Long Abstract

A Clinical Investigational Study Intended to Determine the affect of the V.I.B.E. (Vibrational Integration Bio-Photonic Energizer) on ZUNG scores, State –Trait Anxiety Inventory scores and Symptom Index scores.

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PURPOSE OF THE RESEARCH

There seems to be an epidemic of anxiety and depression in our society and both are increasing at an alarming rate. We are interested in any technology that supports the body to heal itself or that relieves the stressors so that the symptoms and cause disappear. For this reason, we chose to investigate the effectiveness of the VIBE machine in changing dimensions of Anxiety, Depression and Symptoms as measured by the STAI (State Trait Anxiety Inventory), ZUNG (SDS/Self-rating Depression Scale) and SYMPTOM INDEX (total symptoms).

BACKGROUND ON THE TECHNOLOGY

The VIBE machine is a device that combines some of the energetic technologies that have been used for many decades. According to the manufacturer, Gene Koonce:

> *"This device contains a Multi-wave Oscillator (MWO), invented by Georges Lakhovsky, which is used to create frequencies in the infra-red and ultra-violet spectrum range. It also uses a Tesla coil to create high voltage and an electromagnetic field. Spectrum tubes containing noble and other gases are charged within this electromagnetic field. This produces biophotonic light. Biophotonic light is the pathway of inner cellular communication. The electromagnetic field is used as a carrier to transmit frequencies in a radius of approximately 6-8 feet around the machine.*
>
> *The VIBE Machine creates an electromagnetic field of .65 gauss...[and] produces a 90º-phase shift between electrical and electromagnetic fields. The base of the VIBE Machine is constructed of materials that block electrical fields but allow electromagnetic fields to flow.*
>
> *The VIBE Machine creates a slight DC charge of -70 to -90 milivolts (-.07 volt). The transmembrane potential of the cells have a DC difference in potential from one side to the other. There must be a difference in potential for cells to function properly. In order for the bioelectric human body to accept the different energy's generated by the VIBE Machine, they must be transmitted in a spiral vortex, which is done by using sacred geometry and holographic technology…*
>
> *"…Using it for only 30 seconds to 4 minutes per day can raise the body's energetic vibration and regenerate the cells that are not vibrating properly. After using the machine for this brief amount of time, the lower vibration cells throughout the body immediately change their course of direction. They now will contain a slight new charge and begin to "reprogram" the lower frequencies in which they were previously stuck. "*

BACKGROUND OF THE MEASURES

The ZUNG: Self-Rating Depression Scale [ZDS] is one of the most widely used adult depression screening instruments and is recognized by clinicians worldwide. The ZDS is used effectively in a variety of mental health areas, including primary care, psychiatric settings, drug trials, and related clinical, institutional and research settings. The ZDS contains twenty questions which individuals self-rate responses. About eighty-two percent of persons with a ZDS score greater than 55 have major depression. Designed to screen depression and mood, it is also an effective outcome measurement tool for tracking a client's progress with therapy over time.

The State-Trait Anxiety Inventory [STAI] is the most frequently used scale in research worldwide. No other measure has received as many foreign language adaptations and citations in the last three decades. The self-report inventory consists of twenty items to assess state anxiety and an additional twenty items to assess trait anxiety.

The Symptom Index is a tool developed by Dr. C. Norman Shealy, MD, PhD, that solicits responses from individuals regarding health symptoms. In addition to health symptoms, the tool queries individuals about environmental stressors, nutritional issues and health habits. The TSI has been utilized in numerous research studies.

OBJECTIVE

To evaluate the affect of sessions using the V.I.B.E. examining changes in dimensions of Anxiety, Depression and Symptoms as measured by the STAI (State Trait Anxiety Inventory), ZUNG (SDS/Self-rating Depression Scale) and SYMPTOM INDEX (total symptoms).

TYPE OF STUDY

This was a randomized controlled trial. The Test group was comprised of subjects who participated in VIBE sessions three times a week for three weeks. Each session was from 2 to 4 minutes in length, accelerated accordingly as the weeks in the study progressed. The control group did not receive VIBE sessions in the time frame of the study but were able to get their sessions after the Test group completed their 3 weeks.

SAMPLE

Subjects had to be 18 years or older and be willing and able to consume at least 24 ounces of water per day. Subjects could not be pregnant or wearing an implanted electrical device such as a pacemaker or insulin pump. All subjects lived in the Springfield, Missouri area.

