

Table S1. Comparative study of companies by sector

Variables	Meat							
	Mean					ANOVA		Wilcoxon matched pairs signed rank test
	NINF	NIF	INF	IF	Total	F test	p value	
Indebtedness	0.584	0.545	0.635	0.584	0.559	20.619	0.000	INF>IF~NINF>NIF
ΔAssets	0.048	0.065	0.052	0.045	0.059	3.876	0.009	NIF>NINF,IF
ΔMarket share	0.055	0.035	0.021	0.031	0.036	1.284	0.278	No differences
Total assets	8.860	8.127	8.883	8.092	8.222	114.044	0.000	INF>NINF>IF~NIF
Commercial credit	-1.803	-1.871	-1.673	-1.920	-1.868	4.699	0.003	INF>NINF>NIF~IF
Market share	-8.312	-8.808	-7.972	-8.443	-8.657	72.021	0.000	INF>NINF~IF>NIF
Cost efficiency	-0.080	-0.029	-0.120	-0.004	-0.032	24.551	0.000	NIF~IF>NINF>INF
Capital intensity	1.275	1.044	0.974	0.785	1.017	27.243	0.000	NINF>INF>NIF>IF
Liquidity	0.330	0.549	0.258	0.449	0.497	27.402	0.000	NIF>IF>NINF>INF
Asset turnover	-0.206	0.031	0.111	0.431	0.087	87.360	0.000	IF>INF>INF>NINF
Sales margin	0.372	0.318	0.299	0.269	0.314	28.415	0.000	NINF>NIF>INF~IF
Profitability	4.435	3.955	1.505	3.961	3.951	7.336	0.000	NIF~NINF~IF>INF
Listwise observations	902	5,211	194	1,588	7,895			
% Listwise observations	81.6	86.0	77.6	86.3	85.3			

Table S1. Comparative study of companies by sector (cont.)

Variables	Fish							
	Mean					ANOVA		Wilcoxon matched pairs signed rank test
	NINF	NIF	INF	IF	Total	F test	p value	
Indebtedness	0.571	0.492	0.584	0.588	0.528	23.985	0.000	INF~IF~NINF>NIF
ΔAssets	0.087	0.040	0.073	0.066	0.052	2.210	0.085	NINF~INF>IF~NIF
ΔMarket share	0.136	0.038	0.061	0.019	0.043	4.325	0.005	NINF>NIF,IF
Total assets	9.327	8.020	9.046	7.880	8.145	84.605	0.000	NINF>INF>NIF>IF
Commercial credit	-1.889	-2.500	-1.600	-2.008	-2.280	25.648	0.000	INF>NINF>IF>NIF
Market share	-6.441	-7.498	-6.563	-7.258	-7.302	57.398	0.000	NINF>INF>IF>NIF
Cost efficiency	0.025	0.008	-0.022	-0.025	0.000	7.061	0.000	NINF>NIF>INF~IF
Capital intensity	1.215	0.537	1.690	0.608	0.669	47.817	0.000	INF>NINF>IF~NIF
Liquidity	0.664	0.737	0.353	0.465	0.643	15.544	0.000	NIF~NINF>IF~INF
Asset turnover	-0.356	-0.105	-0.195	0.275	-0.035	48.995	0.000	IF>NIF~INF>NINF
Sales margin	0.442	0.577	0.403	0.353	0.500	105.433	0.000	NIF>NINF~INF>IF
Profitability	6.511	5.478	3.435	3.589	4.986	5.872	0.001	NIF,NINF>INF,IF
Listwise observations	194	1,414	114	584	2,306			
% Listwise observations	74.6	77.9	91.2	81.7	79.1			

Table S1. Comparative study of companies by sector (cont.)

