

KAMPAVATA (PARKINSON'S DISEASE) - PATHYA-APATHYA (NUTRITIONAL) AND REHABILITATION GUIDELINE

¹Dr. Sanjay A. Dhurve ²Prof. Dr. B. B. Kadlaskar

¹Assistant Professor, Department of Kayachikitsa, Bharati Vidyapeeth Deemed University
College of Ayurved, Pune, and Maharashtra, India

²HOD& Professor, Department of Kayachikitsa, Bharati Vidyapeeth Deemed University College
of Ayurved, Pune, Maharashtra, India.

ABSTRACT

Kampavata (Parkinson's disease) is a progressive neurodegenerative disorder associated with insidious onset, usually in second half of life, characterized by slowly progressive akinesia, rigidity, postural abnormality and tremor. The symptom of Parkinson's disease has now been established as due to striatal dopamine deficiency consequent on death of the substantianigra. Because of its crippling nature and non-available of curative treatment Parkinsonism has remained a great problem in the aging society. Home treatment may be helpful early on in Kampavata (Parkinson's disease) when the disease has not disrupted your life or after having got substantial relief following treatment for same. Modify diet and your activities and your home- simplify your day to day activities have good benefits at all stages of the disease when done on a regular basis.

Key Words: *Kampavata, Parkinson's Disease, Pathya, Apathya, Ahara, Vatavyadhi*

INTRODUCTION

Kampavata (Parkinson's Disease) is a syndrome consisting of variable combination of *Kampa (tremor)*, *Stambha (rigidity)*, *chestsanga (Bradykinesia)* and a characteristic disturbance of gait and posture. Kampavata (Parkinson's disease) generally commences in middle or late life and leads to progressive disability with time disease occur in all ethnic group has equally sex distribution.⁽¹⁾ In *CharakSamhitaVepathu* has been described as one of the eight types of *Nanatmajadisorder of Vata* and *Kampahas* been mentioned as one of *Vikaraof Vata*.⁽²⁾ *Basavarajiyam* has described a clinical entity known as *Kampavata* which resembles with the description of Parkinson's

diseases.⁽¹⁾ Because of its crippling nature and non-availability of curative treatment this disease has remained a great problem in ageing society. *Charaka* emphasize that if a man control his mind and senses and consumes good and restricted diet he can live up to the very ripe age of one hundred year without any disease (*Ca. Su. 27/348*). For this purpose *Charaka* mentioned that (*Ca. Su. 25/33*) ideal diet should rebuild the worn out system and nourish the Dhatus and maintain the equilibrium of the body constituents. Irrational diet acts otherwise and produces diseases. The view of *Kasayapa* states that the health depending on the *Ahara* and the *Ahara-sevanavidhi*. If the food is consumed according to dietetic reg-

How to cite this URL: Dr. Sanjay A. Dhurve & Prof. Dr. B. B. Kadlaskar : Kampavata (Parkinson's Disease) - Pathya-Apathya (Nutritional) And Rehabilitation Guideline. International Ayurvedic medical Journal {online} 2016 {cited 2016 June}

Available from: http://www.iamj.in/posts/images/upload/987_994.pdf

ulation. It protects health otherwise it manifests in disease. *Acharayas* have explained some classification dietetic articles, which are useful in *Vatavyadhi*. As *Kampavata* is one of *Nanatmaja* disorders of *Vata* so far these dietetic articles may be useful for *Kampavata*, which are as follows :^(1, 2, 3, 4, 5)

***Pathya Ahara* :-**^(5, 12, 15)

Annavarga:-*Yava, Kulattha, Kodrava, Rak-tasali, PuranaSastiSali., Sakavarga*:-*Vastuka, Sigru, Kara wella, Patola, Surana, Kakamachi., Falavarga* :-*Darsa, Kush-manda, Amalaki., Dugdhavarga* :-*Godug-dha, Ajadugdha, Mahisidugdha, Advaka/Lasunasidhha - Takra.*

Mamsavarga :-*Kukuta, Lava, Vartak, Shuka, Kapota, ChatakMamsa. Paniyavarga*:-*TaptaNiva.*

ApathyaAhara:-*Dadhi, Mastu, Guda, Kshira, Masa, Viruddha-Bhojana, Asatmya - Bhojana, Visamasana, Anupamamsa, Abhis-yandhi, Guru, Picchila Drayvas. ApathyaVi-hara* :-*Viruddhachesta, Vegavarodha and Jagarana* are also *Apathya* for *Kampavata* patients.