30 Test Subjects and 26 Controls completed the study.

PROCEDURE

All subjects (Test and Control) pre-tested March 6-8, 2006 which was 1-3 days prior to the first VIBE session for the Test group and post-tested March 30-31, which was 1-3 days after the last VIBE session for the Test subjects. Control Subjects had no VIBE sessions during this three week period. Test Subjects came to our office in Ozark, Missouri three times a week for three weeks: from March 9-29.

STATISTICAL METOHODS**:** ANALYSIS

Paul Thomlinson, PhD did the statistical analysis for this study. The type of analysis used for the first set of analysis was a mixed ANOVA, with one between groups- factor (control v. test group) and one within groups- factor (repeated measures of the dependent variables). The second set of analyses employed the repeated measures t-test.

RESULTS

Analysis 1:

These results demonstrated a decrease in all measures for the Test Group; however, there was also a decrease in all measures for the Controls. This is revealed in the significant main effects for each dependent variable (all *p* values were less than or equal to .01). When comparing these two groups to each other across the pre- and posttests, the results were not statistically significant. This finding is confirmed by the failure of any F-ratio for the interaction of group by dependent variable to reach statistical significance (lowest *p* value was .226). In other words, at first analysis, it could not be said that the decrease in anxiety, depression and symptoms was due to the VIBE since the Controls decreased in all measures, too. An examination of the profile plots, coupled with the significant main effects noted reveals clearly that both groups showed dramatic decreases in each dependent variable.

Analysis 2:

Because it was quite obvious to this investigator that the Test subjects seemed much more energetic, happy and reported results that were very positive and because this researcher noticed the definite changes in the Controls when they came in to do their post testing, we had to consider further analysis of the data. We analyzed the decrease of all measures within each group to see if there was significance. Consistent with the mixed ANOVA results, both groups decreased significantly from pre- to posttest in all measures except State Anxiety, which showed a significant decrease among test participants (*p*=.028), but not among controls (*p*=.226).

Controls:

Symptom Index	p= .001
Zung	p= .005
STAI State	p= .226
STAI Trait	p= .000

Tests:

Symptom Index	p= .000
Zung	p= .007
STAI State	p= .028
STAI Trait	p= .004

DISCUSSION

Our results indicate that the observed changes in both groups are not likely to have happened by chance. There was a decrease in "trait" anxiety, depression and symptoms. TRAIT anxiety is much more difficult to affect than STATE anxiety because state is how the person feels "right now" and trait is how they "generally" feel. Both Controls and Tests had a significant decrease in Trait Anxiety as well as Symptoms and Depression. What this means is that for three of our four measures there is between 1 and 7 chances in 1000 that these results could have happened by chance. Given this, the suggestion is for a phenomenon we call "entrainment" or conditioned space, the suggestion that the space itself, the office had become "entrained" with the energy of the VIBE and therefore, all who entered that space potentially received the benefits of VIBE sessions with or without actually having VIBE sessions. Further investigation and research into the possibility of the VIBE machines ability to entrain or condition a space is needed, and would require a separate, controlled space in which to collect data from the control group. The implications are enormous.

----------First Analysis----------

General Linear Model

Within-Subjects Factors

Measure: MEASURE_1

symptoms	Dependent Variable
1	symptpre
2	symptpost

Between-Subjects Factors

		Value Label	N
Group	.00	Control Group	26
	1.00	Test Group	30

Multivariate Tests(b)

Effect		Value	F	Hypothesis df	Error df	Sig.
Symptoms	Pillai's Trace	.379	32.901(a)	1.000	54.000	.000
	Wilks' Lambda	.621	32.901(a)	1.000	54.000	.000
	Hotelling's Trace	.609	32.901(a)	1.000	54.000	.000
	Roy's Largest Root	.609	32.901(a)	1.000	54.000	.000
symptoms * group	Pillai's Trace	.027	1.499(a)	1.000	54.000	.226
	Wilks' Lambda	.973	1.499(a)	1.000	54.000	.226
	Hotelling's Trace	.028	1.499(a)	1.000	54.000	.226
	Roy's Largest Root	.028	1.499(a)	1.000	54.000	.226

a Exact statistic
b Design: Intercept+group
Within Subjects Design: symptoms

Mauchly's Test of Sphericity(b)

Measure: MEASURE_1

Within Subjects Effect	Mauchly's W	Approx. Chi-Square	df	Sig.	Epsilon(a)		
					Greenhouse-Geisser	Huynh-Feldt	Lower-bound
Symptoms	1.000	.000	0	.	1.000	1.000	1.000

