

# INTERNATIONAL AYURVEDIC **MEDICAL JOURNAL**







**Research Article** ISSN: 2320-5091 **Impact Factor: 6.719** 

# A CROSS SECTIONAL SURVEY STUDY TO ASSESS THE DIFFERENCE BETWEEN SELF-ADMINISTRABLE PRAKRUTI ASSESSMENT QUESTIONNAIRE AND PHY-SICIAN ASSESSABLE PRAKRUTI ASSESSMENT QUESTIONNAIRE IN HEALTHY **VOLUNTEERS**

### Vaishnavi<sup>1</sup>, Kiran Kumar K<sup>2</sup>, Priyanka BV<sup>3</sup>, Kiran M Goud<sup>4</sup>

- <sup>1</sup> Undergraduate scholar, Sri Kalabhyraveshwaraswamy Ayurvedic Medical College, Hospital and Research Centre, Vijayanagar, Bangalore, Karnataka, India
- <sup>2</sup> Associate Professor, Department of Samhita & Siddhanta, Sri Kalabhyraveshwaraswamy Ayurvedic Medical College, Hospital and Research Centre, Vijayanagar, Bangalore, Karnataka, India
- <sup>3</sup> Associate Professor, Department of Samhita & Siddhanta, Sri Kalabhyraveshwaraswamy Ayurvedic Medical College, Hospital and Research Centre, Vijayanagar, Bangalore, Karnataka, India
- <sup>4</sup> Professor, Department of Panchakarma, Sri Kalabhyraveshwaraswamy Ayurvedic Medical College, Hospital and Research Centre, Vijayanagar, Bangalore, Karnataka, India

Corresponding Author: priya94814@gmail.com

https://doi.org/10.46607/iamj0311072023

(Published Online: July 2023)

**Open Access** 

© International Ayurvedic Medical Journal, India 2023

Article Received: 10/06/2023 - Peer Reviewed: 18/06/2023 - Accepted for Publication: 12/07/2023.



Check for updates

#### **ABSTRACT**

According to Ayurveda, each person is born with a unique balance of Doshas. Some Doshas predominate by nature from birth. It is not abnormal for Dosha to dominate. Simply put, that is how they are as people. Prakruti, which was created during the foetus' development, is that which endures from conception to death. Doshas in an individual continue to increase non-pathologically throughout their lifetime. Each person interprets and understands the Lakshana mentioned differently, and this differs when the physician evaluates the patient during Aatura pareeksha. However, clinicians ask a few questions to corroborate the *Prakruti*; these questions are not validated or consistent methods of assessment. Many self-administrable surveys, such as know your *Prakruti*, are accessible in E resources. Self-administered questionnaires have a number of drawbacks; for example, if the questions are unclear to the respondent, they might not respond, or if they are understood erroneously, the results might be inaccurate. This can be prevented since leading questions are used by clinicians to validate necessary answers when assessing *Prakruti*. In order to compare the results of *Prakruti* evaluations, this study will use both a self-administered questionnaire and a questionnaire that was prepared at the conclusion of the study and will be completed by a therapist. The aim of the study was to calculate the variation between a self-administered Prakruti assessment questionnaire and a Prakruti questionnaire completed by a physician. Using the To Know Your Prakruti Assessment Questionnaire, which is available online at https://www.planetayurveda.com/Prakruti-analysis/, the *Prakruti* was assessed in the first phase of the study. A Prototype *Prakruti* Analysis Tool (PPAT) was developed and validated as part of Sanjeev Rastogi's Phase II. Pitta Kapha Prakruti makes up a maximum of 30% of *Prakruti* in the first round, while *Kapha Pitta Prakruti* makes up a maximum of 46% in the second. In 63 volunteers, the *Prakruti* assessment in the second stage was different from that in the first stage. The second part of the Prakruti assessment is comparable to the first stage, which involved 37 volunteers. With a p value of 0.001, the perfect positive correlation was seen. This study found a distinction between a self-evaluative *Prakruti* format and a physician's *Prakruti* evaluation.