Dietary restriction may prevent neurodegenerative disorder. Recent finding in epidemiological studies of human populations suggests that individuals with a low daily calorie intake have reduced risk of suffering from Parkinson's disease. As with age related disorders in other organ system (Cardiovascular disease, Diabetes, and many cancers), neurodegenerative disorders are often associated with increased level of cellular oxidative stress and metabolic comprise. Dietary restriction (DR) extended life span and reduces levels of cellular oxidative stress in different system of laboratory rodent and monkeys; its impact on the brain is so far unknown.

Accumulating data suggests that restricting diet may have beneficial effect in reducing both the incidence and severity of neuro-

degenerative disorders such as Parkinson's disease, Alzheimer's disease and Stroke .The cause of Parkinson's disease is entirely unknown, except for a small group of families in which it appears to be hereditary. We know of no food that increases the risk of developing Parkinson's disease. At present, there is no reason to avoid or add specific nutrients in and attempt to modify the natural history of Parkinson's disease. Patient with Parkinson's disease should follow nutritional advice as promoted to the general public. With the qualification that extra calories may be necessary in cases where there is a lot of tremor or dyskinesia or significant weight loss.

After several year of levodopa therapy approximately half of the patients will experience loss of benefit from the medication before their next dose is scheduled. Patients then spend their day alternating between relatively good periods, when the levodopa is working and more symptomatic period it has worn off. One of the factors responsible for this. Fluctuating state of disease is the amount of protein eaten. Protein is broken down into variety of amino acids during digestion. Since levodopa is also amino acid it competes with many dietary amino acids to be absorbed from the intestine in to blood stream and form there in to the brain. The more protein which is ingested, the longer the levodopa may take to work, the less effective it may be and the sooner it may wear off. Thus patients with fluctuating responses to levodopa are often advised to curtail protein intake during the daytime and to try to schedule protein- containing meals in the middle of dose intervals. Carbohydrate appears to enhance levodopa absorption into the brain by removing competing amino acids, so a diet with a high ratio of carbohydrate to protein appears to work best in this situation. Specific food recommendations

are published by many of foundation that serves people with Parkinson's disease. It is important to remember that one cannot remove protein entirely from the diet, as amino acids are necessary for proper nutrition. Also if one is avoiding dairy products because at the protein content, calcium and vitamin D supplements may be advisable.

Another important consideration in those with a sub optimal response to levodopa is that large meals, especially with high fat content will slow the stomach's ability to pass food on the intestine. If levodopa taken after such a meal remains in the stomach for an excessive period of time, the acid environment may destroy the levodopa before it ever get a chance to work.

For those wishing to adjust their protein intake there are two ways currently considered feasible.

(1) Evening protein: - Eat high protein food only in the evening; this allows better mobility during the day. Some people find this plan the most helpful, as even very small amount of protein affect their levodopa absorption. Other has found that their mobility is greatly reduced the night time, and they have difficulty turning in bed or getting up at night.

(2) 7:1 Menu Plan: - Eat meals that consist of the ratio of seven parts carbohydrate to one part of protein. Carbohydrate break downs into glucose and enters the blood stream protein breaks down into amino acids, which enter the blood stream glucose. A high ratio of carbohydrate to protein causes a large amount of insulin to be released into the blood. Insulin removes some of the amino acids from blood and help lower the competition amino.

7:1 menu plan should be discussed with one's physician first. Same people find it so successful that they may need less levodopa,

so far Parkinson's disease patients need to make same adjustment in meal planning.

Meat poultry, fish milk, cheese and eggs are all very high protein for many people, milk especially interferes with levodopa. To get better results use high protein food in very small amounts, along with large helping of fruits, vegetables and grains. This means that at a meal you should eat just on ounce of meat, poultry, fish or cheese or one egg accompanied by fruit vegetable and bread, cereal, pasta or other grains. If milk protein is a problem a good substitute is low fat soy milk or rice milk containing no more than four gram of protein per eight- ounce serving. Be sure that choose the kind that are fortified with calcium and vitamin D.

Westoy non-fat soy beverage is fortified with vitamins A&D and calcium. Rice dream also has a fortified version. You can get these products at larger grocery stores or at health food stores. Carnation instant breakfast is inexpensive and the instant breakfast shake is a good substitute for the more costly ensure. For those who are protein sensitive. It can be made using soy or rice milk, and some fruit. However, it contains a small amount of dried milk so a few people may find it affects their levodopa absorption. They may not able to use instant breakfast at all.