Variables	Fruits & Vegetables							
	Mean					ANOVA		Wilcoxon matched pairs signed rank test
	NINF	NIF	INF	IF	Total	F test	p value	
Indebtedness	0.512	0.530	0.576	0.577	0.539	10.910	0.000	INF~IF>NINF~NIF
ΔAssets	0.058	0.100	0.069	0.093	0.092	3.444	0.016	IF~NIF>NINF~INF
ΔMarket share	0.062	0.093	0.080	0.071	0.085	1.138	0.332	No differences
Total assets	8.671	7.714	8.881	7.813	7.897	123.649	0.000	INF>NINF>IF>NIF
Commercial credit	-1.552	-1.729	-1.697	-1.571	-1.678	8.035	0.000	NINF,IF>NIF
Market share	-7.688	-8.426	-7.389	-8.152	-8.243	81.345	0.000	INF>NINF>IF>NIF
Cost efficiency	-0.092	-0.037	-0.071	-0.041	-0.046	6.433	0.000	NIF>IF>NINF>INF
Capital Intensity	1.300	0.756	1.052	0.855	0.850	22.277	0.000	NINF~INF>IF~NIF
Liquidity	0.410	0.488	0.275	0.303	0.436	11.533	0.000	NIF>IF~NINF>INF
Asset turnover	-0.579	-0.360	-0.490	-0.186	-0.359	17.532	0.000	IF>NIF>INF>NINF
Sales margin	0.501	0.545	0.495	0.457	0.522	31.450	0.000	NIF~NINF>INF>IF
Profitability	2.566	5.737	2.657	4.340	4.975	23.803	0.000	NIF>IF>NINF~INF
Listwise observations	578	3333	242	919	5072			
% Listwise observations	83.2	80.2	79.3	84.3	81.2			

Table S1. Comparative study of companies by sector (cont.)

Variables	Oils & Fats							
	Mean					ANOVA		Wilcoxon matched pairs signed rank test
	NINF	NIF	INF	IF	Total	F test	p value	
Indebtedness	0.495	0.539	0.597	0.558	0.540	2.364	0.069	No differences
ΔAssets	0.042	0.060	0.090	0.074	0.062	0.766	0.513	No differences
ΔMarket share	0.111	0.069	0.143	0.065	0.074	0.463	0.708	No differences
Total assets	9.010	7.801	8.711	8.156	8.008	43.064	0.000	INF~NINF>IF>NIF
Commercial credit	-1.644	-2.061	-1.512	-1.882	-1.973	9.742	0.000	INF~NINF>IF>NIF
Market share	-7.529	-8.486	-7.757	-8.173	-8.316	14.992	0.000	INF~NINF>IF>NIF
Cost efficiency	-0.124	-0.096	-0.036	-0.095	-0.097	0.719	0.541	No differences
Capital Intensity	2.190	1.866	1.572	1.947	1.905	4.251	0.005	NINF>INF~NIF
Liquidity	0.444	0.522	0.330	0.424	0.492	1.282	0.279	No differences
Asset turnover	-0.786	-0.532	-0.698	-0.573	-0.569	2.126	0.095	No differences
Sales margin	0.468	0.314	0.522	0.350	0.341	12.261	0.000	INF~NINF>NIF~IF
Profitability	2.785	3.120	2.486	3.523	3.145	0.436	0.727	No differences
Listwise observations	172	1,206	44	317	1,739			
% Listwise observations	81.9	76.6	62.9	81.3	77.5			

