# A brief qualitative survey on the utilization of Yoga research resources by Yoga teachers

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# ABSTRACT

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**Received:** January 02, 2016 **Accepted:** March 20, 2016 **Published:** April 01, 2016 Introduction: Yoga has become popular worldwide with increasing research done on its therapeutic potential. However, it remains to be determined whether such findings actually percolate down into teaching and practice of Yoga teachers/therapists. Materials and Methods: The aim of this survey was to document awareness of Yoga research findings in the Yoga community and find out how these were utilized. It was undertaken with a select group of 34 international Yoga teachers and therapists utilizing email and social media between August and December 2015. Majority of responders had well-established reputation in Yoga and were from diverse lineages with 30 of them having more than 5 years of experience in the field. A set of eight questions were sent to them related to essentiality of Yoga research, how they updated themselves on research findings and whether such studies influenced their teaching and practice. Responses were compiled and appropriate statistics determined for quantitative aspects while feedback, comments and suggestions were noted in detail. Results and Discussion: About 89% agreed that it was essential to be up-to-date on Yoga research but only 70% updated themselves regularly with average papers read fully per year being <10. Most accessed information through general news reports, emails from contacts, and articles on internet sites whereas only 7% were through PubMed. About 60% felt these studies helped them in general teaching whereas 20% said that such studies had not really influenced it in any way. Conclusion: This survey provides a basic picture of a general lack of awareness of Yoga research amongst practicing Yoga teachers and therapists. Though a majority agree research is important, few seriously update themselves on this through scientific channels. With regard to future studies, most wanted "proof" that could be used to convince potential clients and felt that more qualitative methods should be applied.

KEY WORDS: Health, survey, wellness, Yoga research

## INTRODUCTION

Yoga has become increasingly popular worldwide with many taking it up professionally thus helping many more benefit from this health enhancing ancient art and science of humanity. A number of scientific studies have been done in the past five decades, and a recent extensive review has reiterated its therapeutic potential with scientific evidence for a wide range of psychosomatic conditions [1].

However, it remains to be determined as to how much such research findings actually percolate down into the day-to-day classroom teaching and clinical practice of the Yoga teachers/ therapists.

Important questions that come to mind in this regard are:

- 1. Are Yoga teacher/therapists aware of recent updates in Yoga research?
- 2. Are these updates influencing their day to day teaching/ clinical practice?

- 3. Are they satisfied with past and current research being done?
- 4. What are "priority needs" they wish from researchers?

This is important as a two-way dialog between them and researchers would enhance the focus, objectives as well as methods and ultimate direction of future research in the best productive manner.

In an attempt to determine answers for these pertinent questions, and foster understanding between "the lab and the field," this survey was done by this author amongst his international contacts in the field of Yoga and Yoga therapy.

#### Aim and Objectives

The aim of this survey was to understand the awareness of Yoga research findings in the Yoga teacher/therapist community and to find out how these findings were utilized by them in their day to day practice and teaching.

The secondary objective was to see what they felt would be more useful in the context of future research as this author feels such research efforts should be guided by needs of those who are to use it the most.

#### MATERIALS AND METHODS

This survey was undertaken in the months between August 2015 and December 2015. Emails were sent to potential participants and awareness of the survey carried out through social media including Twitter, Facebook, and SlideShare.

#### **Survey Participants**

This survey was conducted on a select group of 34 international Yoga teachers and therapists known to the author and included 8 from India, 7 from Australia, 8 from North America, 7 from Europe, and 2 each from South America and the UK.



The age of participants in the survey of which 18 were females and 16 males ranged from 28 to 77 (51.08  $\pm$  12.84) years.

Majority of responders had well-established reputation as Yoga teachers/therapists and were from diverse lineages with 30 of them having more than 5 years of experience in the field. Four of them had more than 30 years of professional standing in the field of Yoga. Five of the other respondents who had <3 years of experience in the field were excluded from the survey.

Four of the respondents were medical doctors, 4 nursing professionals, 5 physical therapists, 3 psychologists, whereas the rest were all qualified Yoga teachers/therapists with diplomas/degrees in Yoga from eminent Yoga schools. Traditions represented included the Krishnamacharya-Desikachar tradition, Kaivalyadhama tradition, Gitananda tradition, Iyengar tradition, and Satyananda tradition.

How long have you been teaching Yoga?

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<5 years	4
5-10 years	6
10-20 years	13
20-30 years	7
More than 30 years	4

Questions asked: The following questions were asked to the participants in the survey and responses obtained from them via email.

