

Effect of Lotus Posture on Acupuncture Meridian Energies: A Controlled Trial

Abstract

Background: Many studies have assessed Yoga practices using instruments such as AcuGraph, which measures conductances at Jing-Well points of acupuncture meridians. Such studies find that participation in Yoga programs ranging from a weekend to many months systematically increases subtle energy. Here, we report comparison of Jing-Well point conductances before and after sitting in Lotus Posture with those before and after sitting in a chair. **Methods:** This was a controlled study conducted on 52 male Yoga practitioners (mean age in years 23.03 ± 3.23), all with >1 year experience of Yoga practices. Participants were alternately assigned into two groups, sitting in Lotus Posture and sitting in a chair. Each was measured on 3 successive days, before and after sitting as instructed for 10 min on the 1st day, 20 min on the 2nd day, and 30 min on the 3rd day. **Results:** The two groups yielded completely different results: those sitting in Lotus Posture for 30 min showed increases in subtle energy levels (E_Ls) in all acupuncture meridians; those sitting in chair produced universal decreases. Results for 10 and 20 min showed how these changes in energy values took time to build up with increasing time. **Conclusions:** Sitting in Lotus Posture is held to strongly stimulate subtle E_Ls, so results agreed with the experimental hypothesis. Nevertheless, decreases in E_Ls of those sitting in a chair were surprising since the rest might be expected to have no effect.

Key Words: *AcuGraph, acupuncture meridian energies, Asanas, lotus position, Yoga*

Introduction

Traditional knowledge systems in India and China make consistent distinction between “gross” and “subtle” energies. The Vedic system of ancient India denotes “male” and “female” subtle energies as prana and shakti, respectively,^[1,2] while the Chinese system term them Yang Qi and Yin Qi.^[3] In the Vedic system, Yoga practices such as physical postures, breathing techniques, and meditation restore well-being by improving autonomic function,^[4] improving ability to focus,^[5] improving memory, reducing anxiety,^[6] and reducing stress.^[7,8] Yoga enhances human well-being by improving and regulating practitioners’ levels of vital energy.^[9]

Yoga postulates that vital energy (prana) flows through channels called nadis^[10] forming the human vital energy system. Similarly, Traditional Chinese Medicine (TCM) says that blockages in energy flow cause physical, mental, or emotional disturbances and disease.^[11] Restoring personal well-being is achieved by improving prana through Yoga

postures (Asanas), breathing techniques (Pranayama), and meditation (Dhyana).^[12]

In TCM, the concept parallel to prana is known as Qi^[1,2] and is said to flow along “meridians.” Each meridian is connected to many points on the surface of the skin called acupuncture points which reflect aspects of meridian function.^[13] TCM uses 12 pairs of meridians (left and right), six in each limb with bilateral symmetry.

TCM and Yoga represent two different methods that claim to improve level and balance of Qi/prana in order to restore or improve individual health. In TCM, acupuncture, acupressure, and qigong are major methods for removing blockages and allowing free movement of Qi.^[3,14,15] Acupressure is a technique where physical pressure at acupoints stimulates meridian activity.^[16] In Yoga, a science with eight limbs (angas), Asana is the limb using particular positions of the body combined with recommended attitude of the mind, which exerts a profound influence on an individual’s physiological and health parameters.^[17,18] Asanas promote

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1 revitalization of specific muscle groups and activate prana,
2 increasing pranic energy and efficiency of its use.^[19]

3 In terms of TCM, the various joint and spine movements
4 involved in Yoga Asanas are recognized to stimulate
5 meridians.^[20] The text AcuYoga^[21] gives detailed
6 descriptions of effects of various Asanas on each
7 meridian. Regular practice of Yoga Asanas balance
8 meridian energies.^[20] Many studies have been performed
9 on Yoga practitioners' subtle energy levels (E_Ls) using
10 instruments such as Electro Photonic Imaging^[22,23] or
11 the electro-acupuncture instrument AcuGraph,^[9,24] which
12 measures conductances at Jing-Well points of acupuncture
13 meridians. Such studies have established that participation
14 in integrated Yoga programs of various lengths ranging
15 from a weekend to many months systematically increases
16 acupuncture meridian energies.

