

Table S1 Pairwise Tukey genre comparisons for each beat.
 * indicates the genre pair were statistically significantly distinct.

Comparison	t-value	p-value	Significance
Beat 1/4			
Country - Elec.	-13.738	<.0001	*
Country - Latin	-8.163	<.0001	*
Country - Metal	-11.274	<.0001	*
Country - Pop	0.225	1	
Country - Punk	-11.783	<.0001	*
Country - Rap	-31.879	<.0001	*
Country - Reggae	-20.469	<.0001	*
Country - RnB	-7.458	<.0001	*
Country - Rock	-8.151	<.0001	*
Elec. - Latin	3.013	0.0776	
Elec. - Metal	1.327	0.9477	
Elec. - Pop	19.581	<.0001	*
Elec. - Punk	-0.374	1	
Elec. - Rap	-21.92	<.0001	*
Elec. - Reggae	-9.689	<.0001	*
Elec. - RnB	7.383	<.0001	*
Elec. - Rock	10.957	<.0001	*
Latin - Metal	-1.75	0.7667	
Latin - Pop	10.01	<.0001	*
Latin - Punk	-2.904	0.1043	
Latin - Rap	-19.174	<.0001	*
Latin - Reggae	-10.371	<.0001	*
Latin - RnB	2.445	0.299	
Latin - Rock	3.485	0.0177	*
Metal - Pop	14.83	<.0001	*
Metal - Punk	-1.432	0.9174	
Metal - Rap	-20.451	<.0001	*
Metal - Reggae	-9.907	<.0001	*
Metal - RnB	5.124	<.0001	*
Metal - Rock	7.149	<.0001	*
Pop - Punk	-14.742	<.0001	*
Pop - Rap	-44.485	<.0001	*
Pop - Reggae	-26.141	<.0001	*
Pop - RnB	-10.667	<.0001	*
Pop - Rock	-15.304	<.0001	*
Punk - Rap	-16.897	<.0001	*
Punk - Reggae	-7.747	<.0001	*
Punk - RnB	6.172	<.0001	*
Punk - Rock	7.979	<.0001	*
Rap - Reggae	8.755	<.0001	*
Rap - RnB	28.898	<.0001	*
Rap - Rock	39.15	<.0001	*
Reggae - RnB	15.759	<.0001	*
Reggae - Rock	19.737	<.0001	*
RnB - Rock	1.056	0.9886	

Beat 2/4

Country - Elec.	-8.474	<.0001	*
Country - Latin	-2.692	0.1769	
Country - Metal	-13.046	<.0001	*
Country - Pop	-4.721	0.0001	*
Country - Punk	-10.883	<.0001	*
Country - Rap	-15.136	<.0001	*
Country - Reggae	-8.178	<.0001	*
Country - RnB	-6.81	<.0001	*
Country - Rock	-12.36	<.0001	*
Elec. - Latin	4.468	0.0003	*
Elec. - Metal	-6.229	<.0001	*
Elec. - Pop	5.911	<.0001	*
Elec. - Punk	-4.311	0.0007	*
Elec. - Rap	-8.104	<.0001	*
Elec. - Reggae	-0.887	0.9969	
Elec. - RnB	1.906	0.6653	
Elec. - Rock	-3.027	0.0745	
Latin - Metal	-8.968	<.0001	*
Latin - Pop	-0.821	0.9983	
Latin - Punk	-7.345	<.0001	*
Latin - Rap	-10.408	<.0001	*
Latin - Reggae	-4.713	0.0001	*
Latin - RnB	-3.034	0.073	
Latin - Rock	-6.999	<.0001	*
Metal - Pop	11.894	<.0001	*
Metal - Punk	1.18	0.9755	
Metal - Rap	-0.94	0.9952	
Metal - Reggae	4.579	0.0002	*
Metal - RnB	7.831	<.0001	*
Metal - Rock	5.147	<.0001	*
Pop - Punk	-9.038	<.0001	*
Pop - Rap	-15.153	<.0001	*
Pop - Reggae	-5.637	<.0001	*
Pop - RnB	-3.596	0.012	*
Pop - Rock	-13.275	<.0001	*
Punk - Rap	-2.124	0.5104	
Punk - Reggae	3.078	0.0644	
Punk - RnB	5.775	<.0001	*
Punk - Rock	2.93	0.0973	
Rap - Reggae	5.895	<.0001	*
Rap - RnB	9.875	<.0001	*
Rap - Rock	7.628	<.0001	*
Reggae - RnB	2.468	0.2856	
Reggae - Rock	-1.21	0.9711	
RnB - Rock	-5.455	<.0001	*

