304	135486717	0.5833	0.8778	0.5350	0.9903	-28.898	0.9987
	rs834767	135496001	0.5083	0.9389	0.6881	0.9991	-30.028	0.9990
	rs834768	135496018	0.5083	0.9389	0.6881	0.9991	-29.937	0.9990
Chromosome 7 <sup>*,†</sup> CHB+JPT vs YRI	rs10270418	135458203	0.9889	0.2583	0.5460	0.9913	20.967	0.9947
	rs1386782	135458694	0.9889	0.2583	0.5488	0.9914	20.436	0.9940
	rs10251225	135465466	0.9889	0.2750	0.5383	0.9905	19.094	0.9916
	rs2129801	135465736	0.8944	0.0167	0.6324	0.9971	19.002	0.9915
	rs6467639	135468663	0.8778	0.0083	0.6268	0.9968	19.237	0.9920
	rs12534779	135472243	0.8778	0.0083	0.6268	0.9968	18.327	0.9902
	rs7792573	135481102	0.8778	0.0917	0.5350	0.9903	39.725	0.9997
	rs7809350	135481149	0.8778	0.0083	0.6257	0.9966	40.786	0.9998
	rs7457671	135484246	0.8778	0.0083	0.6247	0.9966	40.524	0.9997
	rs1973304	135486717	0.8778	0.0917	0.5350	0.9903	39.163	0.9996
	rs834767	135496001	0.9389	0.0167	0.6881	0.9991	33.618	0.9989
	rs834768	135496018	0.9389	0.0167	0.6881	0.9991	33.498	0.9989

Table 19: Regions and SNPs which had highest xp-EHHST values, strongest differentiations, and high derived allele frequency in the tested population CHB+JPT ( $> 0.5$ ) on chromosome 10 of the HapMap phase II data. In the first column, the **Genes** provided names and positions of genes which were located in a region.

Chromosome Pop A vs Pop B	SNP Name	Position	Derived Allele Freq		$F_{st}$		xp-EHHST	
			$p_A$	$p_B$	Value	Pct	Value	Pct
Chromosome 10 CEU vs CHB+JPT <i>PCDH15</i> (55,233-56,231kb)	rs10825242	55554795	0.2333	0.9167	0.5955	0.9951	-55.203	0.9998
	rs12218327	55561007	0.2250	0.9000	0.6222	0.9970	-51.682	0.9996
	rs9787578	55561682	0.3250	0.9444	0.5606	0.9925	-51.074	0.9995
	rs9787465	55562067	0.2250	0.9056	0.5626	0.9927	-50.919	0.9995
	rs4447073	55568150	0.3250	0.9444	0.5606	0.9925	-49.152	0.9993
	rs11004104	55588365	0.2333	0.9444	0.6706	0.9987	-43.319	0.9990
	rs11004105	55589349	0.2333	0.9444	0.6771	0.9989	-41.583	0.9989
	rs4636568	55590392	0.2333	0.9444	0.6706	0.9987	-40.441	0.9988
	rs11004106	55591311	0.2333	0.9444	0.6706	0.9987	-39.625	0.9987
	rs11004107	55591322	0.2250	0.9167	0.6576	0.9984	-37.670	0.9983
	rs10763079	55605400	0.6917	0.9889	0.5507	0.9914	-34.752	0.9976
	rs6481064	55605939	0.6750	0.9889	0.6044	0.9958	-31.452	0.9964
	rs12246601	55606314	0.6917	0.9889	0.5507	0.9914	-31.325	0.9964
	rs11004121	55607489	0.6917	0.9889	0.5507	0.9914	-31.027	0.9963
	rs10082369	55612400	0.6750	0.9889	0.6044	0.9958	-28.284	0.9956
	rs7093302	55613190	0.3250	0.9278	0.6314	0.9975	-27.219	0.9952
	rs10825264	55617960	0.1750	0.8944	0.5766	0.9940	-21.409	0.9930
	rs4935502	55625450	0.1583	0.8944	0.6269	0.9973	-37.673	0.9983
	rs10825275	55640296	0.9417	0.9944	0.6264	0.9973	-54.494	0.9998
	rs7093540	55641050	0.3417	0.9000	0.5585	0.9922	-51.461	0.9996
	rs11004141	55641433	0.1583	0.8667	0.6411	0.9978	-54.120	0.9997
	rs4935104	55646474	0.1500	0.8556	0.5711	0.9934	-53.917	0.9997
	rs1970519	55790948	0.2250	0.8667	0.6210	0.9969	-37.115	0.9983
	rs2028440	55796208	0.2333	0.8722	0.6235	0.9970	-40.584	0.9989
	rs11004267	55806859	0.2417	0.8667	0.6424	0.9979	-33.323	0.9971
	rs11004270	55817364	0.2250	0.8667	0.6511	0.9982	-33.381	0.9971
	rs11004275	55822846	0.2333	0.8667	0.6018	0.9956	-33.037	0.9969
	rs10825320	55826240	0.8583	0.9722	0.5829	0.9944	-32.494	0.9968
	rs2050998	55827170	0.8583	0.9722	0.5829	0.9944	-32.383	0.9967
	rs2050999	55827214	0.2333	0.8667	0.6018	0.9956	-31.867	0.9965
	rs9943342	55832701	0.2333	0.8667	0.6018	0.9956	-31.326	0.9964
	rs2795918	55847021	0.3250	0.9222	0.6094	0.9962	-28.038	0.9955
rs1219862	55860311	0.3250	0.9222	0.6313	0.9975	-34.377	0.9975	