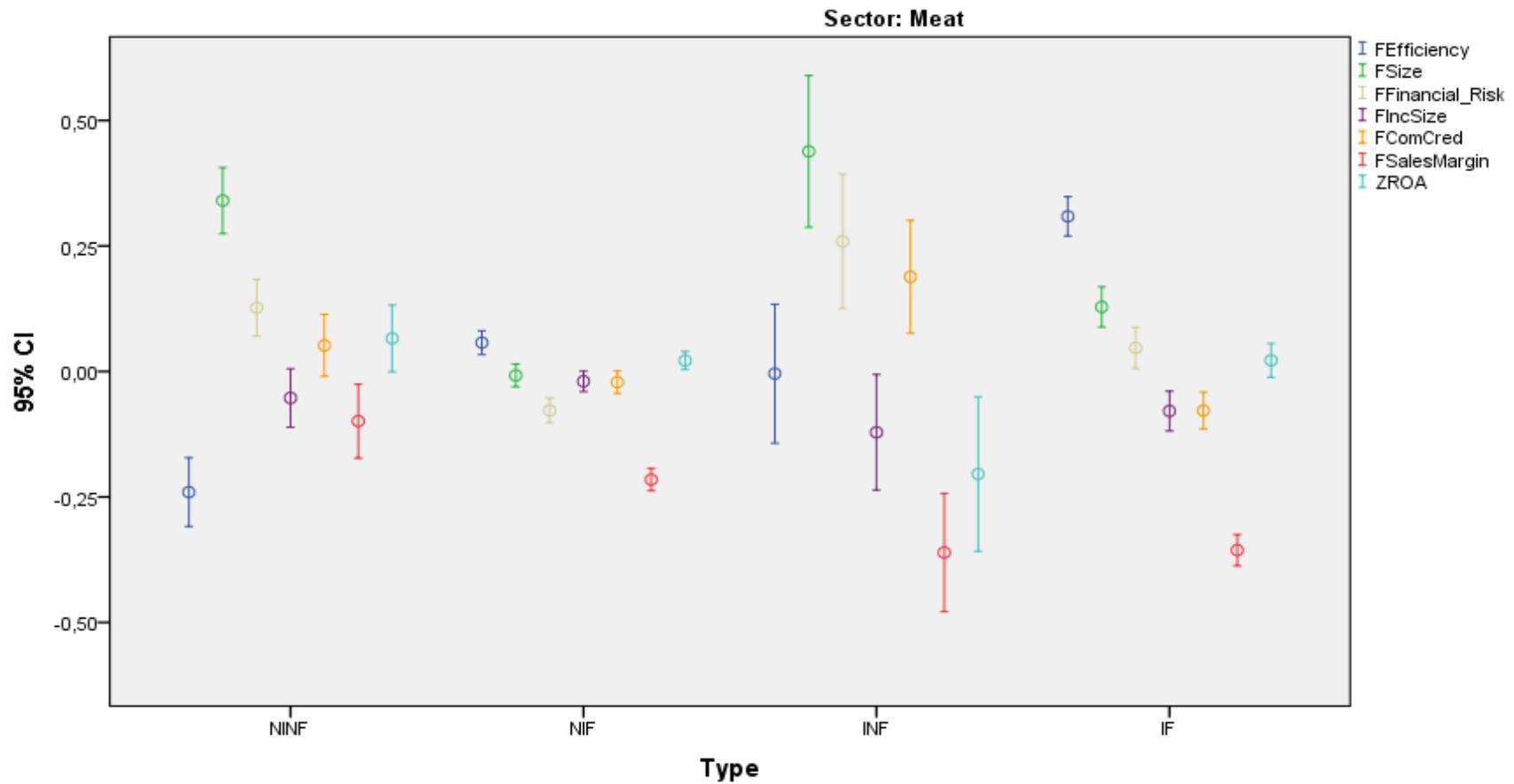


Figure S1. Factor and profitability error plots by type of firm in the Meat sector