Beat 3/4

Country - Elec.	-13.894	<.0001	*
Country - Latin	-10.253	<.0001	*

Country - Metal	-8.841	<.0001	*
Country - Pop	-5.727	<.0001	*
Country - Punk	-9.251	<.0001	*
Country - Rap	-26.898	<.0001	*
Country - Reggae	-17.409	<.0001	*
Country - RnB	-9.556	<.0001	*
Country - Rock	-10.591	<.0001	*
Elec. - Latin	0.824	0.9982	
Elec. - Metal	4.305	0.0007	*
Elec. - Pop	12.247	<.0001	*
Elec. - Punk	2.631	0.203	
Elec. - Rap	-15.777	<.0001	*
Elec. - Reggae	-6.032	<.0001	*
Elec. - RnB	5.053	<.0001	*
Elec. - Rock	7.948	<.0001	*
Latin - Metal	2.587	0.2234	
Latin - Pop	7.407	<.0001	*
Latin - Punk	1.416	0.9225	
Latin - Rap	-12.47	<.0001	*
Latin - Reggae	-5.512	<.0001	*
Latin - RnB	2.903	0.1045	
Latin - Rock	4.079	0.0018	*
Metal - Pop	5.387	<.0001	*
Metal - Punk	-1.134	0.9812	
Metal - Rap	-18.021	<.0001	*
Metal - Reggae	-9.174	<.0001	*
Metal - RnB	0.142	1	
Metal - Rock	1.124	0.9824	
Pop - Punk	-6.09	<.0001	*
Pop - Rap	-30.22	<.0001	*
Pop - Reggae	-16.32	<.0001	*
Pop - RnB	-6.166	<.0001	*
Pop - Rock	-8.076	<.0001	*
Punk - Rap	-15.027	<.0001	*
Punk - Reggae	-7.359	<.0001	*
Punk - RnB	1.36	0.9393	
Punk - Rock	2.412	0.3184	
Rap - Reggae	7.23	<.0001	*
Rap - RnB	20.543	<.0001	*
Rap - Rock	28.238	<.0001	*
Reggae - RnB	10.192	<.0001	*
Reggae - Rock	13.131	<.0001	*
RnB - Rock	1.162	0.9779	
Beat 4/4			
Country - Elec.	0.27	1	
Country - Latin	-0.283	1	
Country - Metal	-2.819	0.13	
Country - Pop	3.029	0.0741	
Country - Punk	-3.411	0.0227	*

Country - Rap	-1.78	0.7483	
Country - Reggae	-2.269	0.4095	
Country - RnB	0.479	1	
Country - Rock	-3.086	0.0629	
Elec. - Latin	-0.553	0.9999	
Elec. - Metal	-3.544	0.0144	*
Elec. - Pop	3.464	0.019	*
Elec. - Punk	-4.104	0.0017	*
Elec. - Rap	-2.448	0.2974	
Elec. - Reggae	-2.866	0.1153	
Elec. - RnB	0.253	1	
Elec. - Rock	-4.549	0.0002	*
Latin - Metal	-2.245	0.4256	
Latin - Pop	2.944	0.0938	
Latin - Punk	-2.842	0.1226	
Latin - Rap	-1.261	0.962	
Latin - Reggae	-1.772	0.7533	
Latin - RnB	0.736	0.9993	
Latin - Rock	-2.242	0.428	
Metal - Pop	6.851	<.0001	*
Metal - Punk	-0.838	0.998	
Metal - Rap	1.354	0.9407	
Metal - Reggae	0.47	1	
Metal - RnB	3.731	0.0073	*
Metal - Rock	0.669	0.9997	
Pop - Punk	-7.021	<.0001	*
Pop - Rap	-6.212	<.0001	*
Pop - Reggae	-5.899	<.0001	*
Pop - RnB	-3.11	0.0586	
Pop - Rock	-11.57	<.0001	*
Punk - Rap	2.127	0.5079	
Punk - Reggae	1.245	0.965	
Punk - RnB	4.271	0.0008	*
Punk - Rock	1.642	0.8273	
Rap - Reggae	-0.783	0.9988	
Rap - RnB	2.667	0.1874	
Rap - Rock	-1.211	0.9709	
Reggae - RnB	3.052	0.0694	
Reggae - Rock	0.007	1	
RnB - Rock	-4.781	0.0001	*

Table S2 Pairwise Tukey genre comparisons for each beat subdivision.
* indicates the genre pair were statistically significantly distinct.