Tests the null hypothesis that the error covariance matrix of the orthonormalized transformed dependent variables is proportional to an identity matrix.
a May be used to adjust the degrees of freedom for the averaged tests of significance. Corrected tests are displayed in the Tests of Within-Subjects Effects table.
b Design: Intercept+group
Within Subjects Design: symptoms

Tests of Within-Subjects Effects

Measure: MEASURE_1

Source		Type III Sum of Squares	df	Mean Square	F	Sig.
Symptoms	Sphericity Assumed	1498.619	1	1498.619	32.901	.000
	Greenhouse-Geisser	1498.619	1.000	1498.619	32.901	.000
	Huynh-Feldt	1498.619	1.000	1498.619	32.901	.000
	Lower-bound	1498.619	1.000	1498.619	32.901	.000
symptoms * group	Sphericity Assumed	68.262	1	68.262	1.499	.226
	Greenhouse-Geisser	68.262	1.000	68.262	1.499	.226
	Huynh-Feldt	68.262	1.000	68.262	1.499	.226
	Lower-bound	68.262	1.000	68.262	1.499	.226
Error(symptoms)	Sphericity Assumed	2459.658	54	45.549		
	Greenhouse-Geisser	2459.658	54.000	45.549		
	Huynh-Feldt	2459.658	54.000	45.549		
	Lower-bound	2459.658	54.000	45.549		

Tests of Within-Subjects Contrasts

Measure: MEASURE_1

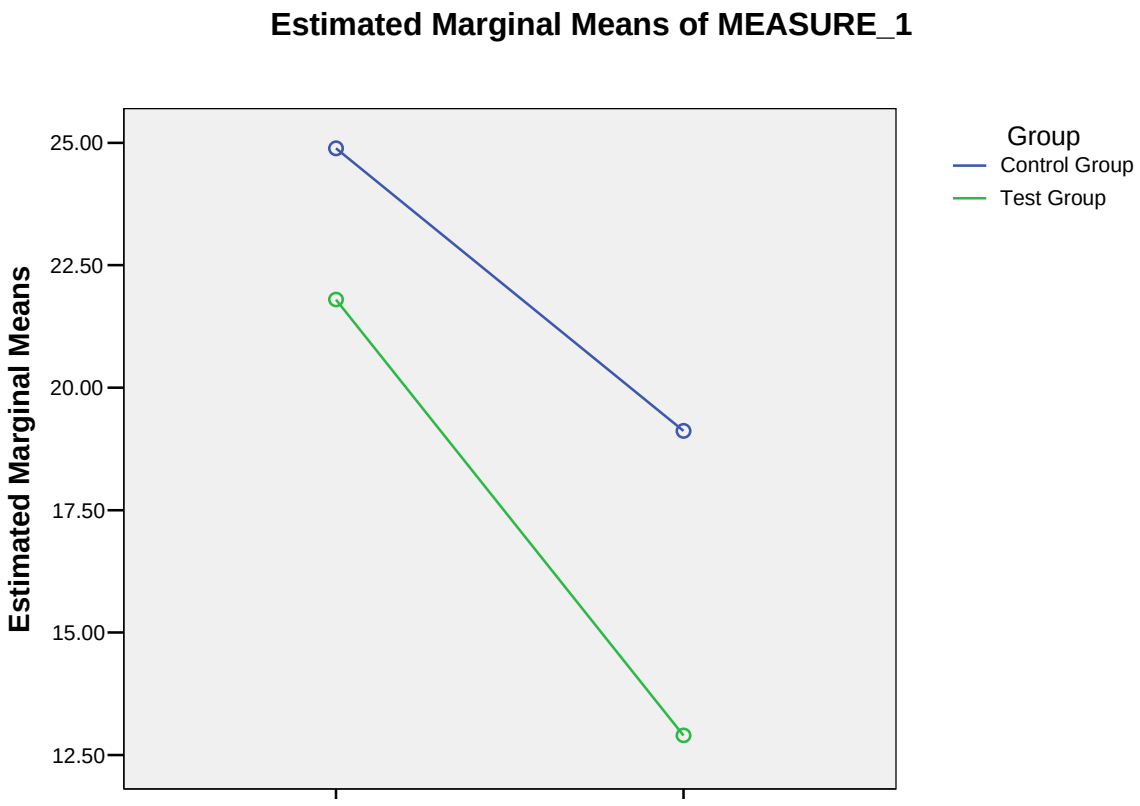
Source	symptoms	Type III Sum of Squares	df	Mean Square	F	Sig.
Symptoms	Linear	1498.619	1	1498.619	32.901	.000
symptoms * group	Linear	68.262	1	68.262	1.499	.226
Error(symptoms)	Linear	2459.658	54	45.549		

