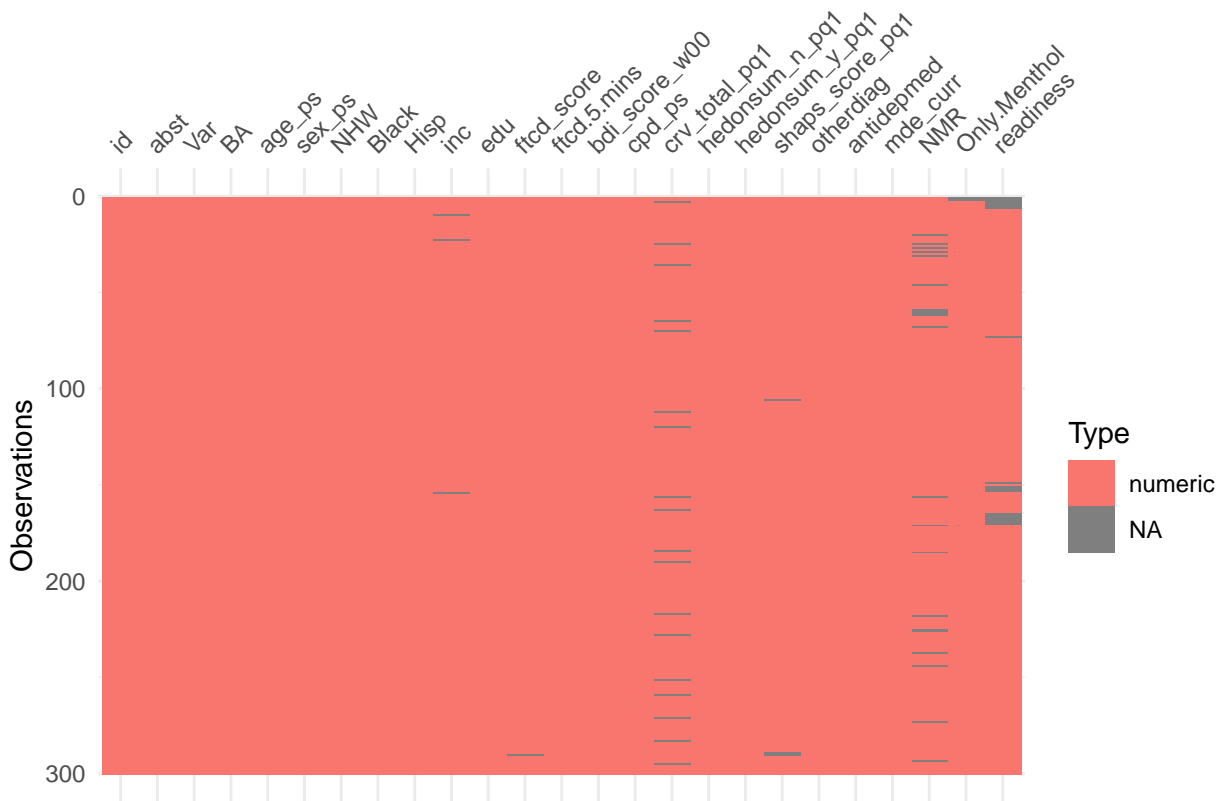


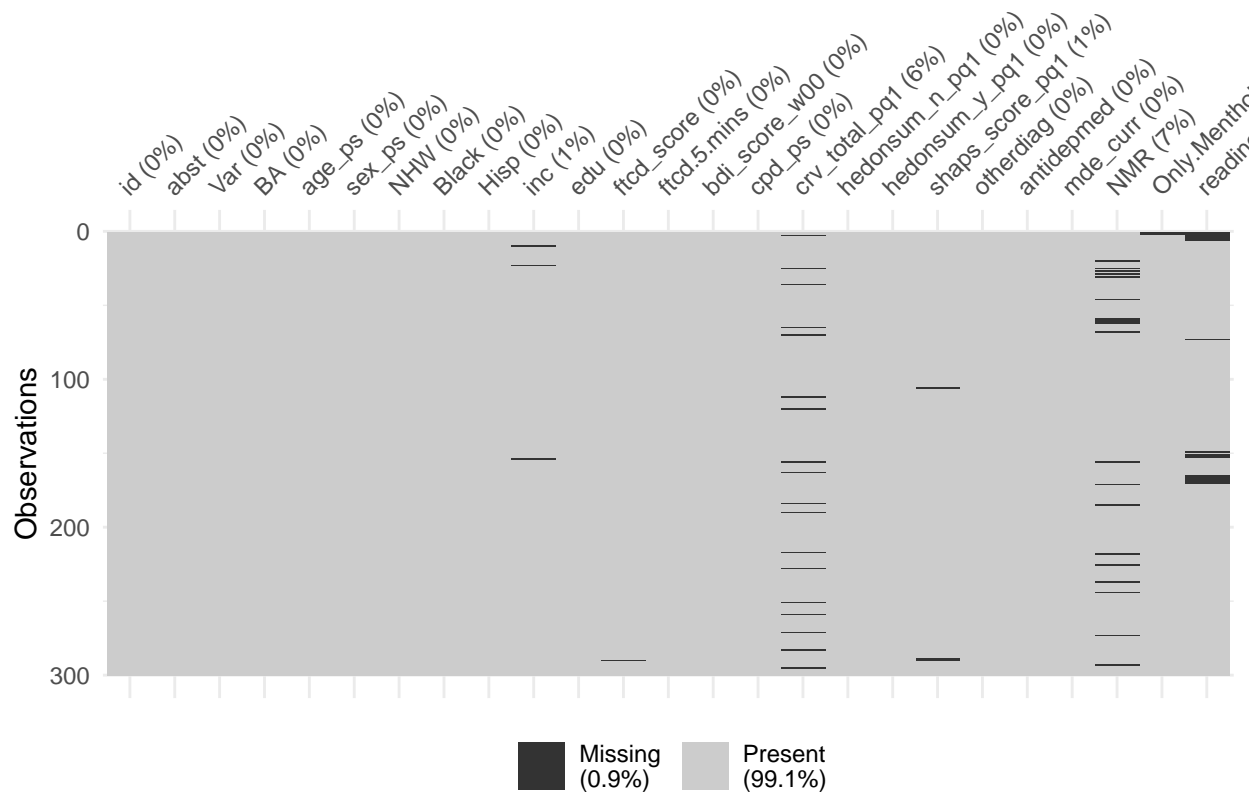
Project2 Report

Diahmin Hawkins dlh2166@columbia.edu

11/6/2024

[1] 300 25





```
## Rows: 300
## Columns: 25
## $ id      <dbl> 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, ~
## $ abst    <dbl> 0, 0, 0, 1, 0, 0, 0, 1, 0, 1, 1, 0, 0, 0, 0, 0, 0, ~
## $ Var     <dbl> 0, 1, 1, 1, 1, 1, 1, 1, 0, 1, 0, 0, 0, 0, 1, 1, 0, 1, ~
## $ BA      <dbl> 0, 1, 0, 1, 1, 1, 0, 1, 1, 0, 0, 1, 0, 1, 1, 0, 0, 1, ~
## $ age_ps  <dbl> 33, 61, 43, 56, 38, 35, 53, 60, 25, 52, 33, 62, 52, 65, ~
## $ sex_ps  <dbl> 2, 1, 2, 2, 2, 1, 2, 2, 2, 1, 2, 2, 2, 2, 1, 2, 1, 1, ~
## $ NHW     <dbl> 1, 0, 0, 1, 1, 1, 0, 1, 0, 0, 1, 1, 1, 0, 0, 0, 1, 1, ~
## $ Black   <dbl> 0, 1, 1, 0, 0, 0, 1, 0, 0, 1, 0, 0, 0, 1, 1, 1, 0, 0, ~
## $ Hisp    <dbl> 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, 0, ~
## $ inc     <dbl> 4, 2, 2, 1, 4, 5, 5, 1, 2, NA, 1, 1, 2, 5, 4, 1, 1, 1, ~
## $ edu     <dbl> 5, 4, 3, 4, 5, 5, 5, 5, 5, 4, 4, 4, 4, 5, 4, 2, 5, 4, ~
## $ ftcd_score <dbl> 6, 4, 3, 4, 4, 3, 4, 4, 