Table 20: Continuation of Table 19.

Chromosome Pop A vs Pop B	SNP Name	Position	Derived Allele Freq		$F_{st}$		xp-EHHST	
			$p_A$	$p_B$	Value	Pct	Value	Pct
Chromosome 10 CHB+JPT vs YRI <i>PCDH15</i> (55,233-56,231kb)	rs10825242	55554795	0.9167	0.1833	0.5955	0.9951	51.477	0.9987
	rs12218327	55561007	0.9000	0.1250	0.6222	0.9970	50.844	0.9986
	rs9787578	55561682	0.9444	0.2167	0.5606	0.9925	49.632	0.9984
	rs9787465	55562067	0.9056	0.2167	0.5626	0.9927	49.061	0.9984
	rs4447073	55568150	0.9444	0.2167	0.5606	0.9925	47.853	0.9982
	rs11004104	55588365	0.9444	0.1333	0.6706	0.9987	46.209	0.9979
	rs11004105	55589349	0.9444	0.1250	0.6771	0.9989	44.895	0.9976
	rs4636568	55590392	0.9444	0.1333	0.6706	0.9987	43.492	0.9974
	rs11004106	55591311	0.9444	0.1333	0.6706	0.9987	42.900	0.9973
	rs11004107	55591322	0.9167	0.1083	0.6576	0.9984	40.942	0.9969
	rs10763079	55605400	0.9889	0.2417	0.5507	0.9914	37.505	0.9963
	rs6481064	55605939	0.9889	0.1833	0.6044	0.9958	34.478	0.9956
	rs12246601	55606314	0.9889	0.2417	0.5507	0.9914	34.235	0.9955
	rs11004121	55607489	0.9889	0.2417	0.5507	0.9914	33.948	0.9954
	rs10082369	55612400	0.9889	0.1833	0.6044	0.9958	34.434	0.9956
	rs7093302	55613190	0.9278	0.1000	0.6314	0.9975	33.508	0.9952
	rs10825264	55617960	0.8944	0.2250	0.5766	0.9940	28.374	0.9903
	rs4935502	55625450	0.8944	0.1667	0.6269	0.9973	55.269	0.9990
	rs10825275	55640296	0.9944	0.3167	0.6264	0.9973	77.686	0.9998
	rs7093540	55641050	0.9000	0.1333	0.5585	0.9922	99.095	1.0000
	rs11004141	55641433	0.8667	0.1000	0.6411	0.9978	98.920	1.0000
	rs4935104	55646474	0.8556	0.1833	0.5711	0.9934	83.989	0.9999
	rs1970519	55790948	0.8667	0.0750	0.6210	0.9969	47.918	0.9982
	rs2028440	55796208	0.8722	0.0750	0.6235	0.9970	48.181	0.9982
	rs11004267	55806859	0.8667	0.0417	0.6424	0.9979	41.620	0.9971
	rs11004270	55817364	0.8667	0.0417	0.6511	0.9982	45.689	0.9977
	rs11004275	55822846	0.8667	0.0917	0.6018	0.9956	43.371	0.9974
	rs10825320	55826240	0.9722	0.2583	0.5829	0.9944	42.476	0.9973
	rs2050998	55827170	0.9722	0.2583	0.5829	0.9944	42.353	0.9972
	rs2050999	55827214	0.8667	0.0917	0.6018	0.9956	42.422	0.9972
	rs9943342	55832701	0.8667	0.0917	0.6018	0.9956	41.187	0.9970
	rs2795918	55847021	0.9222	0.1167	0.6094	0.9962	42.389	0.9972
	rs1219862	55860311	0.9222	0.0917	0.6313	0.9975	50.331	0.9986

