

CLINICAL STUDY ON VIRECHANA KARMA IN THE MANAGEMENT OF MADHUMEHA W.S.R. TO TYPE -II DIABETES - A CASE STUDY

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INTRODUCTION

In modern era, sedentary life style attributed a lot of stress and over nutrition which made diabetes as one of the most prevalent diseases in the world. Although much advancement in modern medicine, still there is no clear and proper solution provided to the level of utmost satisfaction in redressing many ailments. Thus, it became a biggest silent killer in today's world. In Ayurveda, it can be compared with *Madhumeha*, where the Kapha increases in quantity and also gets liquefied. (*Bahu Dravah sleshma*), followed by saithilya or sithilikarana (preparation of a base for the initiation of pathological events, in other words, body's susceptibility for the disease), in addition association of *Pitta* and *Vata* vitiates meda, mamsa and sareera kleda produces, thus leading to various presenting features of the disease *Madhumeha*. *Virechana* karma is one such treatment module of *Apatarpana* explained by Acharya(s) in *prameha*.

Brief History of the patient:

M.RAVINDER 53 years old male patient, weighing 60 kg, presented in Dr. B.R.K.R Govt. Ayurvedic Medical College, Hyderabad O.P.D with persistent hypoglycaemic levels.

Past History: underwent treatment with hypoglycaemic drugs

Family History: Strong presence of Diabetes

mellitus since past two generations, both Maternal and Paternal.

Patient's condition when attended:

1. Patient is conscious, coherent and afebrile
2. Pulse : 78/min
3. Blood Pressure: 130/80 mm of hg
4. Systemic Examination:
 - CVS : S₁S₂ heard
 - Lungs : B/L clear
 - P/A Soft

Asthavidha Parikshana:

1. *Nadi* : *vata-pitta*
2. *Mutra* : *bahumutrata*
3. *Mala* : *malabaddata, sama*
4. *Jivha* : *nirama*
5. *Sabda* : *prakrta*
6. *Sparsa* : *samaseetoshna*
7. *Druka* : *prakrta*
8. *Aakruti:Madhya* (Height - 167.64cm, Weight - 60 kg, BMI - 21.3)

Dasavidha Parikshana:

1. *Prakrti* : *vata kapha*
2. *Vikrti involves*
 - *Dosa* : *vata*
 - *Dusya* : *rasa, medo, ojas*
 - *Sroto dusti* : *mutravaha srotas*
3. *Sara* : *madhyama*
4. *Samhanana*: *madhyama*
5. *Pramana* : *madhyama*
6. *Satva* : *madhyama*

7. Satmya : madhyama
8. Aharasakti: pravara
9. Vyayamasakti : madhyama
10. Vayah : madhyama

METHODS

Poorva karma:

- Deepana Pachana with Chitrakadi Vati 2 tablets b.i.d. for 3 days
- Sneha pana 30 ml Triphala Ghrita for 3 days
- Sarvanga Abhyanga with Tila taila for 2 days
- Bhaspa Sweda for 15 min for 2 days

Pradhana karma: Virechana with Abhayadi Modaka 1 tablet for three cycles.

Paschat karma: Samsrajana karma, laghu bhojana.

Investigations:

- ✓ Fasting blood sugar (FBS),
- ✓ Postprandial blood sugar (PPBS),
- ✓ Sugar in urine, etc. were carried out to confirm the diagnosis.

RESULTS

The table format below shows the data of before (BT) and after (AT) treatment results in FBS, PLBS, and HbA1C and in Urine sugars with the Virechanakarma done in 3 cycles followed by laboratory test reports:

		FBS(mg/dl)		PLBS(mg/dl)		HbA1C		Urine Sugar	
		BT	AT	BT	AT	BT	AT	BT	AT
Pt-1	Cycle-1	209	129	256	198	10.6	=	++++++	++
	Cycle-2	224	145	244	165	=	7.9	Trace	Trace
	Cycle-3	124	108	198	144	=	7.8	Trace	nil



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LABORATORY TEST REPORT

Regn Date : 10/05/2015 07:07
Name : MR. RAVINDER
Regn No : 101596246
Ref By : Dr. PRAVEEN K MADIKONDA
Sample Type : Urine

Sample Collection : 10/05/2015 07:09
Print Date : 10/05/2015 19:44
Age / Sex : 53 Years / Male
Regn Centre : Himayathnagar
Ref no. :