17 Previous studies have used AcuGraph to measure effects
18 of Yoga programs. A first assessment^[24] concluded that
19 AcuGraph is better suited to make measurements on groups
20 of study participants rather than individuals; changes in
21 group means are more accurate indicators of the outcome
22 of a Yoga program than changes in values for individual
23 participants. A second study concluded that regular practice
24 of Yoga programs for 21 days systematically decreases
25 group standard deviations, indicating improved quality of
26 regulation of acupuncture meridian energies.^[25] This idea
27 was confirmed by a second improved study comparing
28 results for different genders.^[9] A study on children with
29 HIV noted that the sick exhibit poorer regulation of
30 acupuncture point energies than normal children.^[26] A
31 study of similar subjects by four operators concluded that
32 values of AcuGraph measurements depend on the style
33 of use of the probe by individual operators; when this is
34 accounted for, overall patterns of acumeridian energies
35 remain the same.^[27] A study of a 5-day Yoga program for
36 business executives concluded that overwork systematically
37 lowered their meridian energies and was probably injurious
38 to health, and the 5-day integrated Yoga therapy program
39 restored only half the deficit.^[28] A study of those attending
40 Vedic ceremonies found that attendees were energized
41 preferentially in lower meridians,^[29] a valuable observation
42 since most patients are deficient in lower meridian energies,
43 which are otherwise difficult to remedy.^[27]

44 While AcuGraph studies of groups attending health
45 improvement courses,^[9,25] either simply being characterized
46 through acumeasurements,^[26,27] or undergoing Yoga
47 treatments,^[28,29] are of interest, the logical next step is a
48 study of a single Yoga posture. Would significant changes
49 be seen pre- and post-performance of a single Asana
50 for various periods of time? For reasons given above,
51 Padmasana or the Lotus Posture was a natural choice;
52 particularly as an authoritative text, Hatha Yoga^[30] identifies
53 that it stimulates subtle energies in the body to the greatest
54 extent.
55
56

Methods

Subjects

1 Fifty-two male Yoga practitioners were selected for the
2 study (mean age in years 23.03 ± 3.23). All had >1 year
3 residential experience of regular Yoga practice, having
4 previously obtained their Yoga Instructor's Certificate. Out
5 of 52, two practitioners dropped from the study due to
6 sickness and personal commitment.
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Inclusion criteria

10 Yoga practitioners with >1 year residence at the Yoga
11 University were included in the study.
12
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Exclusion criteria

15 Persons with physical disability, mental disturbance, or
16 inability to sit in the Lotus Posture were excluded in the
17 study.
18
19

20 Study procedure was explained and consent was obtained
21 from all the participants. The study was approved by the
22 university's Ethics Committee.
23

Design

24 This was a controlled study with practitioners reporting
25 on the 1st day being alternately assigned to two different
26 groups: One sitting in Lotus Posture and the other sitting
27 in a chair. Consort flow diagram is displayed in Figure 1.
28

Assessments

29 The first author made measurements using the AcuGraph 4
30 model from Miridia Acupuncture Technologies in
31 Meridian, Idaho, USA. He assessed each subject between
32 06:00 and 07:30 am on 3 successive days at the Jing-Well
33 acupuncture points on the fingers and toes, related to main
34 organs: Lung (LU), pericardium (PC), heart (HT), small
35 intestine (SI), triple energizer (TE), large intestine (LI),
36 spleen (SP), liver (LR), kidney (KI), bladder (BL),
37 gallbladder (GB), and stomach (ST). Instrument probe
38 pressure, location, and position were kept uniform^[27] using
39 a single operator.
40
41

42 Some practitioners find Lotus Posture uncomfortable;
43 hence, the degree of pain experienced by those sitting in
44 the Lotus Posture was assessed on a visual analog pain
45 scale of 1–10 after each session.^[31] However, this was not
46 considered experimental data, only a precaution to ensure
47 participants' well-being as time of sitting was increased
48 day by day.
49

50 Measurement procedure for AcuGraph 4: Participants
51 stood comfortably with feet on a mat. After damp cotton
52 wool had been applied to regions of Jing-Well points on
53 the fingers and toes to balance conductivity, the participant
54 held the "ground bar" in hand opposite to where the
55 AcuGraph probe was applied. The monitoring computer
56 records readings at specified points in a standard sequence.