1. Do you think it is essential for Yoga teachers to be up-to-date on Yoga research?

- 2. Do you update yourself on research in Yoga regularly? If yes, how
- many papers on an average do you read fully per year?
- 3. Where/how do you access these studies?
- 4. Have these research studies influenced your teaching? If yes, how?
- 5. Is/are there any specific study/studies that has/have influenced you the most in the past 3-5 years? If yes, which one/s?
- 6. Are you satisfied with the quality of Yoga research at present?
- 7. What type of studies do you wish to see in the future?
- 8. Any other comments?

Compilation and analysis of responses: Responses from all participants were compiled and statistics (percentage and mean ± standard deviation) determined for quantitative aspects such as demographic parameters (country wised distribution, age, gender, and years of teaching/therapy). Qualitative analysis of important responses was done for other answers and important feedback, comments, and suggestions noted in detail.

#### **RESULTS AND DISCUSSION**

All the participants were eager to take part in this survey and expressed their support for such an endeavor. In this section, we shall take a look at the important responses given by them for each of the questions with appropriate details discussed in detail.

The first of the questions was as follows:

1. Do you think it is essential for Yoga teachers to be up-to-date on Yoga research?

About 89% of the teachers/therapists agreed that it was essential for Yoga teachers/therapist to be up-to-date on Yoga research. Some felt that it was not essential for teachers but that it was for therapists.

As a Yoga therapist trainer of 18 years from North America put it, "To move the profession forward into modern culture? Yes. To maintain the highest level of Ahimsa? Yes. Can someone support many people without doing so? Probably most of time."

Another Yoga therapist trainer of 15 years said, "My answer to this is twofold. In the realm of what Dr. Bhavanani calls Yogopathy [2], Yes I think it is essential. In today's world of "evidence-based medicine" being able to scientifically "prove" that Yoga Therapy is effective enables it to be more widely accepted as a valid treatment. In my experience, sharing this Yoga research as evidence is what opens both physicians and patients to trying it with respect versus skepticism. On the other hand, research whittles down factors to attempt to isolate that which is clinically relevant. As we know, Yoga is beyond the physical and is broad in its application and effects thus it is difficult to "prove" what exactly is happening through a research study. We can hypothesize; however, how the effects

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are obtained may be beyond current scientific understanding. Thus, we do not want to fall into a trap of narrowing our focus of approach to that which is scientifically provable. All of this said, my thoughts are that Yoga Therapist should be up-to-date on Yoga research and have a clear understanding of its limitations.

The right means produces the right end, hence outcome of the Yoga practices become better "structured" said a senior Australian Yogacharya while another respondent from the UK suggested, "No, but it helps and is interesting."

A senior Yoga therapist from Australia mentioned that this was most essential and that the Standards Committee in both International Association of Yoga Therapists (IAYT) and Australasian Association of Yoga Therapists (AAYT) had made it part of their educational standards for Yoga therapists for the same reason [3].

The next question was as follows:

2. Do you update yourself on research in Yoga regularly? If yes, how many papers on an average do you read fully per year?

Though a vast majority accepted the importance of research in Yoga, only 70% said they updated themselves on research in Yoga regularly with the average papers read fully per year being as follows. Only 9 of them read more than 10 papers a year, whereas 14 said they read less than 5 papers a year.

<5 papers per year	14
5-10 papers per year	10
10-20 papers per year	3
20-30 papers per year	2
More than 30 papers per year	4

3. Where/how do you access these studies?

It was found that most respondents were accessing their information on Yoga research through the internet and that general news reports, emails from their contacts, and articles on different internet sites were main sources. Only 7% were accessing their information through PubMed, whereas 10% still relied on various books on the subject.

General news reports, emails, and internet sites 72%
PubMed 7%
Google scholar 5%
Books 10%
Research Journals 4%
Research gate 2%

One has to be very careful with the information available on the net and this overreliance on unverified sources is something that needs correction as there is often a vast difference between what has been done in the actual study and what is popularized in the lay press.

An example is a recent study in the Journal of Neuroscience on how sleeping on the side influences clean-up of brain's metabolic waste products and halts neurological diseases [4]. Many started to talk about it in social media mentioning possible benefits of humans sleeping on their side and how they did it or did not do it. It seemed to this author that most had not even bothered to go to the original source and read the full paper as rodent models were used in the study and not humans. Speak about how having access to more information may not actually result in our being better informed!

4. Have these research studies influenced your teaching? If yes, how?

About 60% felt that these studies had helped them in their general teaching while 55%, 45%, and 40% stated that it helped in their teaching of asanas, pranayama, and relaxation, respectively. About 20% said that such studies had not really influenced their teaching in any way.