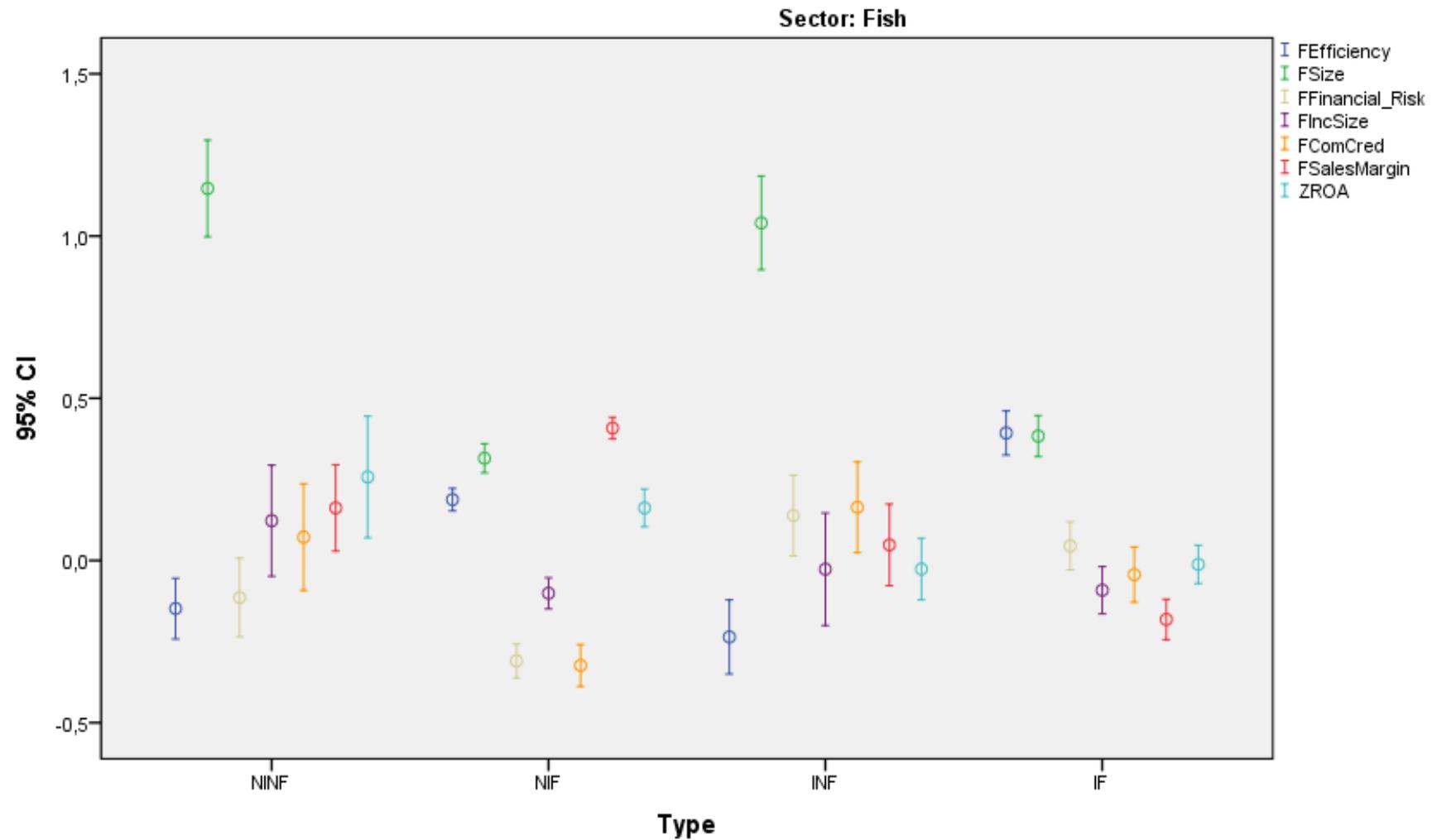


Figure S2. Factor and profitability error plots by type of firm in the Fish sector

Supplementary tables and figures to the article “The influence of family ownership in the profitability of vertically integrated companies. Evidence from the Spanish agri-food industry”, by José L. Gallizo, Jordi Moreno and Manuel Salvador. *Spanish Journal of Agricultural Research*, Vol. 17, No. 2, June 2019 (<https://doi.org/10.5424/sjar/2019172-14215>)