7, 6, 4, 9, 6, 7, 7, 7, 6, 5, ~
## $ ftcd.5.mins <dbl> 0, 0, 0, 0, 0, 0, 0, 0, 1, 1, 0, 1, 0, 1, 1, 1, 1, 0, ~
## $ bdi_score_w00 <dbl> 36, 25, 28, 28, 22, 15, 18, 26, 34, 21, 29, 41, 24, 5, ~
## $ cpd_ps   <dbl> 10, 10, 10, 8, 17, 10, 11, 20, 18, 7, 8, 40, 20, 20, 2, ~
## $ crv_total_pq1 <dbl> 12, 2, NA, 1, 15, 8, 5, 8, 11, 8, 7, 4, 9, 14, 6, 9, 1, ~
## $ hedonsum_n_pq1 <dbl> 22, 22, 9, 38, 25, 25, 37, 3, 8, 0, 12, 25, 10, 11, 0, ~
## $ hedonsum_y_pq1 <dbl> 29, 16, 4, 2, 13, 9, 0, 16, 37, 37, 42, 13, 21, 62, 38, ~
## $ shaps_score_pq1 <dbl> 6, 0, 3, 2, 0, 3, 3, 1, 7, 0, 7, 1, 4, 0, 3, 1, 2, 5, ~
## $ otherdiag <dbl> 1, 0, 1, 0, 0, 0, 1, 1, 1, 0, 0, 1, 0, 0, 1, 1, 0, 1, ~
## $ antidepmed <dbl> 1, 0, 0, 1, 0, 0, 1, 1, 1, 0, 0, 1, 0, 0, 1, 0, 0, 1, ~
## $ mde_curr <dbl> 1, 1, 1, 1, 1, 1, 0, 1, 1, 1, 0, 1, 1, 0, 1, 1, 1, 0, ~
## $ NMR      <dbl> 1.18967996, 0.72562408, 0.15200885, 1.59360038, 0.3379, ~
## $ Only.Menthol <dbl> NA, NA, 1, 0, 0, 0, 0, 1, 0, 1, 1, 1, 1, 0, 1, 1, 0, 1, ~
## $ readiness <dbl> NA, NA, NA, NA, NA, NA, 6, 5, 7, 6, 8, 7, 7, 7, 6, 6, ~
```