COMPLETE URINE EXAMINATION (CUE)

<u>TEST NAME</u>	<u>RESULT</u>	<u>BIOLOGICAL REFERENCE INTER</u>
<u>Macroscopic Examination</u>		
Colour	: Pale Yellow	Pale Yellow
Appearance	: Clear	Clear
Specific Gravity <i>Bromo Thymol Blue</i>	: 1.038	1.016 - 1.022
Reaction/pH <i>Double Indicator</i>	: Acidic (5.0)	4.6 - 8
Protein <i>Protein error of Indicator</i>	: Nil	Nil - Trace
Sugar (Glucose) <i>GOD-POD</i>	: Present (++++)	Nil
Urobilinogen <i>Modified Ehrlich reaction</i>	: Normal	0.2 - 1 mg/dL
Bilirubin <i>Diazonium method</i>	: Negative	0 - 0.02 mg/dL
Ketones <i>Nitroprusside reaction</i>	: Negative	Negative
Nitrites <i>P-Arsanilic method</i>	: Negative	Negative
<u>Microscopic Examination</u>		
Pus Cells	: 0-1/HPF	0 - 5 /HPF
R.B.C	: Nil	0 - 2 /HPF
Epithelial Cells	: 0-1/HPF	0 - 8/HPF
Casts	: Nil	Nil
Crystals	: Nil	Nil

Method - Reagent Strin Method (Photoelectric color comparison), Microscopy.



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LABORATORY TEST REPORT

Regn Date : 17/05/2015 08:39
Name : **MR. RAVINDER**
Regn No : **1015101380**
Ref By : Dr. PRAVEEN
Sample Type : Whole Blood - EDTA

Sample Collection : 17/05/2015 09:01
Print Date : 17/05/2015 19:10
Age / Sex : **53 Years / Male**
Regn Centre : Himayatnagar
Ref no. :

GLYCOSYLATED HAEMOGLOBIN (HbA1c)

TEST NAME	RESULT	BIOLOGICAL REFERENCE INTERVAL
Glycosylated Haemoglobin	: 10.6	< 5.6% : Non Diabetic 5.7 - 6.4% : Increased Risk for Diabetes > 6.5% : Diabetic Range

Method : High Performance Liquid Chromatography (HPLC)


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BIOCHEMIST



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LABORATORY TEST REPORT

Regn Date : 13/09/2015 06:55
Name : **MR. RAVINDER**
Regn No : **1015190825**
Ref By : SELF
Sample Type : Fluoride Plasma

Sample Collection : 13/09/2015 06:59
Print Date : 19/09/2015 08:16
Age / Sex : **53 Years / Male**
Regn Centre : Himayatnagar
Ref no. :

FASTING PLASMA GLUCOSE (FPG)

TEST NAME	RESULT	BIOLOGICAL REFERENCE INTERVAL
Fasting Plasma Glucose Method : Hexokinase	: 209	70 - 100 mg/dL


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049

Patient Name : Mr. RAVINDER 53 Y O M / M
 Patient ID : 0100171547
SID No. : 01061806
 Ref By. : **Dr. PRAVEEN.K.MADIKONDA**

Register Date Time : 08/10/2015 07:39
 Sample Collected Date Time : 08/10/2015 08:51
 Report Date Time : 08/10/2015 09:04

Biochemistry

Investigation	Method	Results	Units	Biological Reference Interva
FASTING - PLASMA GLUCOSE	Hexokinase	129	mg/dl	70 - 100 mg/dL

Specimen : PLASMA

Interpretation :

ADA guidelines for diagnosis of D.M in non-pregnant adults.Include RPG >= 200 mg/dl, FPG >= 126 mg/dl

SUGGESTED CLINICAL CORRELATION

DONE BY

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Verified By

Dr.Praveena

Consultant Biochemist

Authorized By

DR.PRAVEENA

Consultant Biochemi

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Patient Name : Mr. RAVINDER 53 Y 0 M / M
 Patient ID : 0100171547
SID No. : 01061806
 Ref By. : **Dr. PRAVEEN.K.MADIKONDA**



049

Register Date Time : 08/10/2015 07:39
 Sample Collected Date Time : 08/10/2015 08:51
 Report Date Time : 08/10/2015 11:50