Keywords: Prakruti, Questionnaire, Physician, Prototype Prakruti Analysis Tool

#### INTRODUCTION

Prakruti is derived from Pra and Kri which means natural origin *Prakruti* means nature, character and constitution of a person. Ayurveda says that every person is born with different proportions of Doshas. Some *Doshas* are naturally dominant by birth. This dominance of *Dosha* is not pathological. It is just the nature of the person. Prakruti is that which remains constant from birth till death, formed at the time of development of the foetus. This non- pathological increase of Doshas in individual remains constant throughout his life. *Prakruti* is primarily divided into two Types, Doshaja Prakruti – Prakruti arising due to the dominance of three Doshas i.e Vata, Pitta and Kapha and Manasika Prakruti / Gunaja Prakruti – Psychological constitution. Dosha Prakruti is of 7 types i.e Vataja, Pittaja, Kaphaja, Vata Pittaja, Vata Kaphaja, Kapha Pittaja and Vata Pitta Kaphaja. The first three constitute single Dosha constitutions (Eka Doshaja Prakruti). These are very rare. Among these three, *Vata* constitution is considered bad (heena). Pitta constitution is considered moderate (madhyama). Kapha constitution is considered best (uttama). The next three constitute dual humoral constitutions (Dwandvaja Prakruti). Most of us possess this type of constitution. It is said to be denounced (nindya). The 7th type is called a balanced

constitution (Sama Dosha Prakruti). This type of constitution is also rare as a balance between all the three doshas is very hard to achieve owing to unhealthy diet and lifestyle. This type of constitution is considered superior (Sreshta). Manasika or Gunaja Prakruti is of 3 Types i.e Satvika, Rajasika and Tamasika. The Satvika one is free from defects as it is endowed with auspiciousness. The Rajasika type is defective because it Promotes wrathful disposition. The Tamasika one is similarly defective because it suffers from ignorance. Single Dosha body types purely Vata, purely Pitta and purely Kapha types of body constitutions are extremely rare. Persons with such body constitutions always suffer from diseases. Most of us have mixed type of body constitution combination of 2 Doshas with only just a few symptoms of the third Dosha. Body constitution with a balanced proportion of all 3 doshas is also very rare. A person with such a body constitution very rarely suffers from diseases. Knowing the three Ayurveda Body Types (Doshas) can help a person understand his or her personality. Each person contains a unique combination of the three Doshas that define their temperament and characteristics. Listed below are the three *Dosha* body types and their corresponding elements. It is important to keep in mind that no one has only one of the three types. Usually, people have mixed Ayurveda body types – like *Vata-Pitta* body type, *Pitta* – *Kapha* etc. According to Acharya Sushruta, formation of *Prakruti* takes place by the prominence of *Tridosha* at the time of union of *Shukra* (sperm) and *Shonita* (ovum) in the Garbhashaya (womb) of mother *Prakruti* is created due to the dominance of any one, two, or all of the three *Vatadi doshas* (*Vata, Pitta* and *Kapha*) and (*satva, raja* and tama) *Manas Gunas*".

Accessory factors affecting the formation of Prakruti: Many factors are responsible for the creation of Prakruti. Some of them are primary and others are secondary or accessory. These determinants of *Prakruti* are divided into two parts by *Charak*<sup>1</sup>. Factors dominating in Intra-uterine life and hereditary factors: Shukra Shonita Prakruti (Characters of Sperm-ovum or hereditary factors) Garbhashaya Prakruti (Time of intercourse, fertilization and Age nature of uterus Matura Aharavihara Prakruti (Mother's diet/behavior during pregnancy) Mahabhuta vikara Prakruti (Influence of Akasha, Vayu, Teja, Jala & Prithvi). Due to special factors in postnatal period (Surrounding atmospheric factors) Jatiprasakto (Racial factors) Kalprasaka (Family factors) Deshanupatini (Geological/ Demographic factors) Kalanupatini (Seasonal factors) Vayonupatini (Age factor) Pratyatmaniyata (Individuality)<sup>1</sup>. According to Aacharya Charaka<sup>2</sup> in the seventh chapter of Charaka Samhita Sutrasthana, some people have equal proportions of Pitta-Kapha-Vaata. Will not suffer from disease, whereas others who are vaata dominant, pitta dominant, or kapha dominant will always suffer. The lakshana mentioned is per-