Missing Data Summary for Smoking Sessation

Variables	Missing Values	Percentage Missing (%)
Income	3	1.00
FTCD Score at Baseline	1	0.33
Cigarette Reward Value at Baseline	18	6.00
Anhedonia	3	1.00
Nicotine Metabolism Ratio	21	7.00
Exclusive Mentholated Cigarette User	2	0.67
Baseline Readiness to Quit Smoking	17	5.67
Total	65	21.67

Correlation of Smoking Cessation

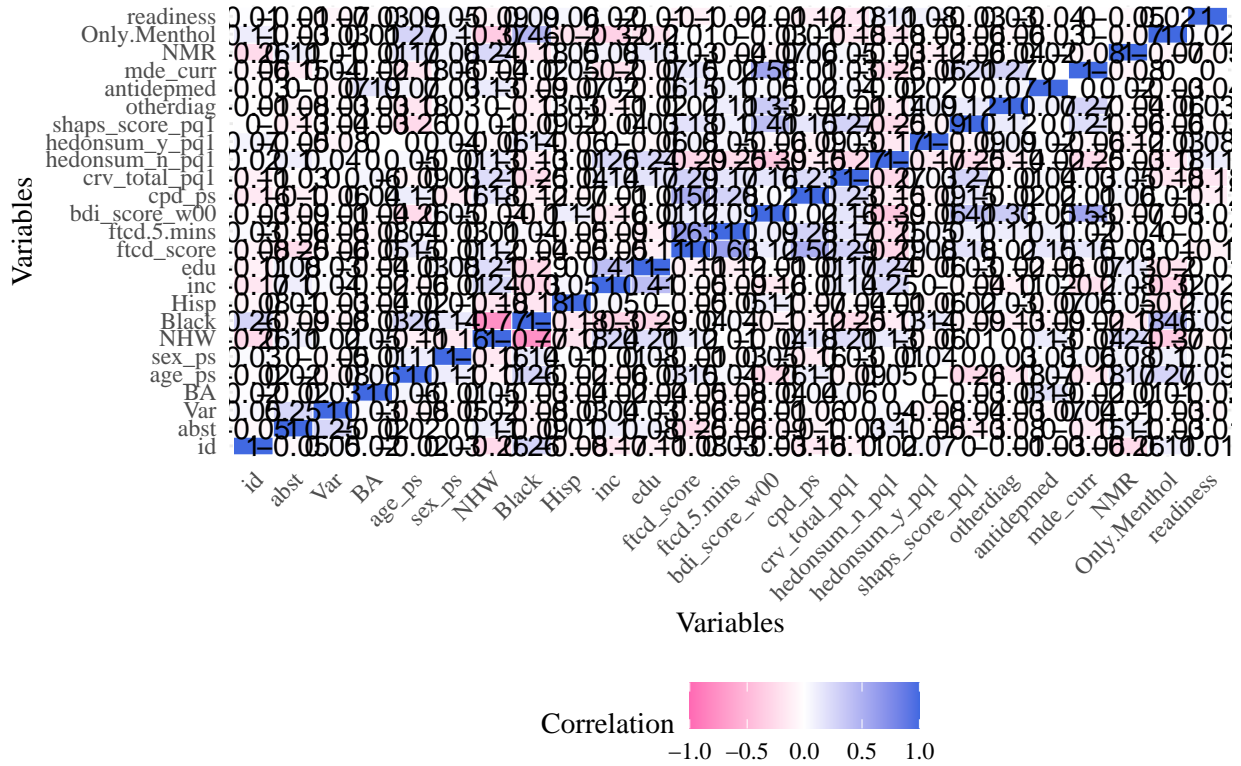
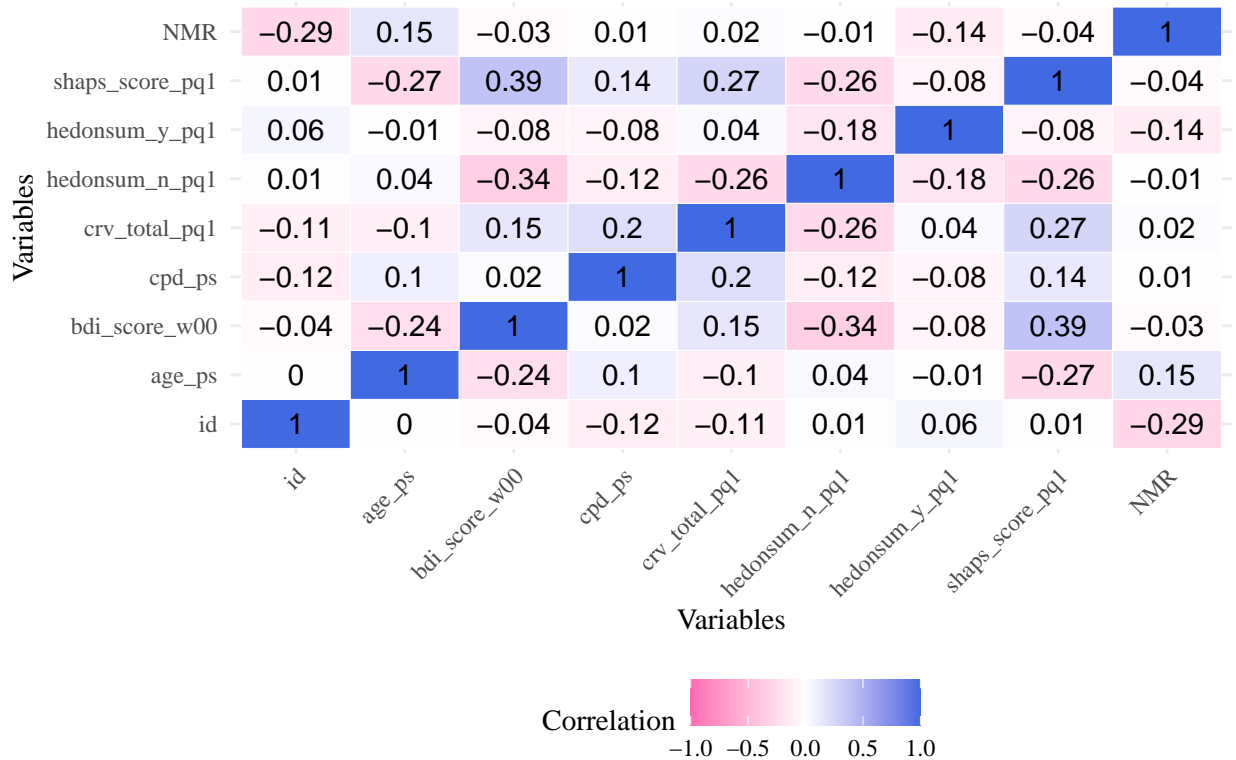