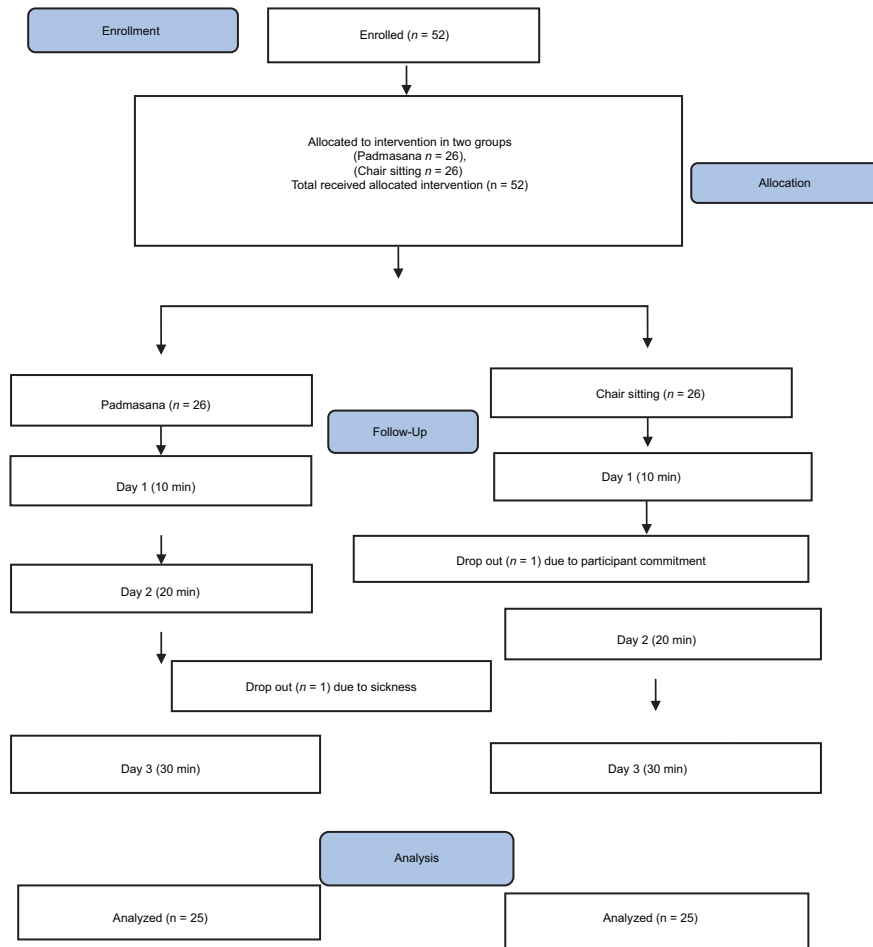


Figure 1: Consort flow diagram

Interventions

The first group sat in Lotus Posture on a Yoga mat for periods of 10, 20, and 30 min on consecutive days, while the second group sat for the same periods of time on a chair, with their feet resting on a similar mat. Lotus Posture requires the practitioner to sit cross-legged and then place each foot on top of the other thigh with soles of the feet facing upward, one shin crossing the other. Youth who have been brought up without tables and chairs and used to squat or sit cross-legged on the floor find it easy to perform.

Statistical analysis

Analysis was performed using Excel, GraphPad QuickCalcs, and SPSS-19. Raw data from participants in the same group for each day comprising 24 readings were recorded. Further, ten AcuGraph analyzed data – such as overall E_L and upper-lower (U_L) imbalance – were entered into Excel sheets for each group and period, six sheets in all. Pre-post difference data were then prepared for meridian data on each sheet. Mean and standard deviation for each group were calculated for pre, post, and pre-post differences. Appropriate blocks of data were

then exported to SPSS for repeated measures analysis of variance used for between and within group comparisons. Further calculations were of variances for total data blocks of 24 meridians (12 left and 12 right) for each group for each day. Means were compared to average E_L for each data block as a cross check (they have to be equal). Variances were also calculated for U_L meridian blocks. The advantage of these last calculations is that the increase in degrees of freedom for a block of data greatly increases the significance to given values of Fishers F statistic for comparison of variances. Finally, significances of differences between pre-post changes observed in the two groups for each time value, 10, 20, and 30 min, were calculated using SPSS-19, and some were checked on GraphPad using paired t -test.