Tests of Between-Subjects Effects

Measure: MEASURE_1
Transformed Variable: Average

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Intercept	43134.627	1	43134.627	96.406	.000
group	602.341	1	602.341	1.346	.251
Error	24161.150	54	447.429		

Profile Plots



General Linear Model

Within-Subjects Factors

Measure: MEASURE_1

zung	Dependent Variable
1	zungpre
2	zungpost

Between-Subjects Factors

		Value Label	N
Group	.00	Control Group	26
	1.00	Test Group	30

Multivariate Tests(b)

Effect		Value	F	Hypothesis df	Error df	Sig.
zung	Pillai's Trace	.233	16.432(a)	1.000	54.000	.000
	Wilks' Lambda	.767	16.432(a)	1.000	54.000	.000
	Hotelling's Trace	.304	16.432(a)	1.000	54.000	.000
	Roy's Largest Root	.304	16.432(a)	1.000	54.000	.000
zung * group	Pillai's Trace	.005	.289(a)	1.000	54.000	.593
	Wilks' Lambda	.995	.289(a)	1.000	54.000	.593
	Hotelling's Trace	.005	.289(a)	1.000	54.000	.593
	Roy's Largest Root	.005	.289(a)	1.000	54.000	.593

a Exact statistic
b Design: Intercept+group
Within Subjects Design: zung

Mauchly's Test of Sphericity(b)

Measure: MEASURE_1

Within Subjects Effect	Mauchly's W	Approx. Chi-Square	df	Sig.	Epsilon(a)		
					Greenhouse-Geisser	Huynh-Feldt	Lower-bound
zung	1.000	.000	0	.	1.000	1.000	1.000

Tests the null hypothesis that the error covariance matrix of the orthonormalized transformed dependent variables is proportional to an identity matrix.
a May be used to adjust the degrees of freedom for the averaged tests of significance. Corrected tests are displayed in the Tests of Within-Subjects Effects table.
b Design: Intercept+group
Within Subjects Design: zung

Tests of Within-Subjects Effects

Measure: MEASURE_1

Source		Type III Sum of Squares	df	Mean Square	F	Sig.
zung	Sphericity Assumed	291.924	1	291.924	16.432	.000
	Greenhouse-Geisser	291.924	1.000	291.924	16.432	.000
	Huynh-Feldt	291.924	1.000	291.924	16.432	.000
	Lower-bound	291.924	1.000	291.924	16.432	.000
zung * group	Sphericity Assumed	5.139	1	5.139	.289	.593
	Greenhouse-Geisser	5.139	1.000	5.139	.289	.593
	Huynh-Feldt	5.139	1.000	5.139	.289	.593
	Lower-bound	5.139	1.000	5.139	.289	.593
Error(zung)	Sphericity Assumed	959.353	54	17.766		
	Greenhouse-Geisser	959.353	54.000	17.766		
	Huynh-Feldt	959.353	54.000	17.766		
	Lower-bound	959.353	54.000	17.766		