Biochemistry

Investigation	Method	Results	Units	Biological Reference Interva
HbA1c (GLYCOSYLATED HAEMOGLOBIN)	HPLC	7.9	%	As per ADA Guidelines, NON-DIABETIC : 4.0 - 6.0 DIABETIC:- i) Goal of Therapy : < 7.0 % ii) Poor control : > 8.0 %

Specimen : WHOLE BLOOD

Interpretation :

HbA1C is useful in monitoring long term blood glucose level control. Abnormal haemoglobin might affect the half life of red cells or invivo glycation, any cause of shortened Erythrocytesurvival or decrease in mean erythrocyte age will affect HbA1C values. Specimen containing high amounts of HbF may result in lower than expected HbA1C.As per ADA guidelines the diagnosis of diabetes should be greater than 6.5 %.

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Patient Name : Mr. RAVINDER.M 53 Y O M / M

Patient ID : 0100185125

SID No. : 01076939

Ref By. : Dr. PRAVEEN.K.MADIKONDA

Register Date Time : 26/11/2015 07:22


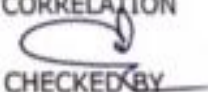
Sample Collected Date Time : 26/11/2015 07:28

Report Date Time : 26/11/2015 09:10

Biochemistry				
Investigation	Method	Results	Units	Biological Reference Interv
FASTING - PLASMA GLUCOSE	Hexokinase	145	mg/dl	70 - 100 mg/dL


Specimen : PLASMA


Interpretation :
 ADA guidelines for diagnosis of D.M In non-pregnant adults.Include RPG \geq 200 mg/dl, FPG \geq 126 mg/dl

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Consultant Biochemist

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Consultant Bioche



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Patient Name : Mr. RAVINDER.M 53 Y O M / M

Patient ID : 0100185125

SID No. : 01078167

Ref By. : Dr. PRAVEEN.K.MADIKONDA



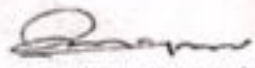


043

Register Date Time : 30/11/2015 07:50

Sample Collected Date Time : 30/11/2015 07:59

Report Date Time : 30/11/2015 10:40

Pathology					
Investigation	Method	Results	Units	Biological Reference Interval	
COMPLETE URINE EXAMINATION					
Specimen : URINE					
Method : Dipstick & Microscopy					
Colour	Dipstick & Microscopy	PALE YELLOW		PALE YELLOW	
Appearance		CLEAR		CLEAR	
Sediments		ABSENT		ABSENT	
Specific Gravity		1.005		1.005-1.030	
PH		5.0		5.0-8.0	
Albumin		NEGATIVE		NEGATIVE	
sugar		TRACE			
Bile Salts & Pigments		NEGATIVE		NEGATIVE	
Ketone Bodies		NEGATIVE		NEGATIVE	
Urobilinogen		0.2		<1 EU/dL	
Nitrate		NEGATIVE		NEGATIVE	
Microscopic Examination					
Pus cells		2-3/HPF			
RBC		NIL			
Epithelial cells		1-2/HPF			
casts		NIL			
Crystals		NIL			
Amorphous Material		NIL			
SUGGESTED CLINICAL CORRELATION					
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Patient Name : Mr. RAVINDER.M 53 Y 0 M / M

Patient ID : 0100185125

SID No. : 01087604

Ref By. : **Dr. PRAVEEN.K.MADIKONDA**



031

Register Date Time : 30/12/2015 07:32

Sample Collected Date Time : 30/12/2015 07:50

Report Date Time : 30/12/2015 10:30

Biochemistry

Investigation	Method	Results	Units	Biological Reference Interv
FASTING - PLASMA GLUCOSE	Hexokinase	124	mg/dl	70 - 100 mg/dL

Specimen : PLASMA

Interpretation :

ADA guidelines for diagnosis of D.M in non-pregnant adults. Include RPG \geq 200 mg/dl, FPG \geq 126 mg/dl

URINE SUGAR-FASTING Strip **NIL**

Specimen : URINE

SUGGESTED CLINICAL CORRELATION

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Consultant Biochemist

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P


DR.PRAVEENA

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Patient Name : Mr. RAVINDER.M 53 Y 0 M / M
Patient ID : 0100185125
SID No. : 01089674
Ref By. : Dr. PRAVEEN.K.MADIKONDA