ceived and understood differently in each individual and varies when evaluated by the physician during Aatura pareeksha. Many self-administrable questionnaires, such as know your Prakruti, are available in E resources; however, clinicians ask a few questions to confirm the *Prakruti*; these questions are not validated or uniform method of assessment. Many disadvantages of self-administered questionnaires exist; if the questions are not understood by the person, they may not answer, or if understood incorrectly, the outcome may be incorrect. When clinicians assess Prakruti, they use leading questions to confirm required answers, so this can be avoided. As a result, this study will compare the outcomes of Prakruti assessments using a self-administered questionnaire and a questionnaire developed at the end of the study that will be interviewed by a clinician. The study's goal was to estimate the difference between a self-administered Prakruti assessment questionnaire and a clinician-interviewed *Prakruti* questionnaire.

#### METHOD AND MATERIAL

Research Was About to compare self-administrable and physician interview able *Prakruti* assessment questionnaire, The Study was initiated after receiving the Institutional Ethics Committee Clearance [IEC No. SKAM/IEC/001/2020]. Informed consent from the volunteers. This study was conducted in 2 phases by including 100 samples in total. In Phase one trail Assessment of *Prakruti* was done using-To know your Prakruti assessment questionnaire available at E- resources https://www.planetayurveda.com/Prakruti-analysis/taken. The questionnaire was in checklist form<sup>5</sup>.

	Characteristics	Vata	Pitta	Kapha
1	Body frame	Thin and lean	Medium	Well built
2	Type of hair	Dry and with splits end	Normal, thin, more hair fall	Greasy, heavy
3	Colour of hair	Pale brown	Red or brown	Jet black
4	Skin	Dry,rough	Soft, more sweating, acne	Moist, greasy
5	Complexion	Dark,blackish	Pink to red	Glowing, white
6	Body weight	Low,difficult to put on weight	Medium, can easily loss or gain waight	Overweight, difficult to lose weight

7	Nails	Blackish,small,brittle	Reddish, small	Pinkish, big, smooth
8	Size and colour of the teeth	Very big or very small,irregular,blackish	Medium sized, yellowish	Large, shinning white
9	Pace of performing work	Fast,always in hurry	Medium energetic	Slow, steady
10	Mental activity	Quick,restless	Smart intellect, aggressive	Calm, stable
11	Memory	Short term, bad	Good memory	Long term is best
12	Grasping power	Graps quickly but not completely and forgets quickly	Grasps quickly but completely and have good memory	Grasps late and retains for longer time
13	Sleep pattern	Interrupted, less	Moderate	Sleepy. Lazy
14	Intolerence to weather condition	Aversion to cold	Aversion to heat	Aversion to moist, rainy and cool weather
15	Reactions under adverse situation	Anxiety,worry,irritability	Anger, aggresssion	Calm, reclusive, sometimes depressive
16	Mood	Changes quickly have frequent mood swings	Changes slowly	Stable constant
17	Eating habit	Eats quickly without chewing properly	Eats at a moderate speed	Chews food properly
18	Hungry	Irregular, any time	Sudden hunger pangs, sharp hunger	Can skip any meal easily
19	Body temperature	Less than normal, hands and feets are cold	More than normal, face and forehead hot	Normal, hands and feets lightly cold
20	Joints	Weak,noise on movements	Healthy with optimal strength	Heavy weight bearing
21	Nature	Timid,jealous	Egoistic, fearless	Forgiving, greatful, not greedy
22	Body energy	Becomes low in even- ing, fatigues after less work	Moderate, gets tired after medium work	Excellent energy throughout day not easily fatigued
23	Eyeball	Unsteady,fast moving	Moving slowly	Steady
24	Quality of voice	Rough with broken words	Fast, commanding	Soft and deep
25	Dreams	Shy,wind,flying,objects and confusion	Fire, light, bright colors, violence	Water pools, gardens and good relationships
26	Social relation	Make less friends prefers solitude	Good no. Of friends	Love to socialize, relation- ships are longer lasting
27	Wealth	Spend without thinking much	Saves but spends on valuable things	Prefers more savings
28	Bowel movements	Dry , hard, blackist,scanty stools	Soft, yellowish, loose stools	Heavy, thick, stick stools
29	Walking pace	Quick, fast with long steps	Average, steady	Slow with short steps
30	Communication skill	Fast, irrelevant talk, speech not clear	Good speakers with genuine argumentative skills	Authoritative, firm and little speech
	Result- Prakruti:			