Results

Results are set out in Tables 1a-c, 2 and Figure 2. Table 1a-c displays means and standard deviations for conductances at each of the 24 acupuncture meridian Jing-Well points (12 left and 12 right), giving statistical significance of changes observed in each meridian. Although the changes

Table 1a: Acupuncture meridian energies pre- and post-sitting in lotus posture and in a chair (10 min)

Variable	Padmasana			Chair sitting		
	Pre	Post	P	Pre	Post	P
LU_L_10	57.52±26.88	55.76±23.51	0.54	60.80±27.01	54.56±29.61	0.03
LU_R_10	53.60±25.03	57.6±30.26	0.27	58.40±27.71	52.08±28.95	0.09
PC_L_10	50.08±26.89	46.80±23.13	0.29	46.08±20.49	41.76±20.85	0.17
PC_R_10	48.72±23.34	47.04±22.20	0.57	48.24±19.57	39.44±16.29	0.01
HT_L_10	48.80±22.05	45.84±25.23	0.30	48.72±22.14	40.08±18.23	0.003
HT_R_10	50.96±21.02	45.92±22.98	0.08	47.92±20.96	39.28±19.66	0.004
SI_L_10	49.76±27.86	51.12±27.97	0.67	52.32±24.53	44.08±23.42	0.01
SI_R_10	52.00±27.04	47.36±23.26	0.11	54.16±26.70	45.04±23.23	0.003
TE_L_10	48.80±23.78	49.04±26.11	0.94	48.00±22.55	41.12±21.75	0.04
TE_R_10	47.20±23.40	43.36±22.40	0.17	48.64±23.03	40.16±20.30	0.003
LI_L_10	58.56±23.25	61.60±24.81	0.29	59.20±23.25	52.88±25.36	0.03
LI_R_10	55.44±24.15	54.16±24.10	0.64	53.60±22.85	47.12±22.66	0.02
SP_L_10	63.76±31.12	66.00±32.18	0.40	58.72±27.79	52.96±26.22	0.04
SP_R_10	66.24±37.98	67.36±34.08	0.73	59.76±30.46	52.48±26.45	0.03
LR_L_10	68.08±37.04	71.04±36.61	0.39	63.76±33.80	54.72±33.31	0.01
LR_R_10	66.64±38.80	66.88±33.50	0.94	63.60±36.12	57.92±30.91	0.07
KI_L_10	50.08±28.22	52.56±26.64	0.42	55.84±29.99	45.52±26.57	0.001
KI_R_10	52.56±36.22	52.48±31.24	0.98	55.52±28.46	45.84±24.64	0.0004
BL_L_10	63.68±34.01	62.00±30.62	0.58	66.24±31.90	57.92±29.79	0.00
BL_R_10	66.48±38.74	63.12±36.11	0.20	68.32±33.49	60.88±28.79	0.01
GB_L_10	63.92±34.63	62.88±33.20	0.73	66.88±29.40	60.24±30.38	0.29
GB_R_10	65.84±39.03	62.32±31.07	0.25	65.52±30.57	59.92±27.96	0.07
ST_L_10	71.44±33.10	70.96±33.77	0.88	65.60±26.88	57.92±28.45	0.02
ST_R_10	70.32±40.12	69.12±37.72	0.71	62.24±28.85	56.00±28.52	0.06

Means±SDs for Jing-Well acupuncture meridian point conductances pre- and post-sitting in Padmasana or in a chair for 10 min. SDs=Standard deviations; LU=Lung; PC=Pericardium; HT=Heart; SI=Small intestine; TE=Triple energizer; LI=Large intestine; SP=Spleen; LR=Liver; KI=Kidney; BL=Bladder; GB=Gallbladder; ST=Stomach; R=Right; L=Left

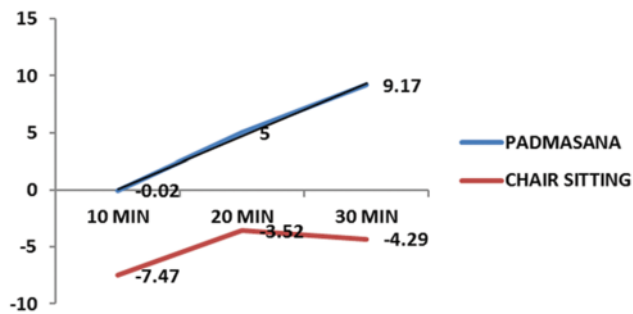


Figure 2: Influence of Padmasana and chair sitting on meridian readings at 3 time points. The values are overall meridians' mean differences (post-pre at each time point) at 10, 20, and 30 min session