Tests of Within-Subjects Contrasts

Measure: MEASURE_1

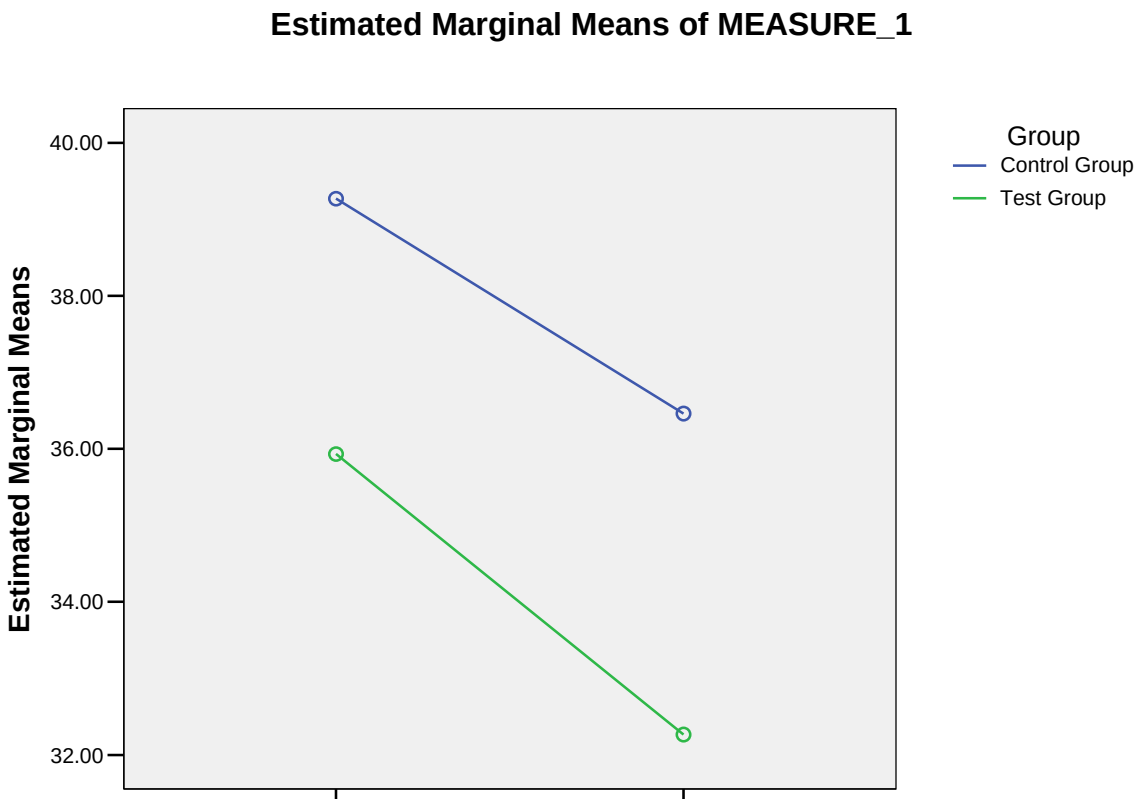
Source	zung	Type III Sum of Squares	df	Mean Square	F	Sig.
zung	Linear	291.924	1	291.924	16.432	.000
zung * group	Linear	5.139	1	5.139	.289	.593
Error(zung)	Linear	959.353	54	17.766		

Tests of Between-Subjects Effects

Measure: MEASURE_1
Transformed Variable: Average

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Intercept	144272.605	1	144272.605	1323.162	.000
group	394.962	1	394.962	3.622	.062
Error	5887.958	54	109.036		

Profile Plots



General Linear Model

Within-Subjects Factors

Measure: MEASURE_1

state	Dependent Variable
1	statepre
2	statepost

Between-Subjects Factors

		Value Label	N
Group	.00	Control Group	26
	1.00	Test Group	30

Multivariate Tests(b)

Effect		Value	F	Hypothesis df	Error df	Sig.
state	Pillai's Trace	.104	6.261(a)	1.000	54.000	.015
	Wilks' Lambda	.896	6.261(a)	1.000	54.000	.015
	Hotelling's Trace	.116	6.261(a)	1.000	54.000	.015
	Roy's Largest Root	.116	6.261(a)	1.000	54.000	.015
state * group	Pillai's Trace	.011	.595(a)	1.000	54.000	.444
	Wilks' Lambda	.989	.595(a)	1.000	54.000	.444
	Hotelling's Trace	.011	.595(a)	1.000	54.000	.444
	Roy's Largest Root	.011	.595(a)	1.000	54.000	.444

a Exact statistic
b Design: Intercept+group
Within Subjects Design: state

Mauchly's Test of Sphericity(b)

Measure: MEASURE_1

					Epsilon(a)		
Within Subjects Effect	Mauchly's W	Approx. Chi-Square	df	Sig.	Greenhouse-Geisser	Huynh-Feldt	Lower-bound
state	1.000	.000	0	.	1.000	1.000	1.000

Tests the null hypothesis that the error covariance matrix of the orthonormalized transformed dependent variables is proportional to an identity matrix.
a May be used to adjust the degrees of freedom for the averaged tests of significance. Corrected tests are displayed in the Tests of Within-Subjects Effects table.
b Design: Intercept+group
Within Subjects Design: state