Comparison	t-value	p-value	Significance
Beat Subdiv. N			
Country - Elec.	9.196	<.0001	*
Country - Latin	-10.186	<.0001	*
Country - Metal	31.857	<.0001	*
Country - Pop	-1.743	0.7708	

Country - Punk	24.575	<.0001	*
Country - Rap	-4.756	0.0001	*
Country - Reggae	-15.351	<.0001	*
Country - RnB	-24.432	<.0001	*
Country - Rock	18.893	<.0001	*
Elec. - Latin	-19.537	<.0001	*
Elec. - Metal	27.361	<.0001	*
Elec. - Pop	-15.162	<.0001	*
Elec. - Punk	19.169	<.0001	*
Elec. - Rap	-16.773	<.0001	*
Elec. - Reggae	-27.004	<.0001	*
Elec. - RnB	-40.472	<.0001	*
Elec. - Rock	10.731	<.0001	*
Latin - Metal	39.29	<.0001	*
Latin - Pop	10.762	<.0001	*
Latin - Punk	32.329	<.0001	*
Latin - Rap	7.11	<.0001	*
Latin - Reggae	-3.672	0.0091	*
Latin - RnB	-10.377	<.0001	*
Latin - Rock	29.014	<.0001	*
Metal - Pop	-42.982	<.0001	*
Metal - Punk	-4.955	<.0001	*
Metal - Rap	-41.674	<.0001	*
Metal - Reggae	-48.079	<.0001	*
Metal - RnB	-62.127	<.0001	*
Metal - Rock	-24.604	<.0001	*
Pop - Punk	31.885	<.0001	*
Pop - Rap	-4.453	0.0004	*
Pop - Reggae	-17.777	<.0001	*
Pop - RnB	-31.921	<.0001	*
Pop - Rock	37.736	<.0001	*
Punk - Rap	-32.122	<.0001	*
Punk - Reggae	-39.42	<.0001	*
Punk - RnB	-50.574	<.0001	*
Punk - Rock	-14.906	<.0001	*
Rap - Reggae	-12.747	<.0001	*
Rap - RnB	-23.534	<.0001	*
Rap - Rock	32.545	<.0001	*
Reggae - RnB	-7.231	<.0001	*
Reggae - Rock	40.373	<.0001	*
RnB - Rock	63.457	<.0001	*
Beat Subdiv. E			
Country - Elec.	12.59	<.0001	*
Country - Latin	2.64	0.199	
Country - Metal	4.138	0.0014	*
Country - Pop	6.595	<.0001	*
Country - Punk	12.961	<.0001	*
Country - Rap	4.513	0.0003	*
Country - Reggae	8.847	<.0001	*

Country - RnB	2.803	0.1351	
Country - Rock	10.082	<.0001	*
Elec. - Latin	-8.208	<.0001	*
Elec. - Metal	-8.341	<.0001	*
Elec. - Pop	-9.297	<.0001	*
Elec. - Punk	2.842	0.1226	
Elec. - Rap	-9.656	<.0001	*
Elec. - Reggae	-2.576	0.2288	
Elec. - RnB	-11.684	<.0001	*
Elec. - Rock	-6.541	<.0001	*
Latin - Metal	1.034	0.9902	
Latin - Pop	2.534	0.2501	
Latin - Punk	9.356	<.0001	*
Latin - Rap	1.068	0.9877	
Latin - Reggae	5.374	<.0001	*
Latin - RnB	-0.444	1	
Latin - Rock	5.209	<.0001	*
Metal - Pop	1.607	0.8453	
Metal - Punk	9.415	<.0001	*
Metal - Rap	-0.061	1	
Metal - Reggae	4.958	<.0001	*
Metal - RnB	-1.836	0.7124	
Metal - Rock	4.916	<.0001	*
Pop - Punk	9.849	<.0001	*
Pop - Rap	-2.003	0.5966	
Pop - Reggae	4.56	0.0002	*
Pop - RnB	-4.372	0.0005	*
Pop - Rock	5.416	<.0001	*
Punk - Rap	-10.344	<.0001	*
Punk - Reggae	-4.665	0.0001	*
Punk - RnB	-11.927	<.0001	*
Punk - Rock	-7.754	<.0001	*
Rap - Reggae	5.55	<.0001	*
Rap - RnB	-2.034	0.5746	
Rap - Rock	6.214	<.0001	*
Reggae - RnB	-7.264	<.0001	*
Reggae - Rock	-1.883	0.6809	
RnB - Rock	8.871	<.0001	*
Beat Subdiv. +			
Country - Elec.	9.656	<.0001	*
Country - Latin	9.871	<.0001	*
Country - Metal	26.427	<.0001	*
Country - Pop	2.065	0.5526	
Country - Punk	18.497	<.0001	*
Country - Rap	2.631	0.2028	
Country - Reggae	-4.605	0.0002	*
Country - RnB	-12.047	<.0001	*
Country - Rock	15.909	<.0001	*
Elec. - Latin	2.476	0.2816	