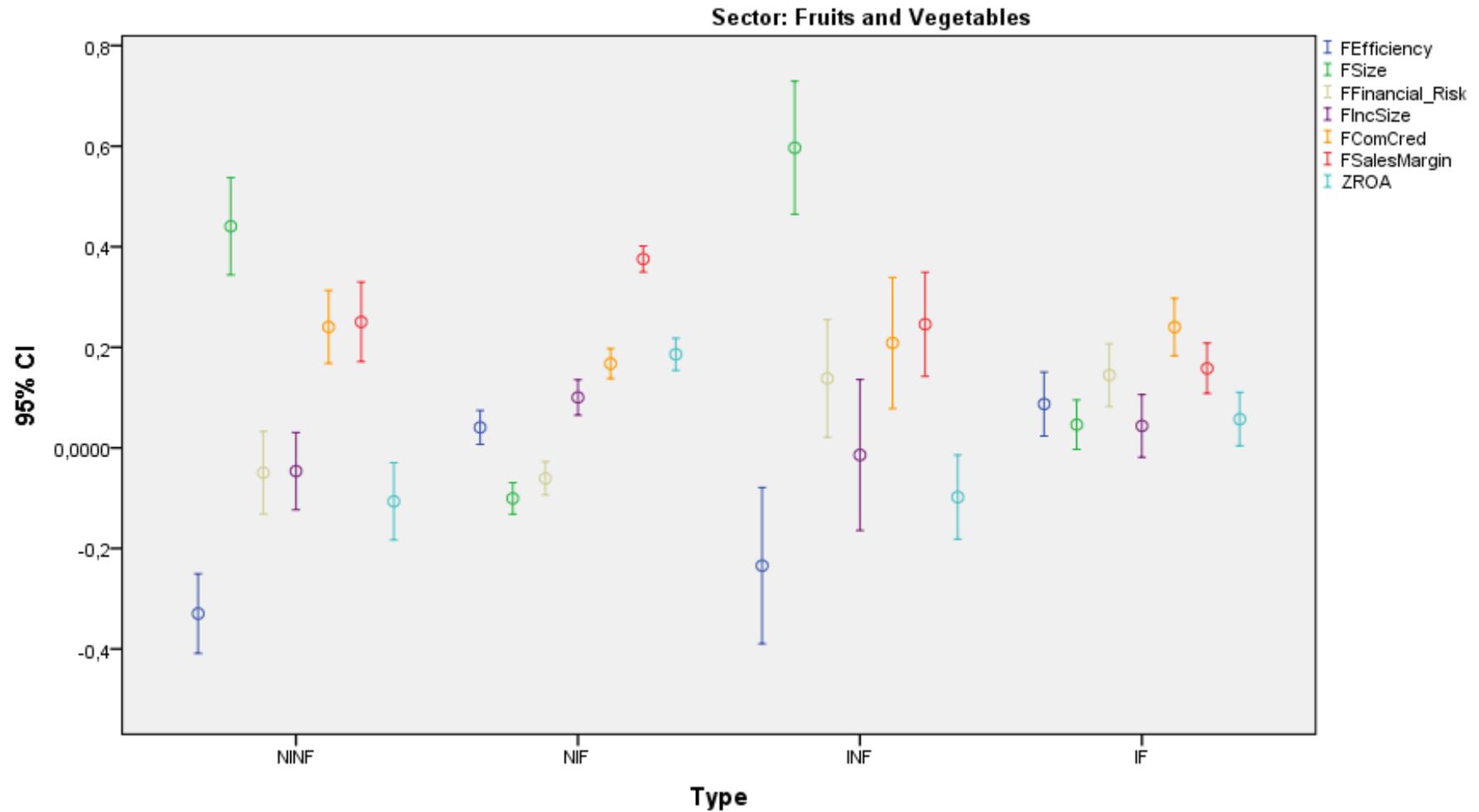


Figure S3. Factor and profitability error plots by type of firm in the Fruits & Vegetables sector