Tests of Within-Subjects Effects

Measure: MEASURE_1

Source		Type III Sum of Squares	df	Mean Square	F	Sig.
state	Sphericity Assumed	260.450	1	260.450	6.261	.015
	Greenhouse-Geisser	260.450	1.000	260.450	6.261	.015
	Huynh-Feldt	260.450	1.000	260.450	6.261	.015
	Lower-bound	260.450	1.000	260.450	6.261	.015
state * group	Sphericity Assumed	24.736	1	24.736	.595	.444
	Greenhouse-Geisser	24.736	1.000	24.736	.595	.444
	Huynh-Feldt	24.736	1.000	24.736	.595	.444
	Lower-bound	24.736	1.000	24.736	.595	.444
Error(state)	Sphericity Assumed	2246.327	54	41.599		
	Greenhouse-Geisser	2246.327	54.000	41.599		
	Huynh-Feldt	2246.327	54.000	41.599		
	Lower-bound	2246.327	54.000	41.599		

Tests of Within-Subjects Contrasts

Measure: MEASURE_1

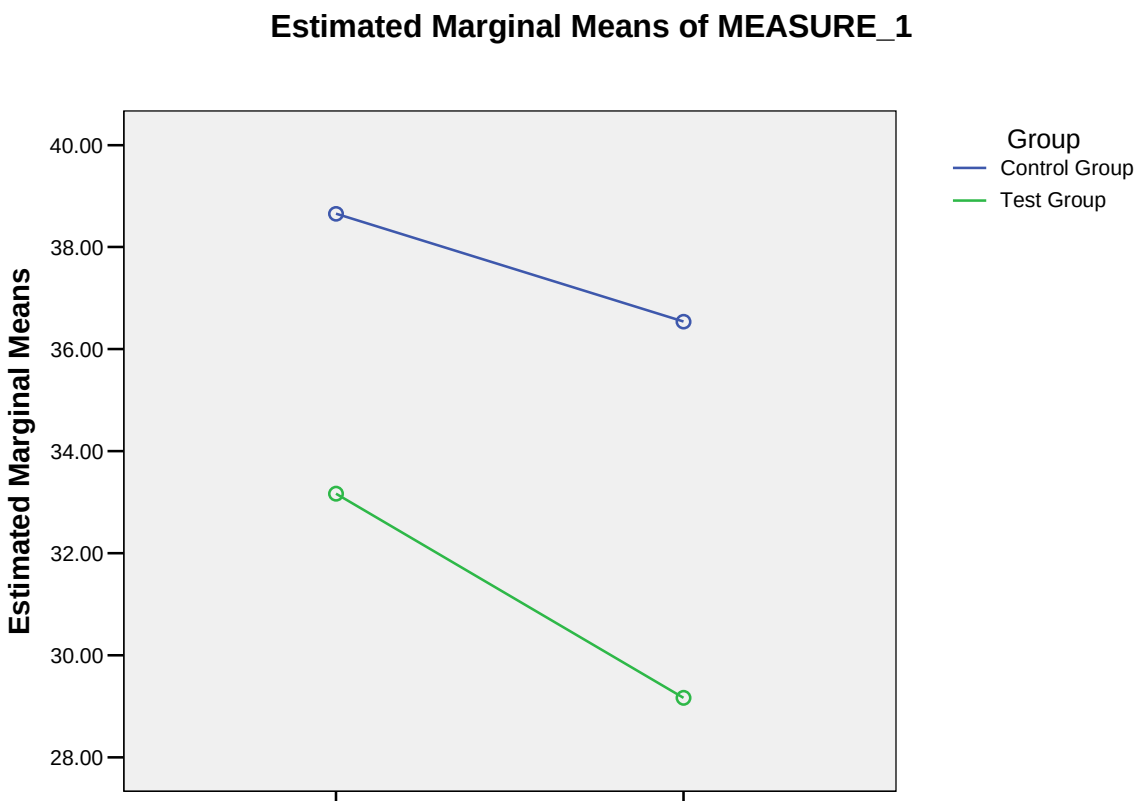
Source	state	Type III Sum of Squares	df	Mean Square	F	Sig.
state	Linear	260.450	1	260.450	6.261	.015
state * group	Linear	24.736	1	24.736	.595	.444
Error(state)	Linear	2246.327	54	41.599		

Tests of Between-Subjects Effects

Measure: MEASURE_1
Transformed Variable: Average

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Intercept	131717.639	1	131717.639	671.753	.000
group	1151.567	1	1151.567	5.873	.019
Error	10588.353	54	196.081		

Profile Plots



General Linear Model

Within-Subjects Factors

Measure: MEASURE_1

trait	Dependent Variable
1	traitpre
2	traitpost

Between-Subjects Factors

		Value Label	N
Group	.00	Control Group	26
	1.00	Test Group	30

Multivariate Tests(b)