Elec. - Metal	20.581	<.0001	*
Elec. - Pop	-10.95	<.0001	*
Elec. - Punk	11.86	<.0001	*
Elec. - Rap	-8.408	<.0001	*
Elec. - Reggae	-15.094	<.0001	*
Elec. - RnB	-26.084	<.0001	*
Elec. - Rock	5.983	<.0001	*
Latin - Metal	13.779	<.0001	*
Latin - Pop	-10.103	<.0001	*
Latin - Punk	7.49	<.0001	*
Latin - Rap	-8.645	<.0001	*
Latin - Reggae	-14.14	<.0001	*
Latin - RnB	-21.66	<.0001	*
Latin - Rock	0.962	0.9942	
Metal - Pop	-31.955	<.0001	*
Metal - Punk	-6.055	<.0001	*
Metal - Rap	-27.71	<.0001	*
Metal - Reggae	-31.482	<.0001	*
Metal - RnB	-42.962	<.0001	*
Metal - Rock	-20.159	<.0001	*
Pop - Punk	20.868	<.0001	*
Pop - Rap	1.077	0.987	
Pop - Reggae	-7.964	<.0001	*
Pop - RnB	-19.413	<.0001	*
Pop - Rock	24.865	<.0001	*
Punk - Rap	-18.341	<.0001	*
Punk - Reggae	-23.056	<.0001	*
Punk - RnB	-32.104	<.0001	*
Punk - Rock	-9.67	<.0001	*
Rap - Reggae	-7.937	<.0001	*
Rap - RnB	-17.542	<.0001	*
Rap - Rock	16.908	<.0001	*
Reggae - RnB	-6.951	<.0001	*
Reggae - Rock	22.555	<.0001	*
RnB - Rock	39.982	<.0001	*

