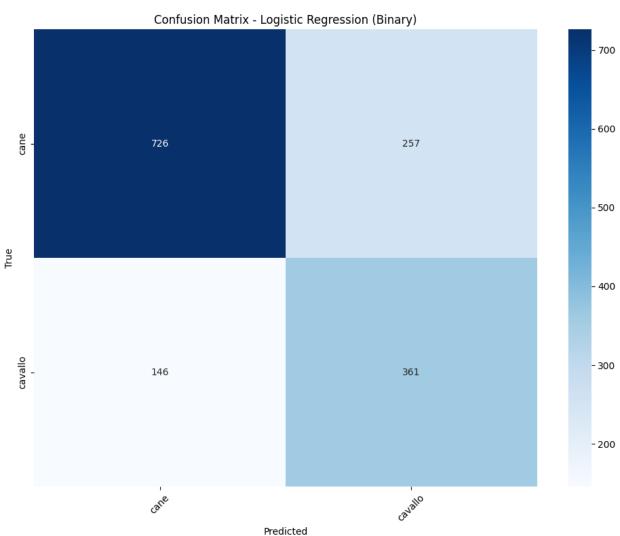
Running Binary Logistic Regression...

Logistic Regression (Binary) Results:

Accuracy: 0.7295302013422819

Classification Report:

	precision	recall	f1-score	support
cane cavallo	0.83 0.58	0.74 0.71	0.78 0.64	983 507
accuracy macro avg weighted avg	0.71 0.75	0.73 0.73	0.73 0.71 0.73	1490 1490 1490



Running Softmax Regression...

Softmax Regression Results: Accuracy: 0.25124539744422786

Classification Report:

	precision	recall	f1-score	support
		0.00	0.00	000
cane	0.00	0.00	0.00	983
cavallo	0.19	0.67	0.29	507
elefante	0.00	0.00	0.00	310
farfalla	0.24	0.10	0.14	406
gatto	1.00	0.00	0.01	311
mucca	0.20	0.00	0.00	403
pecora	0.00	0.00	0.00	384
ragno	0.30	0.83	0.44	937
scoiattolo	0.00	0.00	0.00	376
accuracy			0.25	4617
macro avg	0.21	0.18	0.10	4617
weighted avg	0.19	0.25	0.13	4617

Confusion Matrix - Softmax Regression

Confusion Matrix - Softmax Regression										
cane -	0	340	0	39	0	0	0	604	0	- 700
cavallo	0	339	0	3	0	1	0	164	0	
elefante '	0	179	0	6	0	0	0	125	0	- 600
farfalla '	4	110	0	41	0	2	0	249	0	- 500
True gatto '	0	110	0	13	1	0	0	187	0	- 400
mucca -	0	271	0	3	0	1	0	128	0	- 300
pecora	1	186	0	27	0	1	0	169	0	- 200
ragno	1	127	0	31	0	0	0	778	0	- 100
scoiattolo	1	131	0	11	0	0	0	233	0	-0
	ane	cavallo	defante	fatalia	gatto	Mucca	PECOTO	(adho	scoiatolo	- 0

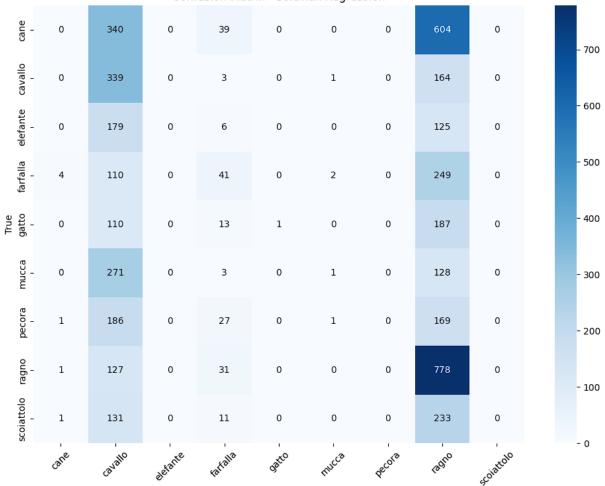
Predicted

SVM (RBF Kernel) Results: Accuracy: 0.46242148581329867

Classification Report:

	precision	recall	f1-score	support
cane	0.37	0.66	0.47	983
cavallo	0.50	0.53	0.51	507
elefante	0.52	0.13	0.21	310
farfalla	0.62	0.39	0.48	406
gatto	0.36	0.03	0.05	311
mucca	0.52	0.29	0.37	403
pecora	0.53	0.35	0.42	384
ragno	0.52	0.74	0.61	937
scoiattolo	0.48	0.15	0.23	376
accuracy			0.46	4617
macro avg	0.49	0.36	0.37	4617
weighted avg	0.48	0.46	0.43	4617

Confusion Matrix - Softmax Regression



Predicted

KNN (k=3) Results:

Accuracy: 0.32401992635910765

Classification Report:

precision	recall	f1-score	support
0.37	0.31	0.34	983
0.47	0.21	0.29	507
0.21	0.14	0.17	310
0.38	0.13	0.20	406
0.23	0.08	0.12	311
0.55	0.15	0.23	403
0.45	0.17	0.24	384
0.29	0.87	0.43	937
0.44	0.08	0.14	376
		0.32	4617
0.38	0.24	0.24	4617
0.37	0.32	0.28	4617
	0.37 0.47 0.21 0.38 0.23 0.55 0.45 0.29 0.44	0.37	0.37

	Confusion Matrix - KNN (k=3)									
cane	302	28	22	18	25	13	19	540	16	- 800
cavallo	94	107	38	9	5	12	10	224	8	- 700
elefante	53	22	42	3	7	3	4	175	1	- 600
farfalla '	49	4	4	54	5	4	4	279	3	- 500
gatto	94	7	12	14	25	1	3	154	1	- 400
mucca	67	32	34	10	10	59	21	164	6	- 300
pecora	52	14	21	9	7	10	64	206	1	- 200
ragno	65	9	14	16	7	2	9	813	2	- 100
scoiattolo	40	5	11	11	16	4	7	252	30	
	cane	cavallo	defante	Parfalla	gatto	Mucca	Pecoria	(sqro	scoiatolo	

Predicted