in individual means from pre to post show individual meridians with significant changes, changes in overall mean for all meridians together for each of the six experimental conditions (2 groups × 3 time values) are consistent and of most interest. For sitting in a chair, overall means changed from 57.46 ± 27.78 to 49.99 ± 26.37 for 10 min, from 57.31 ± 27.51 to 53.79 ± 25.75 for 20 min, and from 52.54 ± 25.36 to 48.25 ± 25.05 for 30 min; while for Padmasana, means changed from 57.92 ± 31.25 to 57.09 ± 30.29 for 10 min, from 51.19 ± 28.44 to

56.37 ± 29.57 for 20 min, and from 48.51 ± 30.88 to 57.68 ± 31.42 for 30 min, a completely different pattern of change with increasing time. One sample *t*-tests with test value zero were performed on post-pre data columns prepared in Excel (equivalent to more laborious paired sample *t*-tests). Changes in overall mean and accompanying standard deviation for the changes in mean: For sitting in a chair, overall mean changed by -7.47 ± 14.83 for 10 min, 3.52 ± 16.71 for 20 min, and 4.29 ± 15.84 for 30 min; for Padmasana, overall mean changed by -0.83 ± 14.81 for 10 min, 5.18 ± 16.38 for 20 min, and 9.17 ± 17.45 for 30 min. All values were significant with $P < 0.0001$, except sitting in Padmasana for 10 min (which was not significant).

Between-group comparison: For 10 min sitting in Padmasana and sitting in Chair upper meridians LU_R, SI_R, LI_L and lower meridians SP_L, LR_L, KI_L, and KI_R showed significant difference. For 20 min sitting in Padmasana and Chair, upper meridian LU_R, and all lower meridians except KI_L, BL_R found significant difference. For 30 min sitting in Padmasana and Chair, upper meridian LU_R and all lower meridians showed significant difference.

Table 1b: Acupuncture meridian energies pre- and post-sitting in lotus posture and in a chair (20 min)

Variable	Padmasana			Chair sitting		
	Pre	Post	P	Pre	Post	P
LU_L_20	47.2±30.33	55.28±26.76	0.64	57.44±26.40	56.4±27.87	0.81
LU_R_20	43.84±27.56	54.72±25.55	0.007	56.32±25.79	57.52±28.51	0.70
PC_L_20	42.72±24.19	43.92±22.70	0.67	48.00±20.41	42.24±16.91	0.05
PC_R_20	41.52±21.41	43.52±21.18	0.53	48.16±19.80	45.92±21.77	0.48
HT_L_20	40.00±21.69	43.44±23.33	0.41	47.84±19.54	46.40±20.55	0.73
HT_R_20	38.80±18.62	43.04±19.04	0.18	47.36±19.86	48.56±22.87	0.70
SI_L_20	43.52±26.59	47.76±25.94	0.23	51.04±22.47	46.32±19.92	0.18
SI_R_20	41.60±22.26	50.08±25.80	0.03	50.24±24.29	49.28±21.71	0.80
TE_L_20	41.44±22.60	44.08±21.93	0.40	45.84±22.60	45.92±21.70	0.98
TE_R_20	40.40±21.90	41.84±20.49	0.64	47.92±22.51	50.64±26.23	0.38
LI_L_20	51.76±28.03	56.24±25.05	0.20	58.96±24.51	58.88±20.34	0.98
LI_R_20	47.36±24.49	50.40±24.20	0.29	50.80±20.67	53.92±24.29	0.28
SP_L_20	59.36±31.41	66.24±33.49	0.02	56.16±29.61	53.52±27.08	0.38
SP_R_20	61.52±31.52	70.56±38.34	0.01	60.56±29.43	51.52±26.91	0.01
LR_L_20	61.68±28.53	70.40±30.04	0.01	60.64±31.86	58.00±31.98	0.40
LR_R_20	58.96±26.68	67.12±32.38	0.03	60.24±29.75	56.08±23.49	0.26
KI_L_20	50.16±26.06	55.28±24.84	0.19	58.40±31.78	54.80±29.15	0.35
KI_R_20	44.96±24.97	51.76±28.17	0.06	55.36±30.27	47.60±22.92	0.03
BL_L_20	61.52±28.46	64.24±28.35	0.32	67.68±31.74	60.08±27.96	0.01
BL_R_20	58.32±29.40	62.56±35.85	0.23	67.28±32.80	63.20±27.81	0.25
GB_L_20	61.04±32.54	66.80±32.98	0.06	69.44±29.44	63.12±29.56	0.04
GB_R_20	60.00±31.14	63.84±32.11	0.22	67.28±29.56	61.36±29.23	0.06
ST_L_20	67.68±35.24	70.16±33.82	0.47	71.92±30.07	61.60±29.74	0.004
ST_R_20	63.76±33.76	69.68±35.70	0.04	65.84±28.60	57.76±25.90	0.01