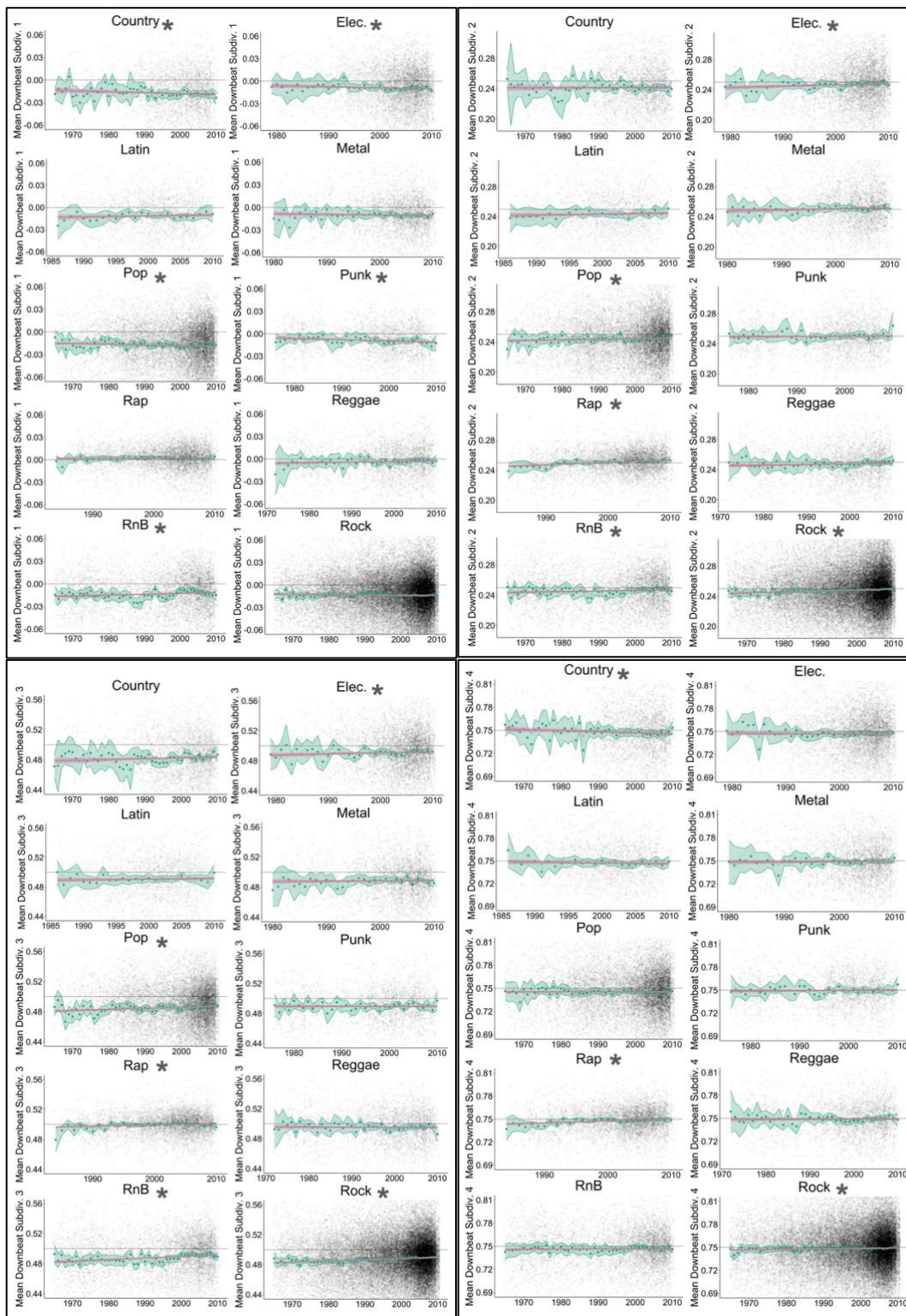
Beat Subdiv. A

Country - Elec.	1.326	0.9479	
Country - Latin	-3.181	0.0474	*
Country - Metal	-5.365	<.0001	*
Country - Pop	-2.984	0.0841	
Country - Punk	-4.393	0.0005	*
Country - Rap	-14.846	<.0001	*
Country - Reggae	-1.265	0.9612	
Country - RnB	-10.299	<.0001	*
Country - Rock	2.559	0.2374	
Elec. - Latin	-4.731	0.0001	*
Elec. - Metal	-7.608	<.0001	*
Elec. - Pop	-5.673	<.0001	*
Elec. - Punk	-6.216	<.0001	*

Elec. - Rap	-19.511	<.0001	*
Elec. - Reggae	-2.802	0.1356	
Elec. - RnB	-14.008	<.0001	*
Elec. - Rock	1.325	0.948	
Latin - Metal	-1.588	0.8543	
Latin - Pop	1.247	0.9646	
Latin - Punk	-0.976	0.9936	
Latin - Rap	-9.637	<.0001	*
Latin - Reggae	2.059	0.5566	
Latin - RnB	-5.61	<.0001	*
Latin - Rock	6.222	<.0001	*
Metal - Pop	3.784	0.006	*
Metal - Punk	0.572	0.9999	
Metal - Rap	-9.306	<.0001	*
Metal - Reggae	4.117	0.0016	*
Metal - RnB	-4.572	0.0002	*
Metal - Rock	10.249	<.001	*
Pop - Punk	-2.644	0.197	
Pop - Rap	-17	<.0001	*
Pop - Reggae	-5.899	0.9204	
Pop - RnB	-10.63	<.0001	*
Pop - Rock	10.486	<.0001	*
Punk - Rap	-9.007	<.0001	*
Punk - Reggae	3.231	0.0407	*
Punk - RnB	-4.744	0.0001	*
Punk - Rock	8.109	<.0001	*
Rap - Reggae	13.602	<.0001	*
Rap - RnB	5.405	<.0001	*
Rap - Rock	26.873	<.0001	*
Reggae - RnB	-8.994	<.0001	*
Reggae - Rock	4.349	0.0006	*
RnB - Rock	19.622	<.0001	*

S3:

Relationship between beat and year for each genre. ``\*`` denotes a significant effect of year. The red line represents the predicted slope with 95% confidence intervals. The green diamond and ribbon represent the mean per year and the standard error. A horizontal line at 0, 0.25, 0.5, and 0.75, respectively, indicates the idealized grid location for that downbeat subdivision.



S4:

Relationship between beat subdivision and year for each genre. ``*'' denotes a significant effect of year. The red line represents the predicted slope with 95% confidence intervals. The green diamond and ribbon represent the mean per year and the standard error. A horizontal line at 0, 0.25, 0.5, and 0.75, respectively, indicates the idealized grid location for that beat subdivision.

