

Management of Glomerulonephritis through Ayurveda – A Case report

Case Report

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Abstract

Glomerulonephritis refers to an inflammation of the glomerulus, which is the unit involved in filtration in the kidney. Prompt diagnosis of glomerulonephritis is vital as it may rapidly lose kidney function if not treated urgently. It may present with isolated hematuria and or proteinuria. The incidence of GN varies between 0.2 to 2.5 per 100000 per year. It is a case of Glomerulonephritis which is correlated with *Ushnavata*. A patient 35 year old presented in the Kayachikitsa OPD with complaints of brown color urination, with burning and frequent micturition. She was also a known case of rheumatoid arthritis since 10 years. After clinical examination she was treated with oral medication (*Gokshuradi Guggul* and Neeri KFT) for 7 days. She had complete relief and no recurrence up to the month of August 2019.

Keywords: *Ushnavata*, *GokshuradiGuggul*, Hematuria, Proteinuria .

Introduction

Glomerulonephritis (GN) refers to an inflammation of the glomerulus, which is the unit involved in filtration in the kidney. This inflammation typically results in one or both of the nephrotic or nephritic syndromes. (1) It may present with isolated hematuria and or proteinuria (blood or protein in the urine); or as a nephrotic syndrome, a nephritic syndrome, acute kidney injury, or disease. In primary GN, disease is almost entirely restricted to the kidneys (as in IgA nephropathy or post-streptococcal GN) while in secondary GN it occurs in association with more diffuse inflammation (as in systemic lupus erythematosus or systemic vasculitis). Prompt diagnosis of GN is vital as it may rapidly lose kidney function if not treated urgently. (2) In modern medicine, Antibiotics are advised to prevent streptococcal infection (Prophylaxis). Steroids to suppress immunity. The incidence of GN varies between 0.2 to 2.5 per 100000 per year. (3)

In Ayurveda, GN can be correlated with *Ushnavata* which is one of the types of *mutraghata* because of similarity in clinical features which is having symptoms like *raktayuktamutra* (Hematuria), *bastishool* (pain in bladder) and *daha* (Burning sensation). (4)

Case report

A 35 years old female came to kayachikitsa OPD (OPD NO - 1904290056) on 29/04/2019 with the complaints of brown color urination, with burning and

frequent micturition since 4 days. She had also Pain in lower abdomen. She was a known case of Rheumatoid Arthritis.

On examination, she was febrile (100OF), BP - 120/70 mmHg, Pulse was 80 /min and regular. Abdominal examination showed tenderness (1+) at hypo gastric region.

Table no. 1: Urine Investigation done on 29/4/2019

Sr no.	Investigation	Findings
1	Urine albumin	++++
2	Urine sugar	Absent
3	Pus cells	Occasional
4	RBC	Plenty
5	Epithelial cells	Occasional
6	Motile bacilli	Seen

According to the clinical features, and urine investigation (table no 1), she was diagnosed as a case of acute Glomerulonephritis. Following treatment (table no. 2) was given in considering it as *Ushnavata*.

Table no 2: Treatment

Sr no.	Name of drug	Dose	Frequency and anupana	Duration
1	<i>Gokshuradi Guggul</i> (5)	500 mg	Thrice a day with water	7 days
2	Syp Neeri KFT (Aimil pharma)	15 ml	Thrice a day with water	7 days

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Observation and result

On the follow up after 7 days she had no fever, abdominal pain was decreased, and the micturition was normal. (Table no 3)

Table no. 3 The urine investigation showed following findings

Sr no.	Investigation	Before treatment 29/4/2019	After treatment 5/5/2019
1	Urine albumin	++++	Absent
2	Urine sugar	Absent	Absent
3	Pus cells	Occasional	1-3/HPF
4	RBC	Plenty	0-2/HPF
5	Epithelial cells	Occasional	0-1/HPF
6	Motile bacilli	Seen	Not seen

Discussion

According to *Ayurveda* Glomerulonephritis can be considered as a disease of *mutravahastrotas*. The features of this patient indicates involvement of *vata* and *pitta dosha*, the treatment was planned as per the principle of *Ayurveda* described for *Ushnavata*(6)

Gokshuradi Guggul is indicated in *adhogataraktapitta*, *mutrakruccha*, *mutraghat*, *pakwashayagata vata*, and *udavarta*. It contains *gokshur*, *guggul*, *trikatu*, *triphala*, *musta*. *Gokshur* is having *madhur rasa*, *madhurvipak*, *sheet virya* and *snigdha guna & bastishodhan* property.(7) Due to these properties, burning sensation may be alleviated. It contains large quantity of nitrates and essential oil which act as diuretic(8). As GN is autoimmune disease *gokshur* may help in correcting immune system because of its immunomodulatory effect (9). Methanolic extract of fruit of *gokshur* having antibacterial activity against gram positive and gram negative bacteria(10), the other contents of *gokshuradi guggul* like *Triphala* is having anti inflammatory and anti arthritic effect(11),and antibacterial activity(12), it is also having antipyretic property (13), *Trikatu* has Antioxidant(14), Antimicrobial(15,16,17), Analgesic(18), immunomodulatory (19, 20), and anti-inflammatory property(21, 22).

Neeri KFT contains *punarnava* (*Boerhavia diffusa*), *gokshur* (*Tribulus terrestris*), *panchtrinmoola*, *varuna* (*Crataeva nurvala*). all these drugs act as *nutralsdravya*, *ushir*(*Vetiveria zizanioides*), *rakta chandan* (*Pterocarpus santalinus*), *kakri beej*(*Cucumis sativus*), *dhanyak* (*Coriandrum sativum*), *palashpushpa* (*Butea monosperma*) having *madhur rasa* *sheeta virya* which are helpful to subside the burning micturition. In the study conducted by Manish Kr et al. Neeri KFT is found to be nephroprotective. The nephroprotective potential of Neeri-KFT might be due to the presence of several active constituents like glycosides, steroids, alkaloids, tannins, proteins, flavonoids, terenoids and carbohydrates as qualitatively estimated by preliminary phytochemical screening(23)

Conclusion

From this study it can be concluded that Glomerulonephritis can be successfully treated with appropriate Aurvedic medication.

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