Means±SDs for Jing-Well acupuncture meridian point conductances pre- and post-sitting in Padmasana or in a chair for 20 min. SDs=Standard deviations; LU=Lung; PC=Pericardium; HT=Heart; SI=Small intestine; TE=Triple energizer; LI=Large intestine; SP=Spleen; LR=Liver; KI=Kidney; BL=Bladder; GB=Gallbladder; ST=Stomach; R=Right; L=Left

In upper meridians: LU_L and LU_R, HT_R, and SI_R and in lower meridians: Except SP_L and SP_R and KI_L were found to be differing significantly across the 3 time points, across the sitting in Padmasana and sitting in Chair. Figure 2 displays the result of influence of Padmasana and Chair sitting on meridian readings at 3 time points.

Table 2 summarizes the number of increases and decreases in these mean values in the form of contingency tables for each group of measurements, pre and post 10 min, pre and post 20 min, and pre and post 30 min. It is striking that the 20 and 30 min contingency tables are very highly significant with $P < 0.0001$.

Discussion

Results clearly indicate that the two kinds of sitting positions, in a chair on the one hand and Lotus Posture on the other hand, have completely different effects on the human physiology. They also support the experiential observation that sitting in the Yoga Asana, Lotus Posture, has an energizing effect on the human physiology at a subtle level of the meridians.

In this light, it is significant that the increase in E_Ls took time to increase enough to be clearly observed. That more Jing-Well point conductances decreased for

the Lotus-Posture group after 10 min, and all for the Chair-sitting group, suggests that just sitting and resting do not in itself immediately increase levels of subtle energy. The summary in Table 2 shows that while this decreasing trend continued for the group of controls sitting in a chair, it decisively reversed for the group in Lotus Posture, which showed postmeasurements on all meridians greater than or equal to premeasurements, for the 20 and 30 min time periods. The experimental group showed completely different trends in values of subtle energies from controls for these 2 time periods, in accordance with statements in the ancient literature about the value of Lotus Posture,^[30] which adds that sitting in Lotus Posture is most suitable for meditation because it tends to increase subtle E_Ls more strongly than any other asana position,^[30] the only disadvantage being that some may find it painful as reported by three subjects.

The results clearly support our experimental hypothesis that Padmasana increases subtle E_L but suggest that the increase takes time to build-up. One would however expect that resting in a chair would also restore depletion of subtle E_Ls caused by activity such as walking. It was therefore unexpected to observe that E_Ls of the second group showed a tendency to decrease after sitting in a chair, and equally interesting to observe that the E_Ls in the Lotus

Table 1c: Acupuncture meridian energies pre- and post-sitting in lotus posture and in a chair (30 min)