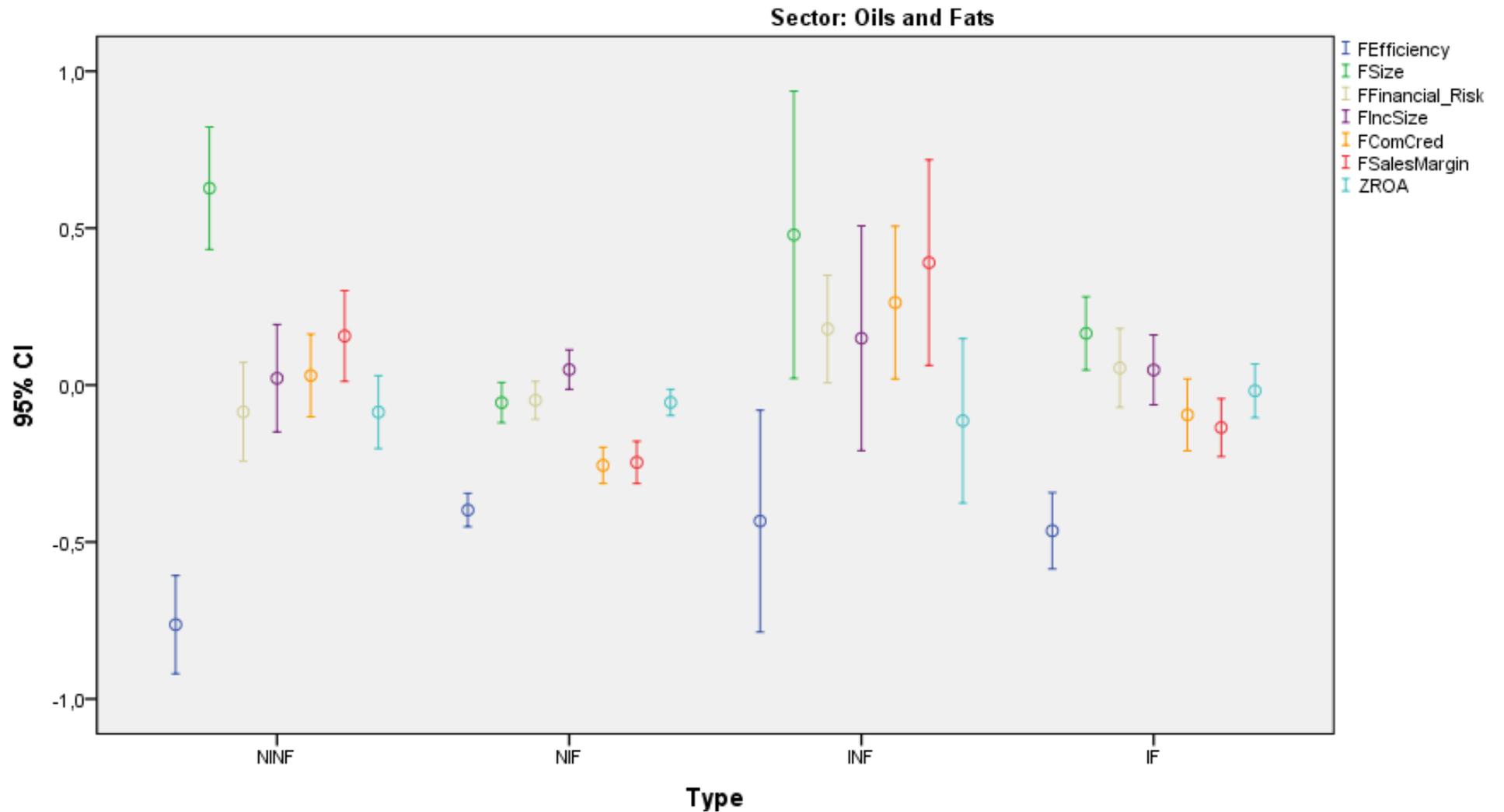


Figure S4. Factor and profitability error plots by type of firm in the Oils & Fats sector