Table 21: Regions and SNPs which had highest xp-EHHST values, strongest differentiations, and high derived allele frequency in the tested population CEU ( $> 0.5$ ) on chromosome 12 of the HapMap phase II data. \* marked regions which were not reported in Table 1, Sabeti et al. (2007). † marked regions which were not identified by EHHST in Zhong et al. (2010).

Chromosome Pop A vs Pop B	SNP Name	Position	Derived Allele Freq		$F_{st}$		xp-EHHST	
			$p_A$	$p_B$	Value	Pct	Value	Pct
Chromosome 12 <sup>*,†</sup> CEU vs CHB+JPT	rs1502631	37243569	0.9667	0.5111	0.5578	0.9928	12.800	0.9959
	rs10875817	37243759	0.8917	0.2722	0.5631	0.9933	12.859	0.9960
	rs2730918	37246733	0.9833	0.5111	0.5754	0.9944	12.981	0.9962
	rs2221304	37254059	0.9583	0.5111	0.5409	0.9915	12.583	0.9955
	rs10875855	37261237	0.8833	0.2722	0.5540	0.9926	12.549	0.9955
	rs10875857	37261549	0.8833	0.2722	0.5540	0.9926	12.511	0.9954
	rs2730891	37270952	0.9583	0.5111	0.5491	0.9923	11.418	0.9929
	rs10459231	37280733	0.8833	0.2722	0.5390	0.9913	12.347	0.9949
	rs6580697	37304842	0.8833	0.2722	0.5540	0.9926	16.983	0.9987
	rs12368548	37305823	0.8833	0.2722	0.5540	0.9926	15.457	0.9985
	rs2047781	37310803	0.8833	0.2722	0.5317	0.9905	15.397	0.9985
	rs1472655	37323405	0.8833	0.2667	0.5424	0.9916	14.590	0.9982
	rs1472656	37323559	0.8833	0.2667	0.5574	0.9928	14.561	0.9982
	rs995456	37323680	0.8833	0.2611	0.5459	0.9920	14.563	0.9982
	rs1472658	37325343	0.8833	0.2667	0.5574	0.9928	14.220	0.9981
	rs10875944	37326519	0.8750	0.2667	0.5484	0.9922	14.070	0.9980
	rs10875945	37326540	0.8750	0.2667	0.5484	0.9922	14.033	0.9979
	rs1486341	37328330	0.8750	0.2667	0.5966	0.9958	13.096	0.9965
	rs10875950	37329512	0.8833	0.2667	0.6054	0.9963	12.977	0.9962
	rs11168978	37330628	0.8750	0.2667	0.5800	0.9949	12.895	0.9961
rs10875951	37330813	0.8750	0.2722	0.5768	0.9946	12.798	0.9959	
rs2062758	37331719	0.8750	0.2667	0.5883	0.9954	12.809	0.9959	
rs1564978	37336502	0.8750	0.2667	0.5800	0.9949	11.032	0.9918	
Chromosome 12 <sup>*,†</sup> CEU vs YRI	rs1502631	37243569	0.9667	0.0750	0.5578	0.9928	15.711	0.9945
	rs10875817	37243759	0.8917	0.0583	0.5631	0.9933	15.468	0.9940
	rs2730918	37246733	0.9833	0.0750	0.5754	0.9944	16.242	0.9955
	rs2221304	37254059	0.9583	0.0833	0.5409	0.9915	15.330	0.9937
	rs10875855	37261237	0.8833	0.0583	0.5540	0.9926	14.992	0.9929
	rs10875857	37261549	0.8833	0.0583	0.5540	0.9926	14.958	0.9928
	rs6580697	37304842	0.8833	0.0583	0.5540	0.9926	19.047	0.9983
	rs12368548	37305823	0.8833	0.0583	0.5540	0.9926	16.378	0.9956
	rs2047781	37310803	0.8833	0.0833	0.5317	0.9905	16.270	0.9955
	rs1472655	37323405	0.8833	0.0750	0.5424	0.9916	14.398	0.9907
	rs1472656	37323559	0.8833	0.0583	0.5574	0.9928	14.385	0.9907
	rs995456	37323680	0.8833	0.0750	0.5459	0.9920	14.336	0.9904
	rs1472658	37325343	0.8833	0.0583	0.5574	0.9928	14.719	0.9920
	rs10875944	37326519	0.8750	0.0583	0.5484	0.9922	14.701	0.9920
	rs10875945	37326540	0.8750	0.0583	0.5484	0.9922	14.661	0.9918
	rs1486341	37328330	0.8750	0.0083	0.5966	0.9958	14.470	0.9911