Plant protein a good choice for part of your protein needs. Plant protein (dried beans, nuts and seeds) contains a high ratio of carbohydrates to protein, whereas meat, fish and poultry contain no carbohydrate. It is a good idea to eat several serving of cooked dried beans, peas, or lentils each week's legumes has more fibers than other food. Fibber helps with constipation and is heart protective as well. Legumes have a ratio of about 5:1 carbohydrates to protein work very well in a 7:1 eating plan. Good choices

are bean soup, refried beans, three bean salad and patties made from soy protein.

Special dietary consideration in Parkinson's disease

Weight loss is a problem for many patients with Parkinson's disease. In many cases this can be attributed to excessive tremor or dyskinesia, which can burn up a surprising number of calories. However without these symptoms many parkinsonian patients have heightened energy requirements and lose weight while eating what appears to be an adequate diet. The remedy for this situation is to increase calorie intake. Preferable through increased consumption of carbohydrate.⁽¹⁰⁾

Constipation is common accompaniment of Parkinson's disease. One of the easiest (yet seemingly hardest to remember!) counter measures is to drink plenty of water-based beverages, at least eight cups per day. Increasing dietary content of fiber not only help alleviate control of constipation but also appear to prevent bowel disease include cancer. Fiber is found in whole grains, bran, fruit and vegetable and in supplement preparation. Fiber may have the added benefit to speeding up the response to levodopa.

In patient with advanced Parkinson's disease, swallowing may become a problem coughing, gagging and choking during meals usually alert patients and family members to the presence of an underlying swallowing problem. These situations try to evaluate swallowing problem and so as far change in food consistency and modification of swallowing techniques.^(7,8,9)

Rehabilitation^(7, 10, 13)

Trials examining physiotherapy in Parkinson's disease are all relatively small and of variable quality. It seems likely that regular physical exercise improves mobility in the condition but many patients revert back to their previous level of performance when the

exercise program is terminated. It is therefore more important that patients take an increased amount of regular exercise that is sustainable. Further work is certainly required in this area. Although the trial evidence is again variable, it seems likely that through extensive speech and language therapy the quality of patient's speech can be improved these therapists can also advise airway protection techniques for patients with advanced disease and significant dysphagia.

Exercises for the Parkinson's (Kampavata) patient:-Just as running water does not freeze, so moving muscles do not freeze.

1) Know the facts: -The maintenance of normal muscle tone and function is an important aspect of the treatment of Parkinsonism. In part medication administered for your illness achieves this goal. However to realize the full benefit of the medication daily exercise and activity are essential. This some of the exercises capable of maintaining muscle power and tone and preventing deformities of the limbs and spine. Their daily performance has proved most beneficial to patients with this illness.

2) Ten basic exercises for the Parkinson's patients:-

i) Bring the toe tip with every step you take in Parkinson's disease "you never make a move" without lifting the toes.

ii) Spread the leg (10 inches) when walking or turning to provide a wide base a better stance and to prevent (falling it may not look beautiful but neither does falling.

iii) For greater safety in turning use small steps with feet widely separated. Never cross one leg over the other when turning. Practice walking a few yards and turn. Walk in the opposite direction and turn do so fifteen minutes a day.

iv) Practice walking into tight corners of and room, to overcome fear of close places.

v) To insure good body balance, practice rapid excursion of the body. Backward forward and to the right and left, five minutes several time a day. Don't look for a wall when you think you are falling. It may not be there. Your body will always be there to protect you, if you will practice balance daily.

vi) When the legs feel frozen or "glued" to the floor, a lift of the toes eliminates muscle spasm and the fear of failing you are free to walk again.

vii) Swing the arms freely when walking. It help to take body weight off the legs, lessens fatigue and loosens the arms and shoulders.

viii) If getting out of a chair is difficult rise with "lightning speed to overcome the pull of gravity" sitting down should be done slow, with body bent sharply forward, until one touches the seat practice this at least a dozen times a day.

ix) If the body lists to one side. Carry a shopping bag loaded with books or other weights in the opposite hand to decrease the bend.

x) Any task that is difficult. Such as buttoning a shirt or getting out of bed if practiced 20 times it day becomes easier the 21st time.

3) For tight muscles and poor posture standing: -

i) Stand in front of a wall, facing it about 8" away. Raise arms and reach as high as possible towards the top of the wall. Lean toward the wall and stretch.

ii) With your back to the wall, alternate rising legs as high as possible by bending the knee as if marching in palace.

iii) Holding on to something secitre, squat down as far as possible bending knees, then came tip.