Variable	Padmasana			Chair sitting		
	Pre	Post	P	Pre	Post	P
LU_L_30	42.24±27.03	60.00±26.10	0.00001	53.44±24.85	54.96±26.18	0.67
LU_R_30	38.88±23.54	58.56±26.87	0.000001	48.56±25.41	53.60±25.44	0.15
PC_L_30	42.48±21.86	42.48±19.54	1.00	44.32±18.57	40.08±19.53	0.12
PC_R_30	39.60±21.94	45.12±19.91	0.01	44.88±17.32	38.80±12.70	0.01
HT_L_30	39.76±22.00	43.28±22.52	0.32	45.04±17.57	41.52±17.29	0.32
HT_R_30	38.08±20.54	43.44±18.78	0.06	43.84±17.25	39.12±13.82	0.09
SI_L_30	37.12±24.13	47.68±22.03	0.001	45.04±20.79	46.08±24.93	0.74
SI_R_30	41.68±24.72	46.96±21.60	0.08	45.68±21.82	43.28±20.54	0.42
TE_L_30	40.32±26.16	43.92±18.06	0.27	45.84±20.86	41.36±23.56	0.17
TE_R_30	36.24±24.53	41.92±18.94	0.08	45.04±19.71	40.00±15.85	0.12
LI_L_30	46.64±24.06	54.16±20.53	0.03	56.16±22.02	51.04±23.35	0.14
LI_R_30	45.12±25.39	51.20±20.32	0.04	48.72±19.73	46.00±17.51	0.35
SP_L_30	53.44±31.01	65.36±31.83	0.001	50.96±25.57	45.68±26.95	0.14
SP_R_30	55.92±33.69	67.60±37.92	0.001	52.88±24.24	49.28±26.00	0.28
LR_L_30	58.80±32.62	75.92±39.31	0.0001	57.04±30.62	49.76±32.14	0.78
LR_R_30	57.20±31.43	72.96±36.26	0.00002	55.12±27.36	50.24±26.40	0.14
KI_L_30	49.92±36.06	55.68±34.55	0.14	51.36±30.99	44.16±22.66	0.07
KI_R_30	45.60±33.11	57.12±34.38	0.00004	46.24±21.49	43.84±22.03	0.35
BL_L_30	57.84±35.72	66.16±30.76	0.01	64.00±33.97	53.44±29.66	0.002
BL_R_30	58.56±35.50	65.12±40.60	0.05	66.16±34.83	56.24±31.06	0.004
GB_L_30	61.28±40.64	70.16±40.19	0.03	65.92±26.74	57.12±30.17	0.03
GB_R_30	57.20±37.55	67.12±36.13	0.01	62.00±28.57	60.96±30.13	0.76
ST_L_30	60.80±38.81	72.00±37.82	0.01	61.76±25.43	55.68±28.85	0.12
ST_R_30	60.00±36.99	70.40±37.43	0.003	60.00±27.06	60.00±32.66	1.00

Means±SDs for Jing-Well acupuncture meridian point conductances pre- and post-sitting in Padmasana or in a chair for 30 min. SDs=Standard deviations; LU=Lung; PC=Pericardium; HT=Heart; SI=Small intestine; TE=Triple energizer; LI=Large intestine; SP=Spleen; LR=Liver; KI=Kidney; BL=Bladder; GB=Gallbladder; ST=Stomach; R=Right; L=Left

Table 2: Contingency tables for increase/decrease in meridian energies

	10 min		20 min		30 min	
	Increase	Decrease	Increase	Decrease	Increase	Decrease
Padmasana	8	16	24	0	23	0
Chair sitting	0	24	6	18	3	20
P	0.0039		0.0001		0.0001	

The three contingency tables for acupuncture meridian energy increases/decreases after sitting in Padmasana or a chair for 10, 20, or 30 min. For 30 min, one meridian in each group was entirely unchanged and has not been included

Posture group showed a similar tendency over the first 10 min, and took 20 min to reverse the decreasing trend. It follows that E_Ls are not instantly changed by sitting in Lotus Posture but that they build up steadily once the posture has been adopted.

Strength of the study

This was a first study to document energy changes through practicing a single Asana using AcuGraph. It obtained definite results with good statistical significance and high power. In the contingency tables, the presence of zeros meant that odds ratio effect sizes could not be calculated. The ability of Lotus Posture to increase acupuncture meridian energies is well documented by this study.

Limitations of the study

The study was not formally randomized. In addition, the important result that just sitting in a chair tends to decrease acumeridian energies was not hypothesized but was a *post hoc* discovery from analysis of the data. However, this result seems to be quite robust.

Future possibilities

It would be interesting to obtain effects on acupuncture meridian energies of sitting in other single asanas, such as Vajrasana, Diamond Posture, a simple kneeling position, and others that can similarly be held for long periods of time, for example, the much recommended, Siddhasana, the “perfect posture.”

Conclusion

Sitting in different positions affects the subtle energies of the body in different ways. Sitting in a chair tends to decrease the subtle energies while sitting in Padmasana or Lotus Posture has a universal energizing effect on the body's subtle energies, but only after a period of about 20 min.

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Conflicts of interest

There are no conflicts of interest.

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