Effect		Value	F	Hypothesis df	Error df	Sig.
trait	Pillai's Trace	.358	30.105(a)	1.000	54.000	.000
	Wilks' Lambda	.642	30.105(a)	1.000	54.000	.000
	Hotelling's Trace	.558	30.105(a)	1.000	54.000	.000
	Roy's Largest Root	.558	30.105(a)	1.000	54.000	.000
trait * group	Pillai's Trace	.022	1.232(a)	1.000	54.000	.272
	Wilks' Lambda	.978	1.232(a)	1.000	54.000	.272
	Hotelling's Trace	.023	1.232(a)	1.000	54.000	.272
	Roy's Largest Root	.023	1.232(a)	1.000	54.000	.272

a Exact statistic
b Design: Intercept+group
Within Subjects Design: trait

Mauchly's Test of Sphericity(b)

Measure: MEASURE_1

Within Subjects Effect	Mauchly's W	Approx. Chi-Square	df	Sig.	Epsilon(a) Greenhouse-Geisser	Huynh-Feldt	Lower-bound
trait	1.000	.000	0	.	1.000	1.000	1.000

Tests the null hypothesis that the error covariance matrix of the orthonormalized transformed dependent variables is proportional to an identity matrix.
a May be used to adjust the degrees of freedom for the averaged tests of significance. Corrected tests are displayed in the Tests of Within-Subjects Effects table.
b Design: Intercept+group
Within Subjects Design: trait

Tests of Within-Subjects Effects

Measure: MEASURE_1

Source		Type III Sum of Squares	df	Mean Square	F	Sig.
trait	Sphericity Assumed	467.108	1	467.108	30.105	.000
	Greenhouse-Geisser	467.108	1.000	467.108	30.105	.000
	Huynh-Feldt	467.108	1.000	467.108	30.105	.000
	Lower-bound	467.108	1.000	467.108	30.105	.000
trait * group	Sphericity Assumed	19.108	1	19.108	1.232	.272
	Greenhouse-Geisser	19.108	1.000	19.108	1.232	.272
	Huynh-Feldt	19.108	1.000	19.108	1.232	.272
	Lower-bound	19.108	1.000	19.108	1.232	.272
Error(trait)	Sphericity Assumed	837.856	54	15.516		
	Greenhouse-Geisser	837.856	54.000	15.516		
	Huynh-Feldt	837.856	54.000	15.516		
	Lower-bound	837.856	54.000	15.516		

Tests of Within-Subjects Contrasts

Measure: MEASURE_1

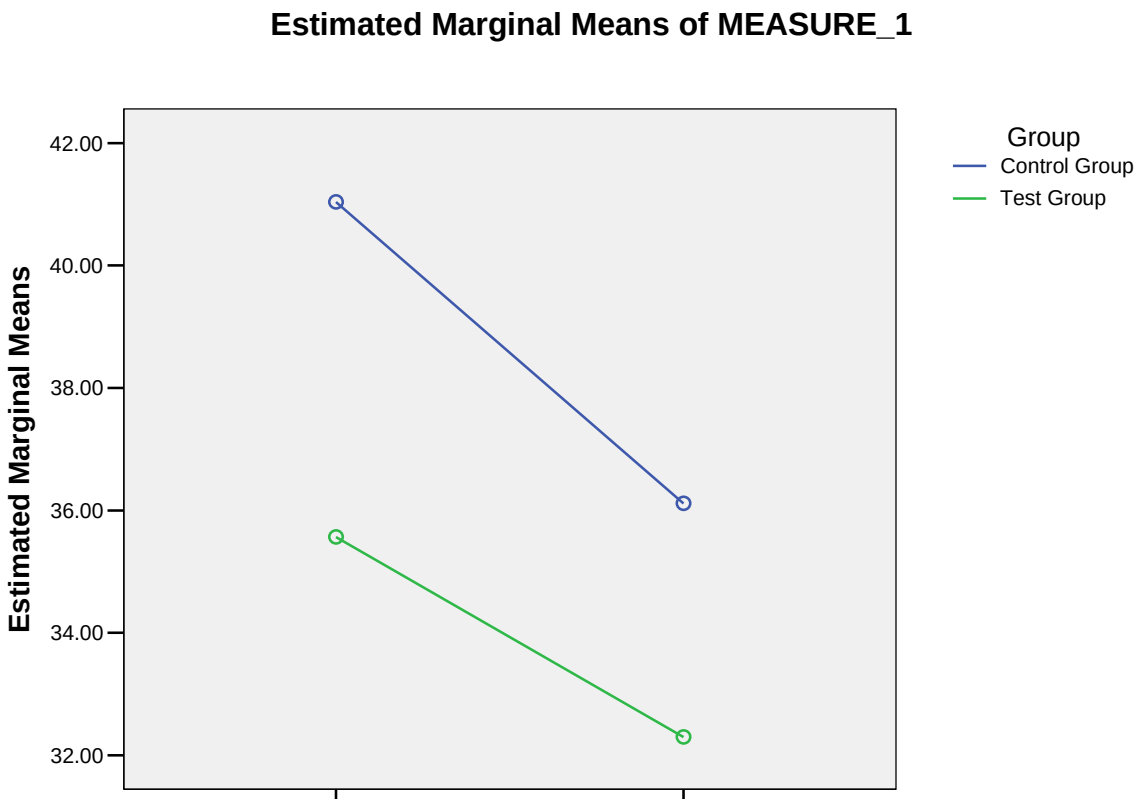
Source	trait	Type III Sum of Squares	df	Mean Square	F	Sig.
trait	Linear	467.108	1	467.108	30.105	.000
trait * group	Linear	19.108	1	19.108	1.232	.272
Error(trait)	Linear	837.856	54	15.516		