4) Sitting:-

i) Sitting in straight back chair, place your arms behind the chair and bring your shoul-

ders back as far as possible raise your head up and look at the ceilings.

ii) Sitting in the same chair grips the end of a broom or mop stick with both hands try to raise it over your head until you get. It behind your head. Keep head and shoulders as erects as possible.

iii) Sitting in same chair place one leg at a time on another chair and press the knee straight keep it their 15 minutes, try both legs together.

iv) Sitting in a chair, raise legs up from the knee alternating, as if stamping your feet.

5) Lying on a firm bed or floor:-

i) Lie on the floor or bed, flat on your back, try to press your body to the floor as flat as possible move your head from eight to left as far as possible make sure your head, shoulders, back and knee touch the surfaces.

ii) Lie on the floor or bed on your abdomen, Do the following one by one:-

a) Put your hand behind back and look up to ceiling, trying to raise your chest off the floor.

b) Kick your legs alternatively, as if swimming.

c) Turn your head from right to left.

6) For Better Balance:-Stand with hand on hips, feet spread apart:-

a) Practice marching in palace

b) Practice raising leg straight out to the rear.

c) Practice raising leg out to the side.

d) Practice drawing a circle with the leg.

Standing with hands at side. Feet spread apart. :

a) Lean forward and back

b) Lean to both sides.

c) Lean in a circular motion and reverse the motion.

7) For walking: -

When walking Remember:-

a) Take as large a stop as possible.

b) Raise your toes as you step forward hitting ground with your heels.

c) Keep leg apart and posture straight.

d) Swing arms and look straight ahead- your feet know where the floor is locked.

Collect a dozen magazines – Lay them out in a straight line. Space them so that you can take as long a step as possible. Practice walking over these magazines without stepping on them.

1) For a better swing to arms, walk holding a rolled magazine in each hand, keep elbows straight.

2) Practice walking sideways. Backwards and takes big steps.

8) Forth Turning:

When practicing turning:

a) Keep feet spread – Apart and head thigh.

b) Use small step – Rock front side to side.

If you feel glued to the floor:-

a) Raise you head, relax back on your heels and raise your toes.

b) Rock from side to side, bend knee slightly and straighten up and lift your toes.

c) It sometimes helps if the arms are raised in a sudden.

9) For getting in and out of chair: -

1) If you become glued a few steps before you reach the chair. Try this: Don't aim for the chair but some object past if pass the chair as closely as possible and as you go by it sit down.

2) To sit down, bend forward as far as possible and sit down slowly. Get close to the chair. Do not fall into the chair.

3) To get up. Move to the edge of the chair, bend forward and push up vigorously using your arms; try to count 123Go. If you have a favorite arm – chair, raise the back legs with 4" blocks. This will help you to get up easily. Don't let people drag you up by your arms, but help you by pulling you under your arms or with a slight push on your back.

10) For getting out of Bed: -

1) Place block under the legs of the head of the bed. This will elevate the head of the bed and make it easier for you to sit up and swing the legs of the bed.

2) A knotted rope tied to the foot of the bed can help you to pull yourself up.

3) To get to a setting position, shift the body down and rock yourself by vigorously throwing your arms and legs toward the side of the bed.

11) For using your Arms and Hands:-

1) Practice buttoning and unbuttoning your clothes; practice cutting food and writing. Squeeze a ball or work with "silly putty" keep your finger busy many time a day Tear paper; take coins out of the pocket; play the piano.

2) Always try to dress yourself completely use shoehorn, elastic laces or extra-long shoelaces to get a better grip. Dresses in the most relaxed and comfortable position, sitting or standing, but make sure you are in a safe position.

Other Measures:-These modalities include; **Education** - Education about disease, its management and progression to patient andtheir family.

Support - There are many support organizations like American Parkinson's Disease Association, National Parkinson's Foundation, and Local Hospitals etc. Parkinson's disease patients can take help of these organizations by discussing their problems and struggles through the internet.

Exercise – Exercise is an important factor in the medical and psychological wellbeing of patients. Exercise increases the patients overall health and functionality. It has a positive impact on mood and energy levels. All these factors are important in treating chronic disease. Gains from physical therapy only last as long as exercise is maintained, so continuation is essential.

Nutrition – Patients with Parkinson's disease have decreased muscle mass and more weight loss than healthy control subjects, patients should be instructed to eat healthy diet and to take multiple vitamins with calcium if needed.