Table 22: Regions and SNPs which had highest xp-EHHST values, strongest differentiations, and high derived allele frequency in the tested population CHB+JPT ( $> 0.5$ ) on chromosome 15 of the HapMap phase II data.

Chromosome Pop A vs Pop B	SNP Name	Position	Deriv Allele Freq		$F_{st}$		xp-EHHST	
			$p_A$	$p_B$	Value	Pct	Value	Pct
Chromosome 15 CEU vs CHB+JPT	rs11635593	61799912	0.1167	0.9167	0.6708	0.9967	-19.276	0.9965
	rs7163401	61811844	0.0583	0.9167	0.7184	0.9984	-19.273	0.9965
	rs7172848	61818807	0.0583	0.9167	0.7184	0.9984	-19.697	0.9967
	rs7164301	61821430	0.0583	0.9167	0.7184	0.9984	-19.562	0.9967
	rs8037083	61853580	0.0583	0.9167	0.6868	0.9972	-19.908	0.9969
	rs2414823	61860806	0.0583	0.9167	0.7184	0.9984	-19.087	0.9964
	rs7178111	61862564	0.1000	0.9167	0.6891	0.9972	-19.847	0.9969
	rs6494433	61869963	0.0583	0.9167	0.7184	0.9984	-18.323	0.9958
	rs4984317	61871710	0.0583	0.9167	0.7184	0.9984	-17.426	0.9950
	rs4984318	61871736	0.0583	0.9167	0.7184	0.9984	-17.276	0.9949
	rs8027701	61878102	0.0667	0.9167	0.7114	0.9979	-17.142	0.9948
	rs6494436	61878357	0.0583	0.9167	0.7136	0.9980	-16.399	0.9936
	rs4776681	61886816	0.0583	0.9167	0.7184	0.9984	-15.795	0.9925
	rs7173437	61887845	0.0583	0.8833	0.6760	0.9968	-15.543	0.9919
	rs2099921	61890902	0.0583	0.8833	0.6760	0.9968	-15.416	0.9918
	rs7178104	61892636	0.0583	0.8889	0.6830	0.9971	-14.933	0.9912
	rs7182375	61892683	0.0583	0.8889	0.6153	0.9942	-14.766	0.9910
	rs978363	61936745	0.2667	0.9222	0.6224	0.9946	-14.323	0.9902

Table 23: Continuation of Table 22.

