

You can check the result from ps3matlab.mat file

Exercise 1

Part 1 Average and dispersion in product characteristics

product_mean

```
0.518436241610723 0.543210290827736 1.01502013422811 0.437147651006707
0.345281879194616 0.780778523489914 0.825089485458564 1.07740939597319
1.18937583892612 0.568673378076052
```

product_std

```
0.150517396123780 0.120331860361977 0.04289519037007730.118831233524434
0.03516605378205770.114646069952781 0.0612115944791767 0.0297261341808571
0.01405451291647380.0724550047208999
```

Part 2 Market share and share by product characteristics

product_share

1766

699

243

593

315

74

319

203

225

33

Part 3 Mapping between observed attributes and choices

choicebyincome

14x10 double

	1	2	3	4	5	6	7	8	9	10
1	24	16	0	0	40	0	0	0	0	0
2	0	0	0	0	0	0	190	0	0	0
3	63	126	0	63	0	0	0	0	0	0
4	0	0	0	79	0	0	237	0	0	0
5	0	0	0	440	0	0	0	0	0	0
6	220	220	0	0	0	55	55	0	0	0
7	1620	480	0	0	0	0	0	0	0	0
8	34	34	0	0	0	0	0	0	0	0
9	60	60	30	120	0	0	60	0	30	0
10	0	18	0	18	36	0	18	0	0	54
11	50	0	0	200	0	0	0	0	0	0
12	0	0	0	18	18	0	0	0	0	0
13	48	54	0	0	0	0	0	0	0	0
14	12	0	0	0	0	6	0	0	9	0

Exercise 2

para_best

Beta

-7.24722033068798

Alpha

for the first product 0

for the rest

0.08031225442151993.20934699075314 -0.938970989357145 -1.74485072383965

1.31496535505236 0.952253876211817 3.42258315437337 2.61651654631628


-0.720539128133561

Exercise 3

para_ps3

for the first product is all zero

for the rest


 7x9 double

	1	2	3	4	5	6	7	8	9
1	-0.0447	-0.0357	-0.0289	-0.0629	-0.0792	-0.0671	-0.0111	-0.0347	-0.1643
2	0.1839	-0.3628	-0.2984	0.2986	0.1043	-0.1736	-0.3388	-0.0166	-0.1216
3	0.3503	0.2071	0.3396	0.2896	0.1160	-0.5142	0.1587	-0.8814	-0.1981
4	0.2915	0.4970	0.2268	-0.0516	0.8375	0.4495	-0.3190	-0.0829	-0.6625
5	0.2525	0.0355	-0.0585	0.3940	-0.0133	0.3955	-0.3731	-0.3076	1.2023
6	0.3064	0.9931	0.1176	-0.6307	0.3927	-0.2530	-0.7816	0.1446	0.1451
7	0.2030	-0.8256	0.0985	0.0574	-0.6613	0.3001	-0.8266	-0.3130	-0.0751
8									

Exercise 4

Model 1

mebycondi

 10x10 double

	1	2	3	4	5	6	7	8	9	10
1	-0.8904	0.1586	0.1186	0.1541	0.1071	0.1128	0.0523	0.0939	0.0184	0.0746
2	0.1586	-0.8457	0.1159	0.1349	0.1076	0.1031	0.0501	0.0956	0.0184	0.0615
3	0.1186	0.1159	-0.6651	0.0929	0.0809	0.0792	0.0385	0.0755	0.0143	0.0494
4	0.1541	0.1349	0.0929	-0.7264	0.0819	0.0913	0.0408	0.0712	0.0138	0.0456
5	0.1071	0.1076	0.0809	0.0819	-0.6101	0.0676	0.0348	0.0673	0.0131	0.0500
6	0.1128	0.1031	0.0792	0.0913	0.0676	-0.5951	0.0328	0.0596	0.0116	0.0372
7	0.0523	0.0501	0.0385	0.0408	0.0348	0.0328	-0.3129	0.0341	0.0063	0.0233
8	0.0939	0.0956	0.0755	0.0712	0.0673	0.0596	0.0341	-0.5586	0.0133	0.0483
9	0.0184	0.0184	0.0143	0.0138	0.0131	0.0116	0.0063	0.0133	-0.1183	0.0092
10	0.0746	0.0615	0.0494	0.0456	0.0500	0.0372	0.0233	0.0483	0.0092	-0.3990
11										

Model 2

mebymulti

0.00859107222303926 -0.00178926738291999 -0.000163007186037506

0.000470894379668939 -0.00223098966078014 -0.00133491612224936

-0.00253257599275573 0.000994655069170850 -0.000114832065866594
-0.00189103326126977

Exercise 5

Mixed

para_ps5_1

7x10 double

	1	2	3	4	5	6	7	8	9	10
1	-5.4778	-0.0319	-0.0081	-0.0229	-0.0378	-8.6014e...	-0.0224	0.0336	0.0239	-0.2097
2	-1.1810	0.0768	-0.3428	-0.1671	0.1514	-1.7150	0.3228	0.7304	-0.4847	-0.0509
3	-0.1428	0.1857	0.0998	0.2577	0.1285	-0.0908	-0.6497	-0.0552	-0.4709	0.3237
4	1.6150	0.2073	0.2203	0.1475	0.2222	-0.1009	0.3961	-0.2216	-0.0919	-0.2615
5	0.3453	0.3616	0.8514	-0.3754	0.5681	-0.3063	0.2428	-0.8139	0.5558	0.5847
6	0.1837	-0.2944	0.4819	-0.8469	-0.4297	-0.2639	-0.0357	0.4122	0.5189	0.1743
7	0.2571	-0.1921	0.5254	-0.4001	-1.9355	-0.4624	0.2125	-0.4037	0.4883	0.6306
8										

Restricted Mixed

para_ps5_2

para_ps5_2 x me_multi x mebycondi x product_std x product_share x para_ps5_1 x

7x9 double

	1	2	3	4	5	6	7	8	9
1	-4.1198	0.0146	-0.0094	-0.0305	-0.0013	-0.0140	0.0178	0.0227	-0.1131
2	-0.3232	-0.4630	0.1394	-0.3562	0.5151	-0.1257	0.2875	0.1233	0.1501
3	-0.8867	0.2970	0.3031	-0.1207	0.4764	-0.7288	0.6009	-0.4955	0.6528
4	0.8288	0.4822	-0.8444	-1.3585	0.0026	-0.3958	-0.4267	0.4078	0.1238
5	-0.5584	-0.0564	0.3095	0.4057	-0.5263	-0.0185	-0.3590	0.3686	0.6772
6	0.5924	0.7196	0.2033	-0.6283	0.2593	-0.9102	0.1514	1.0465	0.0585
7	-1.2408	0.2915	-0.2010	-0.0721	-0.8240	1.3356	0.6792	0.1008	-0.4162
8									
9									
10									