

THE IMPACT OF iREST® (YOGA NIDRA) ON COLLEGE STUDENTS

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ABSTRACT

The purpose of this study was to investigate the impact of Integrative Restoration (iRest) Yoga Nidra — a 10-stage protocol designed to teach deep relaxation and meditative self-inquiry — on perceived stress, worry, anxiety, depression and mindfulness in the college population. The iRest class was conducted weekly for 1.5 hours per session during an eight-week period. Data were collected throughout seven semesters between Fall 2007 through Spring 2011 and included undergraduate and graduate students. Pre- and post-assessments were administered and qualitative feedback were collected at week 4 and 8. Statistically significant reductions were noted in perceived stress, worry, depression and three out of five factors of mindfulness. State and trait anxiety were not found to be statistically significant. As incentives for participation, students were entered into a drawing to win a \$50 gift card. This research gained Institutional Review Board approval.

DEMOGRAPHICS

Throughout the course of seven semester, 43 participants successfully completed both pre- and post-test assessments.

- Ages ranged from 18 to 56 years of age ($M=24.58$, $SD=9.69$)
- 51.20% were undergraduates.

Previous Experience:

- The level of meditation and yoga experience of the respondents ranged from no experience (37.20% and 27.90%, respectively) to a very high experience (11.60% and 14.00%, respectively).
- 79.10% were female
- 83.70% were European American

OUTCOME MEASURES

- **Perceived Stress Scale (PSS;** Cohen et al., 1983)
10-item, self-report scale measuring the degree to which one's life is stressful
- **Penn State Worry Questionnaire (PSWQ;** Meyer et. al., 1990)
16-item, self-report questionnaire assessing the frequency and intensity of worry
- **Five Factor Mindfulness Questionnaire (FMM;** Baer, 2006)
39-item Likert scale measuring the five factors of mindfulness including: non-reactivity to inner experience, observing, acting with awareness, describing/labeling with words and non-judging of experience
- **Beck Depression Inventory (BDI;** Beck & Steer, 1987)
21 multiple choice items measuring the presence and absence of depression
- **State-Trait Anxiety Inventory (STAI;** Spielberger, 1983)
40-item, self-report inventory assessing the presence of anxiety "in the moment" and in general
- **Instructor-designed Qualitative Evaluation**
Four question assessment: "Describe your experiences in the iRest class thus far," "Things I have noticed about myself since I started practicing iRest," "I want to know more about...", "How often are you practicing iRest outside of class? With or without self-practice CD?"

FURTHER INFORMATION

For additional information, please contact Terry Wilson at WilsonT@health.missouri.edu.
A PDF of this poster can be downloaded at studenthealth.missouri.edu/HP/stressresources

RESULTS

Table 1. Means & Standard Deviations

Measure	Pre		Post	
	M	SD	M	SD
PSS	21.40	5.36	15.35	5.52
PSWQ	51.84	11.34	41.14	9.53
FFM	116.95	14.37	122.30	16.12
Non-reactivity	17.35	4.90	23.33	4.30
Acting with awareness	24.40	6.02	22.19	5.83
Observing	25.21	6.72	29.93	5.27
Describing/labeling w/ words	25.07	4.45	26.00	4.41
Non-judging of experience	24.93	7.35	20.86	8.67
BDI	14.56	8.84	5.65	7.30
State (STAI)	43.88	9.48	45.67	7.42
Trait (STAI)	46.40	6.40	45.33	6.25

Table 2. Repeated measures analysis

Measure	df	t	p
PSS	42	6.81	<0.00"
PSWQ	42	5.59	<0.00"
FFM	42	1.74	<0.09
Non-reactivity	42	9.01	<0.00"
Acting with awareness	42	2.07	<0.04'
Observing	42	6.48	<0.01"
Describing/labeling w/ words	42	1.33	<0.19
Non-judging of experience	42	2.88	<0.01"
BDI	42	8.48	<0.00"
State (STAI)	42	1.12	<0.27
Trait (STAI)	42	0.95	<0.35

* $p < .05$; ** $p < .01$

A t-test was performed to examine multiple comparisons of participant test scores on the PSS, PSWQ, FFM (as a whole and by subscale), BDI, and the STAI. Results showed statistical significance on the PSS score, $t(1,42) = 6.81$, $p < .00$, PSWQ score, $t(1, 42) = 5.59$, $p < .00$, "Observing" subscale score, $t(1,42) = 6.48$, $p < .01$, the BDI score, $t(1, 42) = 8.48$, $p < .00$, "acting with awareness" subscale score, $t(1,42) = 2.07$, $p < .04$, and "non-judging" subscale score, $t(1, 42) = 2.88$, $p < .01$.

Furthermore, the "non-reactivity" subscale score was significant, $t(1,42) = 9.01$, $p < .00$ with "describing with words" and the total mindfulness scale being non-significant. Therefore following the iRest intervention, results showed statistically significant reductions in perceived stress, worry, and depression. Conversely, when investigating all five factors on the FFM, results showed significant improvements in the "observe," "acting with awareness," "nonjudging," and "nonreacting" subfactors. There was a reduction in trait anxiety but was not found to be statistically significant.

QUALITATIVE DATA

The following were taken from the four- and eight-week qualitative assessment after being exposed to iRest:

- "I can get relaxed very quickly"
- "When I practice I notice differences in my overall calmness and ability to put stresses/problems in perspective mentally."
- "Much better at warding off anxiety before it consumes me."
- "I am sleeping better, generally more aware of bodily sensations, overall calmer."
- "My body awareness has increased. My ability to not become consumed with life and emotions is much greater."
- "Once you begin to accept something as it is, you can begin to heal."
- "The most significant thing I learned was unconditional acceptance of my personal feelings."
- "I realized I give a lot of 'things/people' power over how I feel, but actually I am in control."



CONCLUSIONS & IMPLICATIONS

Results of this study suggest the iRest practice is an effective intervention for college students seeking coping strategies for stress or as adjunctive to traditional treatment modalities for mental health. Primary care, mental health and health promotion professionals may find iRest practice as a cost effective strategy to decrease stress, worry and depression in the college population. Future research should be conducted in specific sub-populations such as international or minority students, veterans or students who have experienced trauma or have chemical dependence. Studying the effects of iRest practice in a four- versus eight-week protocol may also be considered for future investigation.

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