General teaching 60%
Asana aspects 55%
Pranayama aspects 45%
Relaxation aspects 40%
Safety aspects 20%
Scientific understanding 20%
Confirmation of ancient wisdom 10%
Nutritional aspects 5%
Not really 20%

As one of the senior trainers noted, "When I can offer a patient a study that "shows" positive benefits of Yoga (cancer research, telomere research, etc.), they are much more open to following the recommendations I make to lifestyle changes and to our treatment approach [5-7]."

It was also noted that showing patients the positive effects of various techniques has encouraged them to be more compliant with what they are taught. A special mention was made of a recent study on the side plank pose (Vasisthasana), in idiopathic and degenerative scoliosis by Fishman and colleagues [8].

However, it was well brought out that one should look at the methodology when it comes to safety precautions as some of the studies on asanas to avoid have methodology concerns. It was noted that an article states that Sarvangasana causes strokes. However, when one reads the article fully we find that the person held it with his head rotated [9]. As the therapist responded, "I don't know anyone who would do that so I disregard such studies." She, however, continued, "Osteoporosis studies have influenced my approach with avoiding flexion [10]."

A senior Yogacharini from Berlin explained that the research findings enabled clearer thinking for the teacher and therapist and helped develop an ability to compare Yoga knowledge with allopathic medicine. It was also essential to understand and point out differences in the therapeutic principles." She also felt that it enabled the teachers and therapists to be, "on the more safe side."

An Indian Yoga teacher in the USA stressed the importance of being clear in the aim of one's research. The focus should be Yoga, and this should be applied as per the tradition involved. "When it is done in such a manner, it becomes easier for me as a teacher to serve 'ready material' to my clients when they have health problems" said she. "The bridge between Yoga and modern science as manifested through research and literary works of Swami Gitananda Giri and his successors strengthens our conviction. When such authentic knowledge is combined with the fact research has been done by medical doctors, it truly helps us convince prospective and current clients about benefits of Yoga" she continued.

A senior Yogacharya responded that he had personally applied concepts of Swarodaya Viginan (study of nasal cycle) learned about through his studies of research in Yoga and been motivated to do a verified analysis of these concepts in relation to staying alert while driving his motor vehicle [11,12]. He attached a detailed report of his personal study of the nostril dominance during different phases of the day and with regard to diverse activities, he was undertaking on a daily basis. He had also practiced the right or left uni-nostril breathing techniques and noted in detail the effects he felt immediately. This author is personally heartened to see such feedback "from the field" as this is actually the "spirit of research" that Yoga research findings should be motivating in all sadhakas. They should be motivated to "see for themselves" whether the findings of the research studies as "true or not" by applying the methodology in their own personal sadhana and life.

5. Is/are there any specific study/studies that has/have influenced you the most in the past 3-5 years? If yes, which one/s?

Most of the respondents did not point out any specific study/ studies that has/have influenced them recently but gave more generalized replies. The few that were mentioned by name included recent publications from Kaivalyadhama (www.kdham. com), SVYASA (www.svyasa.edu.in), Patanjali Yogpeeth (www. divyaYoga.com), ICYER at Ananda Ashram (www.icyer.com), Krishnamacharya Yoga Mandiram (www.kym.org), ACYTER at JIPMER (www.jipmer.edu.in), and CYTER at Sri Balaji Vidyapeeth (www.sbvu.ac.in) along with specific mention of iRest in PTSD [13], GABA [14,15], neuroplasticity changes after mindfulness [16], and telomerase studies [6,7]. Studies on fast and slow Surya namaskar, uninostril pranayamas, cancer, depression, and dementia were also mentioned [15,17-19].

An Australian Yogacharya passed on the feedback from his student who said that the use of well researched and scientifically explained protocol [12] used when she was pregnant gave her a positive feeling of control up to and including the delivery of her baby.

As a Canadian Yogacharya responded, "hard to single one out, but studies on alternative nostril breathing [18,20-22], for instance, have influenced my own practice, and have allowed me to consider gradually incorporating these techniques, which I normally would have deemed too advanced, into some of my classes."

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6. Are you satisfied with the quality of Yoga research at present?

The answers were equally divided between yes and no and a few actually said they were not sure. Some felt they did not have the required expertise to comment on it. Comments received included the noting of more prolific research coming out in recent times but at the same time bemoaning mediocre methodologies adopted. Though it was wholeheartedly accepted that research is a valuable tool, some felt that it was really only proving information handed down to us from the Yogis of yore. Over emphasis of quantitative rather than qualitative aspects of research were mentioned and a need felt for more studies combing both aspects. Longterm longitudinal studies were also suggested through it was at the same time mentioned that this may be highly ambitious.