Chromosome Pop A vs Pop B	SNP Name	Position	Deriv Allele Freq		$F_{st}$		xp-EHHST	
			$p_A$	$p_B$	Value	Pct	Value	Pct
Chromosome 15 CHB+JPT vs YRI	rs10152404	61751519	0.9167	0.2083	0.7234	0.9985	17.828	0.9931
	rs7166366	61751621	0.9167	0.1833	0.7377	0.9991	17.797	0.9930
	rs6494424	61752492	0.9167	0.1833	0.7377	0.9991	17.718	0.9929
	rs6494425	61752758	0.9167	0.1833	0.7377	0.9991	17.637	0.9927
	rs7166206	61767213	0.9167	0.1833	0.7377	0.9991	17.386	0.9924
	rs6494428	61778778	0.9167	0.1833	0.7377	0.9991	16.923	0.9910
	rs4411464	61782476	0.9167	0.1833	0.7234	0.9985	17.304	0.9921
	rs16947373	61785368	0.9167	0.1917	0.7184	0.9984	17.141	0.9916
	rs11635593	61799912	0.9167	0.1917	0.6708	0.9967	36.756	0.9998
	rs7163401	61811844	0.9167	0.1917	0.7184	0.9984	37.317	0.9999
	rs7172848	61818807	0.9167	0.1917	0.7184	0.9984	37.745	1.0000
	rs7164301	61821430	0.9167	0.1917	0.7184	0.9984	37.472	0.9999
	rs8037083	61853580	0.9167	0.2500	0.6868	0.9972	30.201	0.9990
	rs2414823	61860806	0.9167	0.1917	0.7184	0.9984	29.815	0.9989
	rs7178111	61862564	0.9167	0.1833	0.6891	0.9972	29.638	0.9989
	rs6494433	61869963	0.9167	0.1917	0.7184	0.9984	29.360	0.9988
	rs4984317	61871710	0.9167	0.1917	0.7184	0.9984	28.897	0.9988
	rs4984318	61871736	0.9167	0.1917	0.7184	0.9984	28.668	0.9988
	rs8027701	61878102	0.9167	0.1917	0.7114	0.9979	27.673	0.9987
	rs6494436	61878357	0.9167	0.2000	0.7136	0.9980	27.413	0.9987
	rs4776681	61886816	0.9167	0.1917	0.7184	0.9984	25.738	0.9983
	rs7173437	61887845	0.8833	0.1917	0.6760	0.9968	25.330	0.9981
	rs2099921	61890902	0.8833	0.1917	0.6760	0.9968	25.046	0.9979
	rs7178104	61892636	0.8889	0.1917	0.6830	0.9971	24.082	0.9974
	rs7182375	61892683	0.8889	0.3333	0.6153	0.9942	23.673	0.9972
	rs7165577	61904056	0.8889	0.1833	0.6880	0.9972	24.450	0.9976
	rs2053593	61905916	0.8889	0.1917	0.6830	0.9971	23.813	0.9973
	rs8042418	61911938	0.9167	0.1917	0.7184	0.9984	23.338	0.9971
	rs978363	61936745	0.9222	0.1333	0.6224	0.9946	19.676	0.9948
	rs978362	61936887	0.9222	0.1333	0.6224	0.9946	19.454	0.9946
	rs7180823	61937922	0.9222	0.1333	0.6501	0.9960	19.082	0.9942
	rs2053594	61938397	0.9222	0.1333	0.6501	0.9960	18.866	0.9940