Table 1: Significant Chi-Square Test Results

	Variable 1	Variable 2	Chi-Square	Degrees of Freedom	P-Value
X-squared	abst	Var	21.8554	1	0.0000
X-squared3	abst	NHW	5.7282	1	0.0167
X-squared8	abst	fctd_score	40.4872	10	0.0000
X-squared38	BA	antidepmed	7.0210	1	0.0081
X-squared42	sex_ps	NHW	6.2197	1	0.0126
X-squared43	sex_ps	Black	4.5201	1	0.0335
X-squared53	sex_ps	readiness	19.3378	7	0.0072
X-squared54	NHW	Black	174.1406	1	0.0000
X-squared55	NHW	Hisp	8.7393	1	0.0031

	Variable 1	Variable 2	Chi-Square	Degrees of Freedom	P-Value
X-squared56	NHW	inc	24.4229	4	0.0001
X-squared57	NHW	edu	22.6856	4	0.0001
X-squared61	NHW	antidepmed	4.4881	1	0.0341
X-squared63	NHW	Only.Menthol	53.8773	1	0.0000
X-squared64	NHW	readiness	15.9639	7	0.0254
X-squared65	Black	Hisp	11.3454	1	0.0008
X-squared66	Black	inc	35.5929	4	0.0000
X-squared67	Black	edu	39.1821	4	0.0000
X-squared73	Black	Only.Menthol	69.7664	1	0.0000
X-squared74	Black	readiness	14.1423	7	0.0487
X-squared82	Hisp	Only.Menthol	6.7797	1	0.0092
X-squared84	inc	edu	95.3405	16	0.0000
X-squared85	inc	ftcd_score	64.1709	40	0.0090
X-squared89	inc	mde_curr	15.2423	4	0.0042
X-squared90	inc	Only.Menthol	36.6583	4	0.0000
X-squared92	edu	ftcd_score	72.4146	40	0.0013
X-squared93	edu	ftcd.5.mins	10.6205	4	0.0312
X-squared97	edu	Only.Menthol	28.6503	4	0.0000
X-squared99	ftcd_score	ftcd.5.mins	129.9010	10	0.0000
X-squared102	ftcd_score	mde_curr	19.7527	10	0.0317
X-squared111	otherdiag	mde_curr	24.5906	1	0.0000
X-squared119	Only.Menthol	readiness	23.3752	7	0.0015

Correlation of Smoking Cessation



```
##
## iter imp variable
## 1 1 inc ftcd_score crv_total_pq1 shaps_score_pq1 NMR Only.Menthol readiness
```

[illegible]

Table 2: Demographics Table of the Smoking Cessation Participants

Demographic Characteristics Variable	BA+Placebo	BA+VA	ST+Placebo	ST+VA
N	68	83	68	81
Mean Ages	50.7	50.3	50.3	48.7
Standard Deviation Ages	13.5	13.2	10.8	12.7
Blacks	37	37	40	43
Hispanics	5	4	4	5
Black Percentage	54.4	44.6	58.8	53.1
Hispanic Percentage	7.4	4.8	5.9	6.2
Education Levels				
1.x	1	0	0	0
2.x	3	7	2	4
3.x	23	15	11	27
4.x	22	32	38	24
5.x	19	29	17	26
Income Levels				
1.y	25	30	26	29
2.y	16	17	14	21
3.y	8	13	14	11
4.y	12	12	8	6
5.y	6	10	6	13
NA	1	1	0	1
Major Depressive Disorder				
0	36	43	37	37
1	32	40	31	44
Cigarette Type				
Menthol Only	40	48	43	47
Sex	106	127	107	125
Non-Hispanic Whites	24	34	22	25
Non-Hispanic White Percentage	35.3	41.0	32.4	30.9
Antidepressant Medication (%)	41.2	28.9	22.1	18.5
Other Lifetime Diagnosis	35	30	28	40
Smoking				
Cigarettes Per Day at Baseline	15.6	15.5	15.0	14.4
Cigarette Reward Value at Baseline	7.4	7.2	7.0	7.1
FTCD at Baseline	5.31	5.07	5.39	5.17
Readiness to Quit	6.8	6.7	7.0	6.7
Time to smoking upon waking up				
Smoking 5 minutes into waking up (%)	47.1	39.8	51.5	46.9
Pleasurable Events at Baseline				
Substitute Reinforcers	23.2	22.9	20.8	23.4
Complimentary Reinforcers	27.7	22.4	27.4	25.0