Volunteers were asked to tick suitable answers. For which Both genders and Age group of 18 to 40yrs were included. In Phase II Questionnaire developed by Sanjeev Rastogi-Development and validation of a Prototype Prakruti Analysis Tool (PPAT) was taken for assessing the *Prakruti* of volunteers<sup>4</sup> After collect-

ing data in phase-1 and phase -2 trial, comparison was done using suitable statistical test like correlation etc, also practical difficulty of both the method of questionnaire was assessed and suitable suggestions is provided at the end of study.

#### **OBSERVATION & RESULT**

Maximum 76% and 72% of subjects in the first and second rounds of the study were female. Maximum of 45% of subjects are under the age of 20. In the first round, only 4% of subjects have 60 to 80% Vata characters. In the second round, only about 13% of subjects have 60 to 80% *Vata* characteristics. Maximum 23% of subjects in the first round have 60 to 80% Pitta characters. Maximum 19% of subjects in the second round have 60 to 80% *Pitta* characters. Maximum 13% of subjects in the first round have 60

to 80% Kapha characters. Maximum 44% of subjects in the second round have 60 to 80% Kapha characters. Maximum 30% of Prakruti belongs to Pitta Kapha Prakruti in the first round, while maximum 46% belongs to Kapha Pitta Prakruti in the second round. Prakruti assessment in the second stage differed from that in the first stage in 37 volunteers. Prakruti assessment in the second stage is similar to Prakruti assessment in the first stage in 37 volunteers.

<u>Table 1</u> Correlation between 1<sup>st</sup> & 2<sup>nd</sup> Round Prakruti Assessment

	Spearman's rho	1st Round Assessment	2 <sup>nd</sup> Round assessment
1st Round Assessment	Correlation Coefficient	1.000	.412**
	Sig. (2-tailed)		.001
	N	100	100
2 <sup>nd</sup> Round assessment	Correlation Coefficient	.412**	1.000
	Sig. (2-tailed)	.000	
	N	100	100

There was perfect positive correlation was observed with p value 0.001.

#### **DISCUSSION**

Acharya Charaka's Prakruti evaluation -Individual Prakruti is determined by the predominance of the five basic elements, three doshas, and mental qualities in sperm (Shukra) and ovum (Shonita) at the time of conception. Prakruti is also said to be influenced by maternal factors such as the intrauterine environment, food, and pregnancy regimen (Matur Ahara Vihara). This basic constitution, which is fixed at the time of fertilisation, usually remains constant throughout the individual's life. Ayurveda has also explained how to eat and live according to one's constitution, including the factors that aggravate and pacify doshas. The Prakruti (body type) is inherent in humans, just as the Visha (poison) is inherent in poisonous insects. During conception, the body type is determined by the qualities of shukra (sperm) and arthava (ovum). Vata prakruti - The Vata body type is regarded as poor in quality. Pitta Tridosha Prakruti - Body type influenced equally by Vata, Pitta, and Kapha is considered to be the best quality. Dual body types, such as Vata-Pitta, Pitta-Kapha, and Vata-Kapha, are not recommended. In