Tests of Between-Subjects Effects

Measure: MEASURE_1
Transformed Variable: Average

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Intercept	146465.539	1	146465.539	782.508	.000
group	600.682	1	600.682	3.209	.079
Error	10107.426	54	187.175		

Profile Plots



----------**End First Analysis**----------

----------Begin Second Analysis----------

Below are the analyses. When analyzing each group separately for within group differences, all measures showed significant differences for both control and test groups--except the STAI-State measure, which was not significant from pre to post test for the control group.

T-Test: Control Group

Paired Samples Statistics

		Mean	N	Std. Deviation	Std. Error Mean
Pair 1	Symptom Index Pre	24.8846	26	17.67105	3.46558
	Symptom Index Post	19.1154	26	17.80860	3.49255
Pair 2	Zung Pre	39.2692	26	9.35332	1.83434
	Zung Post	36.4615	26	8.73261	1.71261
Pair 3	STAI State Pre	38.6538	26	13.52314	2.65211
	STAI State Post	36.5385	26	13.68863	2.68456
Pair 4	STAI Trait Pre	41.0385	26	12.88870	2.52768
	STAI Trait Post	36.1154	26	10.91907	2.14141

Paired Samples Test

		Paired Differences					t	df	Sig. (2-tailed)
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference				
					Lower	Upper			
Pair 1	Symptom Index Pre - Symptom Index Post	5.76923	7.65928	1.50211	2.67558	8.86288	3.841	25	.001
Pair 2	Zung Pre - Zung Post	2.80769	4.70760	.92324	.90625	4.70913	3.041	25	.005
Pair 3	STAI State Pre - STAI State Post	2.11538	8.68252	1.70278	-1.39156	5.62233	1.242	25	.226
Pair 4	STAI Trait Pre - STAI Trait Post	4.92308	5.40313	1.05964	2.74070	7.10545	4.646	25	.000

T-Test: Test Group

Paired Samples Statistics

		Mean	N	Std. Deviation	Std. Error Mean
Pair 1	Symptom Index Pre	21.8000	30	16.32303	2.98016
	Symptom Index Post	12.9000	30	10.43651	1.90544
Pair 2	Zung Pre	35.9333	30	7.37626	1.34671
	Zung Post	32.2667	30	6.36766	1.16257
Pair 3	STAI State Pre	33.1667	30	8.96385	1.63657
	STAI State Post	29.1667	30	6.56051	1.19778
Pair 4	STAI Trait Pre	35.5667	30	8.28660	1.51292
	STAI Trait Post	32.3000	30	7.92269	1.44648

Paired Samples Test

		Paired Differences					t	df	Sig. (2-tailed)
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference				
					Lower	Upper			
Pair 1	Symptom Index Pre - Symptom Index Post	8.90000	10.91140	1.99214	4.82562	12.97438	4.468	29	.000
Pair 2	Zung Pre - Zung Post	3.66667	6.85984	1.25243	1.10516	6.22817	2.928	29	.007
Pair 3	STAI State Pre - STAI State Post	4.00000	9.48320	1.73139	.45892	7.54108	2.310	29	.028
Pair 4	STAI Trait Pre - STAI Trait Post	3.26667	5.71105	1.04269	1.13413	5.39921	3.133	29	.004