As said by a senior Yoga therapist in the USA, "I'm satisfied with the rapid trajectory but much more work is needed to bring in mixed methods and participatory action research methodology to capture local, community change as well versus the Asmita of the individual "subject's" suffering.

An Indian Yoga therapist responded saying, "I am satisfied but there are many Gurus and many traditions of Yoga. Whenever we talk about Yoga education, therapy and especially research, a question always arises about 'which Yoga' was done? This leads to confusions in the minds of teachers, patients and students. We should try and research a model syllabus that brings the best of all traditions together" said she.

7. What type of studies do you wish to see in the future?

A senior leader in Yoga therapy from Australia responded "well-designed case studies that allow for individualizing of the protocol, and that can eventually be meta-analyzed."

A senior trainer from Canada suggested that studies should look at supporting evidence for Yoga as an aid to overcoming addictions, as well as the impact of physical postures in aiding peace of mind and emotional stability. Populations that meditate are said to have better grades, lower crime rates, and selfless behavior and this aspect needs further study. He also suggested orienting research around benefits of Seva and Karma Yoga.

One of the most senior Yoga therapist trainers in India remarked, "Studies should be oriented toward finding out the risks attended with the practice of Yoga." He went on to suggest that Yoga therapy research should be "individual specific" and look at the individual and their tendencies leading to illness rather than being focused on "illness" per se.

Another USA-based therapist mentioned, "With the increase in lifestyle diseases across the world and the positive effects Yoga has on reducing such diseases, producing more research to 'prove' what we know is critical for Yoga's acceptance as an effective and valid and necessary treatment for a majority of the population today." Another Australian Yoga teacher suggested, "I'd like to see comparative studies between traditional classical Yoga (as a health and wellness practice) and say the gym, Pilates, crosstraining, etc., and all the other new fads of 'Yoga' (Hot Yoga, power Yoga, and the plethora of new wave so-called Yoga fads). It would be interesting to see how effective other exercise modalities are in comparison to the ancient wisdom of Yoga: is the ancient wisdom holding its own in the modern world of technoexercise programs, gyms with so-called instructors, etc.? I would also like to see comparative analysis between Western medicine and Yoga therapy and Ayurveda."

#### 8. Any other comments?

A dedicated Yogacharya from Bangalore suggested Yoga teaching and therapy curricula should include studies on characterization of humans, ethical, and moral values, the study of Sanskrit as part of life, the study of yogic as well as spiritual textbooks written by the ancient Yogis and Rishis, as well as an overall spiritual education during adolescence.

A Swiss Yogacharini wisely commented, "If science really wants to understand Yoga and its relationship with the human being, it should not stick to just the pieces of the puzzle but attempt to see the bigger picture of Yoga and its holistic effects on humankind."

A European Yoga teacher of 19 years mentioned an interesting meeting with her GP who is also a Homeopath and works with Chinese meridians. After a brief discussion on Yoga that she was doing, he said, "In all the thousands of people I see, you are the most balanced, do you understand Yin and Yang?" "We both confirmed the powerful results of the regular practice of Yoga and I felt very happy when I left his surgery because I felt like he was amazed and honest," wrote she.

## CONCLUSION

This survey provides a basic picture of the general lack of awareness about Yoga research among practicing Yoga teachers and therapists. Though a majority agree that research is important, few are seriously updating themselves on such research findings through scientific channels. Most are updating themselves through general articles on the net and such information seems to have minimal influence on their day-to-day teaching and practice in most cases. With regard to future studies, most wanted 'proof' that could be used to convince potential clients and felt that more qualitative methods should be applied. It was also felt that comparative studies should be done between traditional/ classical methods of Yoga practice as compared with newer innovative styles.

A major limitation of the present work is that the sample size is small and that the author personally knows most of the respondents for a lengthy period of time. However, this direct connection and nonblinding is deemed essential in order to get a "first-hand grassroots" qualitative perspective that is otherwise The overall picture was well summarized by a dedicated Yoga therapy trainer from the USA when she said, "I feel it is ideal for Yoga teachers to follow research however not essential. My experience in teaching Yoga Therapy to Yoga Teachers is that most have no idea how to read a study and how to discern valid information. Thus, they often draw incorrect conclusions from reading simply the abstract or from not understanding the bigger picture. In order for them to obtain value from reading Yoga research, they need training in how to read research."

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