Yoga and Meditation-Yoga and meditation help to build the resistance and immunity in the body. They also help in the regulation and balance functioning of central nervous system.

DISCUSSION

Planning of balanced diet based on periodical nutritional assessment is essential because Kampavata (Parkinson's disease) present with gastrointestinal dysfunction leading to constipation and gastro paresis .diet planning needed to maintain nutritional level by avoiding weight loss or gain. Progressive stages of PD present with swallowing difficulties .in these cases thickening agents for liquids and an upright posture when eating reduces the risk of choking. We can't find any particular food combination which can help recover from Kampavata (Parkinson's disease) some foods definitely help in easing some symptoms. High fiber foods and lots of fluids will keep guts healthy; they help in preventing constipation which is common in PD. Balance provides good nutrition. Regular exercise helps relieving muscle stiffness. In Kampavata (Parkinson's disease) exercise is considered to be a possible intervention and possible neuro-protective measure. Above mentioned stretching and flexibility exercise help to relieve stiff muscle, improve flexibility and make daily activities easier.⁽¹⁴⁾

CONCLUSION

Eat healthy foods; use plenty of fruits, vegetables, grains, cereals, legumes, low fat dairy products. Takes good exercise

and physical therapy. They have good benefits at all stages of the disease when done on a regular basis .dealing with tremor –puts some weight on your hand, it will help in reducing tremor and restore control.^(10,11)

REFERENCES

1. Basvarajiyam: - By Basavraj, Ed and Pub. By RajeshwarDatt,Shastry, Chalikhambhasanskrit series, varanasi 1987.
2. Chakrapani: - Ayurveda Dipika commentary on CarakaSamhita Edited by YadavajiTrikamji Acharya, Chaukhambha Sanskrit Sansthana Varanasi.
3. Charakapanidatta: -Carkradatta with BhavarthaSandipani Hindi commentary by TriptiJagadishVara Prasad, Edited by pt. B. Mishra Chaukhambha Sanskrit Series office Varanasi India (1976).
4. CharakaSamhita: -Agnivesh Revised by Caraka and Dridhabala,Vidyotini Hindi commentary by pt. Kashinathshastri and Dr.GorakhNathChaturvedi - 13th edition 1986, Chaukhambha Sanskrit series Varanasi.
5. CharakaSamhita: -Gulabkunverba Ayurveda Society, Jamnagar
6. CharakaSamhita :-CharakaSamhita with English translation of Chakrapani commentary. By Bhagwan Dash, Chhaukhambha Sanskrit series, Varanasi.
7. Hauser R.A. ZesiewiczTA: - Management of early Parkinson's disease Medi. Clinic. North American – 1999, 83, 393-414 (Medline).
8. Nutt, J.G. Wood ward, W.R. Hammerstadi, J.P; Cater, J.H. I and Anderson, J.L .:- The one –off phenomenon in Parkinson's disease,N. Engl J. Med. 1984,310,483-488.
9. Olan CW, Kolkes WC, An Algorithm :- (Clecision tree for the management of

- Parkinson's disease treatment guidelines, Neurology 1998; (suppl.3) s1-57.
10. Rose, F. C. and Capiledeo R. (edi):- Research progress in Parkinson's disease.
 11. Sanjay A. Dhurve & Singh G. - A Clinical Study on Kampavata (Parkinson's disease) and its management with Kapikacchu. P. G. thesis, 2001, I.P.G.T. & R. A. Jamnagar.
 12. Sharma P. V. (1988):- Dravyaguna Vigyana, Chaukhambha Surbharti Academy, Varanasi.
 13. Symposium (Various Authors) :- Parkinson's disease, current progress, problems and management Northern European symposium on Parkinson Disease (Rinne, U. K. ; Klinger M ; and Stamm G, eds) Elsevier New York 1980.
 14. Yahr, M. D.:- Overview of present day treatment of Parkinson's disease J. Neural Transm. 1978: 43; 227 - 238
 15. Yoga Ratnakara :- with Vidyotini Hind ; commentary, Chaukhambha Sanskrit series Varanasi (1955).
-

CORRESPONDING AUTHOR

Dr. Sanjay A. Dhurve

Assistant Professor, Department of
Kayachikitsa, Bharati Vidyapeeth Deemed
University College of Ayurveda,
Pune and Maharashtra, India

Email-dr.sanjaydhurve@gmail.com

Source of support: Nil

Conflict of interest: None declared