the context of a patient examination, Acharya Charaka explained Prakruti - Dosha body types. He claims that *Prakruti* is one of the most important factors to look into in a patient before disease testing and treatment. Prakruti is an individual's body constitution based on Dosha dominance in his body. References to Prakruti according to Acharya Vagbhata are explained in the third chapter of Ashtanga Hridaya Shareera Sthana. The seven types of Prakruti are born out of the dominant Dosha(s) in the body, according to Sarvanga Sundari's commentary on Ashtanga Hridaya Sutrasthana 3/83. By suppressing the submissive Dosha, the dominant Dosha(s) express their features in the person. The dual Dosha features are clearly manifested in the dual Dosha combination Prakruti, and third Dosha features are rarely seen in such a person. (Ashtanga Hridaya Shareera Sthana 3/104) The dual Dosha combination is not ideal, but the three Dosha combination, with all three *Doshas* in perfect balance, is very healthy and ideal. Health is defined as having all three Doshas in perfect balance. There is no chance of any Doshas aggravating in a Tridosha balanced *Prakruti*, so the person's *Doshas* will not aggravate with the causative factor. As a result, Tridosha balanced Prakruti, also known as Sama Dhatu Prakruti, enjoys the best health, immunity, and longevity. Assessment of Prakruti according to charaka Vata Prakruti is predominated with rough (ruksha), light (laghu), mobile (chala), abundant (bahu), swift (shighra), cold (sheeta), coarse (paruksha) and non-slimy (vishada), pitta Prakruti is predominated with hot (ushna), sharply/acutely acting (tikshna), liquid (drava), of fleshy smell (visram), sour (amla) and pungent (katu). kapha Prakruti characters are due to unctuous (snigdha), smooth (shlakshna), soft (mridu), sweet (madhura), essence (saara), dense (sandra), slow acting (manda), stable (stimita), heavy (guru), cold (sheeta), slimy (vijjala) and clear (acchah)3. The questionnaire used to assess Prakruti in the first round has not been validated. This includes body type, hair colour, skin complexion, body weight, nails, tooth size and colour, work pace, mental activity, memory, grasping power, sleep pattern, intolerance to weather conditions, and reactions in adverse situations. These traits are a collection of Bruhatrayee. The questionnaire used in the second round has been validated and is based on Dashavidha Pareeksha Vidhi as per Charaka Samhita Vimana Sthana. This format focuses on character evaluations based on Dosha qualities. When a physician evaluates prakruti, factors such as season, location, food, and diseases can be excluded. For example, when assessing Snigdha guna of Kapha Prakruti, questions such as "why is my skin dry even after applying moisturiser or oil?" must be asked. Furthermore, the degree of dryness varies from person to person. Ruksha, Khara, or Parusha are all possibilities. Which must be confirmed through a physical examination of the skin. Similarly, when we ask a patient for an assessment of manda guna slow in activity, we need to confirm this with friends or family members who stay with the person undergoing Prakruti Assessment for an extended period of time. Also, when a patient comes in for a *Prakruti* assessment, the *Prakruti* characteristics should be asked before the disease manifests. For example, if *Agni* is low, even a *pitta prakruti* person may experience less hunger. Physicians can differentiate this better.

#### CONCLUSION

To avoid influencing factors in the *Prakruti* Assessment, *Prakruti* should be assessed by a physician. This study also found a difference in *Prakruti* when assessed by a physician versus a self-assessable *Prakruti* format.

### **ACKNOWLEDGEMENT:**

We would like to thank Rajeev Gandhi university of health sciences for the financial support and encouragement. We would like to thank the management of Sri Kalabyraveshwaraswamy Ayurvedic Medical College Hospital and Research center Bangalore for all the encouragement and support.

#### **REFERENCES**

- Agnivesha, Charaka chakrapani datta, revised ed, vimanasthana chapter 8 verse 98 page no 277,chaukambha orientation Varanasi.
- 1. Agnivesha, Charaka samhita, with the Ayurveda Deepika commentary by chakrapani datta, revised ed, sutrasthana 7 th chapter verse 40 page no 52,chaukambha orientation Varanasi (2009)
- 2. Agnivesha, Charaka samhita, with the Ayurveda Deepika commentary by chakrapani datta, revised ed, vimana sthana 8 th chapter verse 96–98-page no277 ,chaukambha orientation Varanasi (2015)
- Development and validation of a Prototype Prakriti Analysis Tool (PPAT): Inferences from a pilot study -Sanjeev Rastogi
- Prakriti Analysis Ayurveda Test to Identify Body Type – Planet Ayurveda Atharva Ayurveda Ancient Wisdom School (PAAAAWS)

**Source of Support: Nil** 

**Conflict of Interest: None Declared** 

How to cite this URL: Vaishnavi et al: A Cross Sectional Survey Study to Assess the Difference Between Self-Administrable Prakruti Assessment Questionnaire and Physician Assessable Prakruti Assessment Questionnaire in Healthy Volunteers. International Ayurvedic Medical Journal {online} 2023 {cited July 2023} Available from: http://www.iamj.in/posts/images/upload/1511 1516.pdf