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julia> include("/Users/rob/.julia/dev/DynamicHMCModels/scripts/ProbabilityModels/LR.jl")
Defined model: LogisticRegressionModel.
Unknowns:  $\mu_1$ ,  $\beta_1$ ,  $y$ ,  $\mu_0$ ,  $\sigma_0$ ,  $\beta_0$ ,  $X$ ,  $\sigma_1$ .
```

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ProbabilityModels result:

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MCMC, adapting  $\epsilon$  (75 steps)
5.8e-5 s/step ...done
MCMC, adapting  $\epsilon$  (25 steps)
7.6e-5 s/step ...done
MCMC, adapting  $\epsilon$  (50 steps)
7.8e-5 s/step ...done
MCMC, adapting  $\epsilon$  (100 steps)
7.7e-5 s/step ...done
MCMC, adapting  $\epsilon$  (200 steps)
6.6e-5 s/step ...done
MCMC, adapting  $\epsilon$  (400 steps)
7.5e-5 s/step ...done
MCMC, adapting  $\epsilon$  (50 steps)
6.5e-5 s/step ...done
MCMC (40000 steps)
step 14149 (of 40000), 7.1e-5 s/step
step 28136 (of 40000), 7.1e-5 s/step
7.1e-5 s/step ...done
4.731292 seconds (7.11 M allocations: 1.211 GiB, 4.20% gc time)
2-element Array{ChainDataFrame,1}
```

Summary Statistics

Row	parameters Symbol	mean Float64	std Float64	naive_se Float64	mcse Float64	ess Any
1	$\beta_0$	0.0826644	0.0968519	0.00048426	0.00045347	40000.0
2	$\beta_1[1]$	-1.76833	0.141579	0.000707896	0.000808584	40000.0
3	$\beta_1[2]$	-1.63565	0.141615	0.000708074	0.000806777	40000.0
4	$\beta_1[3]$	-0.24055	0.094769	0.000473845	0.000448895	40000.0
5	$\beta_1[4]$	0.725848	0.102635	0.000513176	0.000495735	40000.0

Quantiles

Row	parameters Symbol	2.5% Float64	25.0% Float64	50.0% Float64	75.0% Float64	97.5% Float64
1	$\beta_0$	-0.10688	0.0169645	0.0826647	0.148088	0.273581
2	$\beta_1[1]$	-2.05425	-1.86242	-1.76547	-1.67131	-1.49745
3	$\beta_1[2]$	-1.92046	-1.7298	-1.63365	-1.53845	-1.36583
4	$\beta_1[3]$	-0.427481	-0.304221	-0.240032	-0.17679	-0.0566982
5	$\beta_1[4]$	0.529989	0.655717	0.724278	0.793476	0.931554

CmdStan result:

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5.983267 seconds (4.02 M allocations: 169.474 MiB, 1.10% gc time)
2-element Array{ChainDataFrame,1}
```

Summary Statistics

Row	parameters Symbol	mean Float64	std Float64	naive_se Float64	mcse Float64	ess Any
1	beta0	0.0830798	0.0966846	0.000483423	0.000465577	40000.0
2	beta1.1	-1.76771	0.141411	0.000707055	0.00080182	40000.0
3	beta1.2	-1.63581	0.140257	0.000701283	0.000777791	40000.0
4	beta1.3	-0.24088	0.0957332	0.000478666	0.000445657	40000.0
5	beta1.4	0.727284	0.101893	0.000509467	0.00053683	40000.0

Quantiles

Row	parameters Symbol	2.5% Float64	25.0% Float64	50.0% Float64	75.0% Float64	97.5% Float64
1	beta0	-0.105526	0.0175036	0.0827149	0.148546	0.274493
2	beta1.1	-2.05568	-1.86109	-1.76368	-1.67121	-1.49952
3	beta1.2	-1.91881	-1.72872	-1.63269	-1.54033	-1.36793

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4	beta1.3	-0.429346	-0.306006	-0.240644	-0.17605	-0.0546177
5	beta1.4	0.531337	0.657685	0.725898	0.795382	0.930155