Register Date Time : 06/01/2016 07
 Sample Collected Date Time : 06/01/2016 01
 Report Date Time : 06/01/2016 1

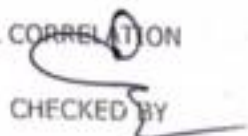
Biochemistry				
Investigation	Method	Results	Units	Biological Reference In
HbA1c (GLYCOSYLATED HAEMOGLOBIN)	HPLC	7.8	%	As per ADA Guidelines, NON-DIABETIC : 4.0 - 6.0 DIABETIC :- i) Goal of Therapy : < 7.0 % ii) Poor control : > 8.0 %

Specimen : WHOLE BLOOD

Interpretation :
 HbA1C is useful in monitoring long term blood glucose level control. Abnormal haemoglobin might affect the half life of red cells or in vivo glycation, any cause of shortened Erythrocytesurvival or decrease in mean erythrocyte age will affect HbA1C values. Specimen containing high amounts of HbF may result in lower than expected HbA1C. As per ADA guidelines the diagnosis of diabetes should be greater than 6.5 %.

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Patient Name : Mr. RAVINDER.M 53 Y 0 M / M
 Patient ID : 0100185125
 SID No. : 01089674
 Ref By. : Dr. PRAVEEN.K.MADIKONDA

Register Date Time : 06/01/2016 07:00
 Sample Collected Date Time : 06/01/2016 08:00
 Report Date Time : 06/01/2016 10:00

Biochemistry				
Investigation	Method	Results	Units	Biological Reference Int
FASTING - PLASMA GLUCOSE	Hexokinase	108	mg/dl	70 - 100 mg/dL

Specimen : PLASMA

Interpretation :
 ADA guidelines for diagnosis of D.M in non-pregnant adults. Include RPG \geq 200 mg/dl, FPG \geq 126 mg/dl

SUGGESTED CLINICAL CORRELATION
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 Consultant Biochemist

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DISCUSSION

1. *Deepana-Pachana* drug should be administered prior to *Aabhyantara Snehapan* because of their inherent properties of *Amapachana* and also helps in increasing the quantum of *Agni*.
2. *Amapachana* helps to reduce the *Picchilta* of morbid matter so that they can be easily dislodged.
3. In symptoms such as *Kara Pada Tala Daha*, *Atisweda* and *Nidra-Tandra*, *Virechana* showed good relief, as *Virechan* is best treatment for *Pitta dosha*.

4. *Virechana* karma controls the levels of Glucose and HbA1c levels by stimulating the β -cells of pancreas.

CONCLUSION

Madhumeha is a complicated disease in which every cell of human physiology is affected.

Virechana rejuvenates each and every cell of the body by nourishing the dhatu.

Virechana karma has its multi-dimensional effect on *Madhumeha* by correcting the metabolic impairment.

By following regular Ayurvedic way of life - style principles is always a best way to prevent further disease progression and to prevent complications.

Hence considering the positive and promising results attained through this case study, further similar research on large sample should be encouraged to enlighten Ayurvedic solutions.

Analysis of the results shown here are to enlighten scientific world about Ayurvedic solutions to carry on further studies for the same.

REFERENCES

1. Caraka Samhita Nidana Stana Vol 2 by R.K Sharma & Bhagwandash Chowkambha Sanskrit Series Office.
2. Caraka Samhita Cikitsa Stana Vol 4 by R.K Sharma & Bhagwandash Chowkambha Sanskrit Series Office.
3. Caraka Samhita Siddi Stana Vol 6 by R.K Sharma & Bhagwandash Chowkambha Sanskrit Series Office.
4. Caraka Samhita Vol 2 by Vidhyadhar Sukla & Ravidutta Tripathi Choukambha Orientalia Varanasi.
5. Susruta Samhita by Dr.Ambika Dutta Sastry Choukambha Orientalia Varanasi.
6. Astanga Hrdayam by Dr. Brahmananda Tripathi Choukambha Orientalia Varanasi.
7. BhavaPrakasha by Dr.Bulusu Sitaram Choukambha Orientalia Varanasi.
8. Sarangadhara Samhita Uttara Khanda by Prof.K.R.Srikantha Murthy Choukambha Orientalia Varanasi.
9. Bhaisajya Ratnavali Vol 3 by Govindaaji Bhisag Ratna Choukambha Sanskrit Bhavan.
10. Harrison's Principles of General Medicine.

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